Ratings: Moody's: Aa2

Fitch: AA S&P: AA

See "RATINGS" herein.

In the opinion of Foley & Lardner LLP, Bond Counsel, based upon an analysis of existing laws, regulations, rulings, and court decisions and assuming, among other matters, the accuracy of certain representations and compliance with certain covenants, interest on the 2015 Bonds is excluded from gross income for federal income tax purposes under Section 103 of the Internal Revenue Code of 1986, as amended (the "Code"), except for interest on any 2015-B Bond for any period during which such 2015-B Bond is held by a person who is a "substantial user" of facilities financed with the proceeds of the 2015-B Bonds or a "related person" of such a substantial user (within the meaning of Section 147(a) of the Code). In addition, interest on the 2015-A Bonds is not a specific preference item for purposes of the federal individual or corporate alternative minimum taxes, although Bond Counsel observes that such interest is included in adjusted current earnings in calculating federal alternative minimum taxable income of certain corporations. Interest on the 2015-B Bonds is a specific preference item for purposes of the federal individual and corporate alternative minimum taxes. In the opinion of Bond Counsel, the 2015 Bonds, their transfer and the income therefrom (including any profit made from their sale) will be exempt from taxation within The Commonwealth of Massachusetts. Bond Counsel expresses no opinion as to whether the 2015 Bonds or the interest thereon will be included in the measure of Massachusetts estate and inheritance taxes and certain Massachusetts corporation excise and franchise taxes. Bond Counsel expresses no opinion regarding any other federal or Massachusetts tax consequences, or regarding tax consequences of states other than The Commonwealth of Massachusetts. See "TAX MATTERS" herein.



\$171,485,000 MASSACHUSETTS PORT AUTHORITY

\$104,480,000 Revenue Bonds, Series 2015-A (Non-AMT) \$67,005,000 Revenue Bonds, Series 2015-B (AMT)

Dated: Dates of Delivery

Due: July 1, as shown on page (i) hereof

The 2015-A Bonds and the 2015-B Bonds (collectively, the "2015 Bonds") are being issued to finance certain capital improvements and related costs of the Massachusetts Port Authority (the "Authority"), as described herein. The 2015 Bonds will be secured on a parity basis with the Authority's outstanding senior revenue bonds, as more fully described herein. The 2015 Bonds will be payable solely from Revenues of the Authority which are pledged under the 1978 Trust Agreement and from certain funds and accounts held by the Trustee, all as described herein. The Authority has no taxing power. The 2015 Bonds will not constitute a debt, or a pledge of the faith and credit of The Commonwealth of Massachusetts or of any political subdivision thereof.

The 2015 Bonds will be issued as fully registered bonds and, when issued, will be registered in the name of Cede & Co., as registered owner and nominee for The Depository Trust Company, New York, New York ("DTC"). Purchasers will acquire beneficial ownership interests in the 2015 Bonds in denominations of \$5,000 or integral multiples thereof and will not receive physical delivery of bond certificates. So long as Cede & Co. is the registered owner of the 2015 Bonds, principal, premium, if any, and interest will be payable by U.S. Bank National Association, Boston, Massachusetts, as Trustee (the "Trustee"), to Cede & Co., as nominee for DTC. See "THE 2015 BONDS – Book-Entry Only Method."

The 2015 Bonds will bear interest from their date of original delivery, payable each January 1 and July 1, commencing January 1, 2016.

The 2015 Bonds are subject to optional and mandatory redemption prior to maturity as described herein.

See page (i) hereof for maturities, principal amounts, interest rates and yields.

The 2015 Bonds are offered when, as and if issued by the Authority and received by the Underwriters, subject to the receipt of an unqualified approving opinion as to legality of Foley & Lardner LLP, Boston, Massachusetts, Bond Counsel, and certain other conditions. Certain legal matters will be passed upon for the Authority by its Disclosure Counsel, Locke Lord LLP (as successor by merger to Edwards Wildman Palmer LLP), Boston, Massachusetts, and for the Underwriters by their counsel, Mintz, Levin, Cohn, Ferris, Glovsky and Popeo, P.C., Boston, Massachusetts. Public Financial Management, Inc., San Francisco, California, serves as Financial Advisor to the Authority. Delivery of the 2015 Bonds to DTC or its custodial agent is expected in New York, New York on or about July 15, 2015.

Citigroup

Jefferies

Loop Capital Markets





Approximate Massport Property

Massport Facilities

Notes:
This drawing is intended for informational purposes only and no use may be made of the same without the express written permission of the Massachusetts Port Authority ("Massport"). Massport does not certify the accuracy, information or title to the properties contained in this plan nor make any warranties of any kind, express or implied, in fact or by law, with respect to any boundaries, easements, restrictions, claims, overlaps or other encumbrances affecting such properties.



Massachusetts Port Authority

\$104,480,000 Revenue Bonds, Series 2015-A (Non-AMT)

Maturity (July 1)	Amount	Interest <u>Rate</u>	<u>Yield</u>	<u>CUSIP</u> [†]	Maturity (July 1)	<u>Amount</u>	Interest <u>Rate</u>	<u>Yield</u>	<u>CUSIP</u> [†]
2019	\$1,910,000	5.00%	1.14%	575896 PD1	2028	\$2,965,000	5.00%	2.87% ^c	575896 PN9
2020	2,005,000	5.00	1.40	575896 PE9	2029	3,115,000	5.00	2.97^{c}	575896 PP4
2021	2,105,000	5.00	1.69	575896 PF6	2030	3,270,000	5.00	3.05^{c}	575896 PQ2
2022	2,210,000	5.00	1.98	575896 PG4	2031	3,430,000	5.00	3.14 ^c	575896 PR0
2023	2,325,000	5.00	2.18	575896 PH2	2032	3,605,000	5.00	3.19 ^c	575896 PS8
2024	2,440,000	5.00	2.31	575896 PJ8	2033	3,785,000	5.00	3.25 ^c	575896 PT6
2025	2,560,000	5.00	2.47	575896 PK5	2034	3,975,000	5.00	3.29 ^c	575896 PU3
2026	2,690,000	5.00	2.63^{c}	575896 PL3	2035	4,170,000	5.00	3.31 ^c	575896 PV1
2027	2,825,000	5.00	2.75 ^c	575896 PM1					

\$24,205,000 5.00% Term Bonds due July 1, 2040; Yield 3.46%^c; CUSIP[†]: 575896 PW9 \$30,890,000 5.00% Term Bonds due July 1, 2045; Yield 3.56%^c; CUSIP[†]: 575896 PX7

\$67,005,000 Revenue Bonds, Series 2015-B (AMT)

Maturity (July 1)	Amount	Interest Rate	<u>Yield</u>	<u>CUSIP</u> [†]	Maturity (July 1)	Amount	Interest <u>Rate</u>	<u>Yield</u>	<u>CUSIP</u> [†]
2019	\$1,225,000	5.00%	1.39%	575896 PY5	2028	\$1,900,000	5.00%	3.24% ^c	575896 QK4
2020	1,290,000	5.00	1.73	575896 PZ2	2029	1,995,000	5.00	3.32^{c}	575896 QL2
2021	1,350,000	5.00	2.07	575896 QA6	2030	2,095,000	5.00	3.39 ^c	575896 QN8
2022	1,420,000	5.00	2.36	575896 QB4	2031	2,200,000	5.00	3.45°	575896 QP3
2023	1,490,000	5.00	2.56	575896 QC2	2032	2,310,000	5.00	$3.50^{\rm c}$	575896 QQ1
2024	1,565,000	5.00	2.69	575896 QD0	2033	2,425,000	5.00	3.56°	575896 QR9
2025	1,645,000	5.00	2.85	575896 QE8	2034	2,550,000	5.00	$3.60^{\rm c}$	575896 QS7
2026	1,725,000	5.00	3.00^{c}	575896 QF5	2035	2,675,000	5.00	3.64 ^c	575896 QM0
2027	1.810.000	5.00	3.14 ^c	575896 OG3					

\$15,520,000 5.00% Term Bonds due July 1, 2040; Yield 3.76%^c; CUSIP[†]: 575896 QH1 \$19,815,000 5.00% Term Bonds due July 1, 2045; Yield 3.86%^c; CUSIP[†]: 575896 QJ7

(i)

[†] Copyright, American Bankers Association. CUSIP data herein are provided by Standard & Poor's, CUSIP Service Bureau, a division of The McGraw-Hill Companies, Inc. The CUSIP numbers listed above are being provided solely for the convenience of Bondholders only at the time of issuance of the 2015 Bonds and the Authority does not make any representation with respect to such numbers or undertake any responsibility for their accuracy now or at any time in the future.

 $^{^{\}rm c}$ Priced at the stated yield to the July 1, 2025 optional redemption date at a redemption price of 100%.

No dealer, broker, salesperson or other person has been authorized by the Authority or any of its agents or the Underwriters to give any information or to make any representations other than those contained in this Official Statement, and, if given or made, such other information or representations must not be relied upon as having been authorized by any of the foregoing. This Official Statement does not constitute an offer to sell or the solicitation of an offer to buy nor shall there be any sale of the 2015 Bonds by any person in any jurisdiction in which it is unlawful for such person to make such offer, solicitation or sale. The information set forth herein has been furnished by the Authority and The Depository Trust Company and includes information from other sources that are believed to be reliable but, as to information from sources other than the Authority, is not to be construed as a representation of the Authority. The information and expressions of opinion contained herein are subject to change without notice and neither the delivery of this Official Statement nor any sale made hereunder shall, under any circumstances, create any implication that there has been no change in the affairs of the Authority since the date hereof.

The Underwriters have provided the following sentence for inclusion in this Official Statement. The Underwriters have reviewed the information in this Official Statement in accordance with, and as part of, their responsibilities to investors under the federal securities laws as applied to the facts and circumstances of this transaction, but the Underwriters do not guarantee the accuracy or completeness of such information.

This Official Statement contains forecasts, projections and estimates that are based on current expectations. In light of the important factors that may materially affect the financial condition of the Authority and the aviation industry generally and other economic and financial matters, the inclusion in this Official Statement of such forecasts, projections and estimates should not be regarded as a representation by the Authority or the Underwriters that such forecasts, projections and estimates will occur. Such forecasts, projections and estimates are not intended as representations of fact or guarantees of results.

IN CONNECTION WITH THIS OFFERING, THE UNDERWRITERS MAY OVER-ALLOT OR EFFECT TRANSACTIONS WHICH STABILIZE OR MAINTAIN THE MARKET PRICE OF THE 2015 BONDS AT A LEVEL ABOVE THAT WHICH MIGHT OTHERWISE PREVAIL IN THE OPEN MARKET. SUCH STABILIZING, IF COMMENCED, MAY BE DISCONTINUED AT ANY TIME.

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MASSACHUSETTS PORT AUTHORITY

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OFFICIAL STATEMENT

of the

MASSACHUSETTS PORT AUTHORITY

Relating to its

\$104,480,000 Revenue Bonds, Series 2015-A (Non-AMT) \$67,005,000 Revenue Bonds, Series 2015-B (AMT)

INTRODUCTION

General

This Official Statement of the Massachusetts Port Authority (the "Authority") sets forth certain information concerning the Authority and its \$104,480,000 Revenue Bonds, Series 2015-A (the "2015-A Bonds") and \$67,005,000 Revenue Bonds, Series 2015-B (the "2015-B Bonds," and collectively with the 2015-A Bonds, the "2015 Bonds").

The Authority

The Authority, created pursuant to Chapter 465 of the Massachusetts Acts of 1956, as amended to date (the "Enabling Act"), is a body politic and corporate and a public instrumentality of The Commonwealth of Massachusetts (the "Commonwealth" or "Massachusetts"). The Authority owns, operates and manages the "Airport Properties," consisting of Boston-Logan International Airport (the "Airport" or "Logan Airport"), Laurence G. Hanscom Field ("Hanscom Field") and Worcester Regional Airport ("Worcester Regional Airport"); and the "Port Properties," consisting of certain facilities in the Port of Boston (the "Port") and other properties. APPENDIX A – Information Statement of the Authority sets forth additional information concerning the Authority, the Airport Properties, the Port Properties, other activities of the Authority, its capital program, revenues and selected financial data of the Authority.

The 2015 Bonds

The 2015 Bonds are to be issued under and pursuant to the Enabling Act, a Trust Agreement by and between the Authority and U.S. Bank National Association, as trustee (the "Trustee"), dated as of August 1, 1978, as amended and supplemented (the "1978 Trust Agreement"), and a resolution of the Authority pertaining to the issuance of the 2015 Bonds (the "Bond Resolution") adopted by the Authority on June 18, 2015. The 2015 Bonds are being issued to finance certain capital improvements and related costs and to finance other costs of issuing the 2015 Bonds. See "PLAN OF FINANCE" and APPENDIX A – Information Statement of the Authority – Capital Program – Funding Sources.

2015-C Bonds

On June 30, 2015, the Authority issued its Revenue Refunding Bonds, Series 2015-C (the "2015-C Bonds") in the aggregate principal amount of \$170,730,000 to refund the entire outstanding principal amount of its Revenue Refunding Bonds, Series 2005-C maturing on and after July 1, 2016 (the "Refunded 2005-C Bonds") on a current basis. The Authority redeemed the Refunded 2005-C Bonds on July 1, 2015. See "SECURITY FOR THE 2015 BONDS."

The 2015 Bonds, the 2015-C Bonds and the outstanding Bonds that have been previously issued by the Authority under the 1978 Trust Agreement on a parity therewith, and any additional parity Bonds that may be issued hereafter under the 1978 Trust Agreement are collectively referred to herein as the "*Bonds*." For a description of the outstanding Bonds of the Authority and the pledge of Revenues of the Authority under the 1978 Trust Agreement, see "SECURITY FOR THE 2015 BONDS."

Additional Information

This Official Statement includes a description of the Authority, its facilities and certain financial and operational factors relating to the Authority, and a description of the 2015 Bonds and the security therefor. Except where noted, all information presented in this Official Statement has been provided by the Authority. The following appendices are included as part of this Official Statement: APPENDIX A – Information Statement of the Authority; APPENDIX B – Financial Statements of the Authority for the fiscal year ended June 30, 2014 and comparative information for the fiscal year ended June 30, 2013; APPENDIX C – Boston Logan International Airport Market Analysis (the "Airport Market Analysis") of ICF International, Cambridge, Massachusetts ("ICF") dated June 18, 2015; APPENDIX D – Review of Airport Properties Net Revenues Forecasts (the "Review of Revenue Forecasts") of LeighFisher Inc., Burlingame, California ("LeighFisher") dated June 18, 2015; APPENDIX E – Summary of Certain Provisions of the 1978 Trust Agreement; APPENDIX F – Form of Continuing Disclosure Certificate; and APPENDIX G – Form of Opinion of Bond Counsel. APPENDIX A has been provided by the Authority. APPENDIXE E and G have been prepared by Foley & Lardner LLP, Bond Counsel to the Authority. APPENDIX F has been prepared by Locke Lord LLP, Disclosure Counsel to the Authority.

Certain defined terms that are capitalized but not defined herein are defined in the 1978 Trust Agreement. See APPENDIX E – Summary of Certain Provisions of the 1978 Trust Agreement – Certain Definitions. All references in this Official Statement to the 1978 Trust Agreement, the Bond Resolution, the 2015 Bonds, the Continuing Disclosure Certificate and all other agreements, statutes and instruments are qualified by reference to the complete document. Copies of the 1978 Trust Agreement and the Bond Resolution are available for examination at the offices of the Authority and the Trustee.

The Authority's principal office is located at One Harborside Drive, Suite 200S, East Boston, Massachusetts 02128-2909. Its telephone number is (617) 568-5000. Copies of certain documents, including the Authority's Comprehensive Annual Financial Report for fiscal year 2014, which has been awarded the Certificate of Achievement for Excellence in Financial Reporting by the Government Finance Officers Association, are available electronically at the investors' page of the Authority's website at:

http://www.massport.com/about-massport/investor-relations

However, no information on the Authority's website is a part of or incorporated into this Official Statement, except to the extent such information is expressly disclosed herein.

THE 2015 BONDS

General Provisions

The 2015 Bonds will be issued as fully registered bonds in the aggregate principal amounts as set forth on page (i) hereof, will be dated their date of initial delivery and will bear interest from that date to their respective maturities as set forth on page (i) hereof, subject to optional and mandatory sinking fund redemption prior to maturity as described below. Ownership interests in the 2015 Bonds will be available in denominations of \$5,000 and integral multiples thereof. Interest on the 2015 Bonds will be payable on January 1, 2016 and on each July 1 and January 1 thereafter.

So long as Cede & Co. is the registered owner of the 2015 Bonds, all payments of principal, premium, if any, and interest on the 2015 Bonds are payable by wire transfer by the Trustee to Cede & Co., as nominee for DTC, which will, in turn, remit such amounts to the DTC Participants (as defined herein) for subsequent disposition to Beneficial Owners (as defined herein). See "Book-Entry Only Method" below.

Redemption

Sinking Fund Installments. The 2015 Bonds described below will be subject to redemption from sinking fund installments on the dates and in the amounts set forth below, which may be satisfied (i) by purchase and immediate subsequent cancellation by May 15 in each year at not more than 100% (unless another price is set by the

Authority) of the principal amount, or (ii) by redemption on July 1 in each year by lot at 100% of the principal amount to be redeemed, in each case together with accrued interest to the purchase or redemption date.

Sinking Fund Installments 2015-A Bonds Maturing July 1, 2040

	2015-A Donus Matur	ing July 1, 2040						
Year	Principal Amount	<u>Year</u>	Principal Amount					
2036	\$4,380,000	2039	\$5,070,000					
2037	4,600,000	2040^{\dagger}	5,325,000					
2038	4,830,000							
† Final Maturity								
	Sinking Fund Installments 2015-A Bonds Maturing July 1, 2045							
Year	Principal Amount	Year	Principal Amount					
2041	\$5,590,000	2044	\$6,470,000					
2042	5,870,000	2045^{\dagger}	6,795,000					
2043	6,165,000							
† Final Maturity								
Sinking Fund Installments 2015-B Bonds Maturing July 1, 2040								
Year	Principal Amount	<u>Year</u>	Principal Amount					
2036	\$2,810,000	2039	\$3,250,000					
2037	2,950,000	2040^{\dagger}	3,415,000					
2038	3,095,000							
† Final Maturity								
	Sinking Fund In							
	2015-B Bonds Maturing July 1, 2045							
Year	Principal Amount	Year	Principal Amount					
2041	\$3,585,000	2044	\$4,150,000					
2042	3,765,000	2045^{\dagger}	4,360,000					
2043	3,955,000							

Optional Redemption. The 2015 Bonds maturing on or prior to July 1, 2025 will not be subject to optional redemption prior to their respective maturity dates. The 2015 Bonds maturing after July 1, 2025 will be redeemable at the option of the Authority, in the order of maturity or sinking fund installments as directed by the Authority, on or after July 1, 2025, in whole or in part on any date, by lot within any single maturity or sinking fund installment of a Series, at 100% of the principal amount to be redeemed, together with accrued interest to the purchase or redemption date.

† Final Maturity

Selection of 2015 Bonds to Be Redeemed. If fewer than all the 2015 Bonds of any maturity or sinking fund installment of a Series are to be redeemed, the Trustee will select the 2015 Bonds of such Series to be redeemed by lot; provided, however, that so long as DTC or its nominee is the Bondholder, the particular portions of the 2015 Bonds of a Series to be redeemed within a maturity or sinking fund installment shall be selected by DTC in

such manner as DTC may determine. For this purpose, the Trustee will consider each 2015 Bond of a Series in a denomination larger than the minimum Authorized Denomination permitted by the Bond Resolution at the time to be separate 2015 Bonds of such Series each in the minimum Authorized Denomination.

Notice of Redemption. During the period that DTC or DTC's partnership nominee is the registered owner of the 2015 Bonds, the Trustee shall not be responsible for mailing notices of redemption to the Beneficial Owners (as defined herein) of the 2015 Bonds. See "Book-Entry Only Method" below. Not less than 30 nor more than 60 days before any redemption date, notice of the redemption will be filed with the Paying Agents of the Series 2015 Bonds and mailed to the holders of the 2015 Bonds (DTC or DTC's partnership nominee, as long as the 2015 Bonds are so registered) to be redeemed in whole or in part at their address as shown on the registration books of the Trustee. Failure to mail any notice of redemption, however, will not affect the validity of the proceedings for such redemption. If at the time of notice of any optional redemption of 2015 Bonds moneys sufficient to redeem all of such 2015 Bonds shall not have been deposited or set aside as provided in the 1978 Trust Agreement, then the notice of redemption may state that it is conditional on the deposit of sufficient moneys by not later than one business day prior to the redemption date, and if the deposit is not timely made the notice shall be of no effect. The Trustee may make other arrangements with respect to the manner of giving notices of redemption to Bondholders of record or Beneficial Owners of the 2015 Bonds, as provided in the Bond Resolution.

Book-Entry Only Method

The Depository Trust Company ("DTC"), New York, New York, will act as securities depository for the 2015 Bonds. The 2015 Bonds will be issued in fully-registered form registered in the name of Cede & Co. (DTC's partnership nominee) or such other name as may be requested by an authorized representative of DTC. One-fully registered certificate will be issued for each maturity of each Series of the 2015 Bonds, each in the aggregate principal amount of such maturity, and each such certificate will be deposited with DTC.

DTC, the world's largest securities depository, is a limited-purpose trust company organized under the New York Banking Law, a "banking organization" within the meaning of the New York Banking Law, a member of the Federal Reserve System, a "clearing corporation" within the meaning of the New York Uniform Commercial Code, and a "clearing agency" registered pursuant to the provisions of Section 17A of the Securities Exchange Act of 1934. DTC holds and provides asset servicing for over 3.5 million issues of U.S. and non-U.S. equity issues, corporate and municipal debt issues, and money market instruments (from over 100 countries) that DTC's participants ("Direct Participants") deposit with DTC. DTC also facilitates the post-trade settlement among Direct Participants of sales and other securities transactions in deposited securities, through electronic computerized bookentry transfers and pledges between Direct Participants' accounts. This eliminates the need for physical movement of securities certificates. Direct Participants include both U.S. and non-U.S. securities brokers and dealers, banks, trust companies, clearing corporations, and certain other organizations. DTC is a wholly-owned subsidiary of The Depository Trust & Clearing Corporation ("DTCC"). DTCC is the holding company for DTC, National Securities Clearing Corporation and Fixed Income Clearing Corporation, all of which are registered clearing agencies. DTCC is owned by the users of its regulated subsidiaries. Access to the DTC system is also available to others such as both U.S. and non-U.S. securities brokers and dealers, banks, trust companies, and clearing corporations that clear through or maintain a custodial relationship with a Direct Participant, either directly or indirectly ("Indirect Participants"). The DTC Rules applicable to its Participants are on file with the Securities and Exchange Commission. More information about DTC can be found at www.dtcc.com.

Purchases of 2015 Bonds deposited with DTC must be made by or through Direct Participants, which will receive a credit for such 2015 Bonds on DTC's records. The ownership interest of each actual purchaser of each 2015 Bond deposited with DTC ("Beneficial Owner") is in turn to be recorded on the Direct and Indirect Participants' records. Beneficial Owners will not receive written confirmation from DTC of their purchase. Beneficial Owners are, however, expected to receive written confirmations providing details of the transaction, as well as periodic statements of their holdings, from the Direct or Indirect Participant through which the Beneficial Owner entered into the transaction. Transfers of ownership interests in 2015 Bonds deposited with DTC are to be accomplished by entries made on the books of Direct and Indirect Participants acting on behalf of Beneficial Owners. Beneficial Owners will not receive certificates representing their ownership interests in 2015 Bonds deposited with DTC, except in the event that use of the book-entry system for such 2015 Bonds is discontinued.

To facilitate subsequent transfers, all 2015 Bonds deposited by Direct Participants with DTC are registered in the name of DTC's partnership nominee, Cede & Co., or such other name as may be requested by an authorized representative of DTC. The deposit of 2015 Bonds with DTC and their registration in the name of Cede & Co. or such other DTC nominee do not effect any change in beneficial ownership. DTC has no knowledge of the actual Beneficial Owners of the 2015 Bonds deposited with it; DTC's records reflect only the identity of the Direct Participants to whose accounts such 2015 Bonds are credited, which may or may not be the Beneficial Owners. The Direct and Indirect Participants will remain responsible for keeping account of their holdings on behalf of their customers.

Conveyance of notices and other communications by DTC to Direct Participants, by Direct Participants to Indirect Participants, and by Direct Participants and Indirect Participants to Beneficial Owners will be governed by arrangements among them, subject to any statutory or regulatory requirements as may be in effect from time to time.

Redemption notices shall be sent to DTC. If less than all of a maturity of a Series of 2015 Bonds is being redeemed, DTC's practice is to determine by lot the amount of the interest of each Direct Participant in such maturity to be redeemed.

Neither DTC nor Cede & Co. (nor such other DTC nominee) will consent or vote with respect to 2015 Bonds deposited with it unless authorized by a Direct Participant in accordance with DTC's MMI Procedures. Under its usual procedures, DTC mails an Omnibus Proxy to the Authority or the Trustee as soon as possible after the record date. The Omnibus Proxy assigns Cede & Co.'s consenting or voting rights to those Direct Participants to whose accounts the 2015 Bonds are credited on the record date (identified in a listing attached to the Omnibus Proxy).

Principal and interest payments on 2015 Bonds deposited with DTC will be made to Cede & Co., or such other nominee as may be requested by an authorized representative of DTC. DTC's practice is to credit Direct Participants' accounts upon DTC's receipt of funds and corresponding detail information from the Authority or the Trustee, on the payable date in accordance with their respective holdings shown on DTC's records. Payments by Participants to Beneficial Owners will be governed by standing instructions and customary practices, as is the case with 2015 Bonds held for the accounts of customers in bearer form or registered in "street name," and will be the responsibility of such Participant and not of DTC (nor its nominee), the Authority or the Trustee, subject to any statutory or regulatory requirements as may be in effect from time to time. Payment of principal and interest to Cede & Co. (or such other nominee as may be requested by an authorized representative of DTC) is the responsibility of the Authority or the Trustee, disbursement of such payments to Direct Participants will be the responsibility of DTC, and disbursement of such payments to the Beneficial Owners will be the responsibility of DTC, and Indirect Participants.

DTC may discontinue providing its services as depository with respect to 2015 Bonds held by it at any time by giving reasonable notice to the Authority or the Trustee. Under such circumstances, in the event that a successor depository is not obtained, physical certificates are required to be printed and delivered to Beneficial Owners.

The Authority may decide to discontinue use of the system of book-entry transfers through DTC (or a successor securities depository). In that event, 2015 Bond certificates will be printed and delivered to DTC.

The information in this section concerning DTC and DTC's book-entry system has been obtained from sources that the Authority believes to be reliable, but the Authority takes no responsibility for the accuracy thereof.

So long as Cede & Co. is the registered owner of the 2015 Bonds as nominee of DTC, references herein to the holders or registered owners of the 2015 Bonds shall mean Cede & Co. and shall not mean the Beneficial Owners of the 2015 Bonds.

Neither of the Authority or the Trustee will have any responsibility or obligation to the Participants of DTC or the persons for whom they act as nominees with respect to (i) the accuracy of any records maintained by DTC or by any Participant of DTC, (ii) payments or the providing of notice to the Direct Participants, the Indirect Participants or the Beneficial Owners, (iii) the selection by DTC or by any Participant of DTC of any Beneficial

Owner to receive payment in the event of a partial redemption of the 2015 Bonds or (iv) any other action taken by DTC or its partnership nominee as owner of the 2015 Bonds.

Transfer of 2015 Bonds

So long as Cede & Co., as nominee for DTC (or other nominee of DTC), is the Bondholder of record of the 2015 Bonds, beneficial ownership interests in the 2015 Bonds may be transferred only through a Direct Participant or Indirect Participant and recorded on the book-entry system operated by DTC. In the event the book-entry-only system is discontinued, 2015 Bond certificates will be delivered to the Beneficial Owners as described in the Bond Resolution. Thereafter, the 2015 Bonds, upon surrender thereof at the principal office of the Trustee with a written instrument of transfer satisfactory to the Trustee, duly executed by the holder thereof or such holder's duly authorized attorney, may be exchanged for an equal aggregate principal amount of 2015 Bonds of the same series and maturity and of any Authorized Denominations.

In all cases in which the privilege of exchanging or transferring 2015 Bonds is exercised, the Authority shall execute and the Trustee shall authenticate and deliver the 2015 Bonds in accordance with the provisions of the 1978 Trust Agreement. For every such exchange or transfer of 2015 Bonds, the Authority or the Trustee may make a charge sufficient to reimburse it for any tax, fee or other governmental charge required to be paid with respect to such exchange or transfer but may impose no other charge therefor. Neither the Authority nor the Trustee shall be required to make any such exchange or transfer of 2015 Bonds during the 15 days next preceding an Interest Payment Date or, in the case of any proposed redemption, during the 15 days next preceding the first publication or mailing of notice of redemption.

ESTIMATED SOURCES AND USES OF FUNDS

The estimated sources and uses of funds in connection with the issuance of the 2015 Bonds are summarized below (rounded to the nearest dollar):

		<u>2015-A</u>	<u>2015-B</u>	<u>Total</u>
Sources of Funds				
Principal of the 2015 Bonds		\$104,480,000	\$67,005,000	\$171,485,000
Plus: Original Issue Premium		15,406,830	8,012,773	23,419,603
	Total	\$119,886,830	\$75,017,773	\$194,904,603
Uses of Funds				
Deposit to Construction Fund for Project Costs		\$5,600,000	\$65,700,000	\$71,300,000
Deposit to Improvement and Extension Fund		60,000,000		60,000,000
Deposit to Construction Fund for Capitalized Interest			6,570,213	6,570,213
Deposit to Reserve Account		3,377,483	2,166,044	5,543,527
Deposit to Note Payment Account of Improvement and				
Extension Fund		50,000,000		50,000,000
Costs of Issuance ¹		522,693	333,553	856,246
Underwriters' Discount		386,654	247,964	634,618
	Total	\$119,886,830	\$75,017,773	\$194,904,603

¹ Includes Trustee fees, legal fees, rating agency fees, printing expenses and other miscellaneous fees and expenses.

PLAN OF FINANCE

The 2015 Bonds are being issued to finance a portion of the Authority's FY15-FY19 Capital Program. See APPENDIX A – Information Statement of the Authority – Capital Program. A portion of the Authority's FY15-FY19 Capital Program has been financed to date by the Authority with proceeds of its Tax Exempt Commercial Paper Notes, Series 2012-A (the "*Notes*"), currently outstanding in the amount of \$77,000,000. The Authority

expects to use a portion of the proceeds of the 2015-A Bonds to repay and redeem \$50,000,000 of the currently outstanding Notes on or before July 23, 2015.

SECURITY FOR THE 2015 BONDS

General

The principal of, premium, if any, and interest on the 2015 Bonds and each of the 2007 Bonds, the 2008 Bonds, the 2010 Bonds, the 2012 Bonds, the 2014 Bonds and the 2015-C Bonds (each as described below), and any additional Bonds that may be issued hereafter under the 1978 Trust Agreement, are payable from, and secured by a pledge of, the Authority's Revenues, which include all tolls, rates, fees, rentals and other charges from its Projects (subject to limited exclusions) and certain investment income and other revenues, all as more fully described in APPENDIX E – Summary of Certain Provisions of the 1978 Trust Agreement. For information about historical Revenues, see APPENDIX A – Information Statement of the Authority – Selected Financial Data. The pledge of the Revenues is subject to the provisions of the 1978 Trust Agreement regarding the application of Revenues. See "Flow of Funds" below. Exclusions from Revenues pledged to secure the Bonds include (i) passenger facility charges ("*PFCs*") assessed by the Authority on eligible enplaning passengers at the Airport, (ii) customer facility charges ("*CFCs*") charged to rental car patrons and (iii) certain revenues derived from facilities financed by debt that has limited recourse to the Authority. See below under "– Passenger Facility Charges" and "– Customer Facility Charges" and APPENDIX A – Other Obligations – PFC Revenue Bonds, – CFC Revenue Bonds and – Special Facilities Revenue Bonds.

The 2015-C Bonds were sold on June 15, 2015 in two separate private placement transactions with Bank of America, N.A. ("Bank of America") and Century Subsidiary Investments, Inc., III ("Century," and collectively with Bank of America, the "Banks"), respectively. The portion of the 2015-C Bonds sold to Bank of America consists of a fixed rate term bond maturing July 1, 2025, which is not subject to redemption prior to maturity. The portion of the 2015-C Bonds sold to Century consists of a fixed rate term bond maturing in July 1, 2029, which is subject to optional redemption by the Authority at any time at par plus, if such redemption occurs before July 1, 2019, a premium. See APPENDIX A – Debt Service Requirements Under the 1978 Trust Agreement. The 2015-C Bonds were issued to refund the Refunded 2005-C Bonds on a current basis. The 2015-C Bonds were issued on June 30, 2015, and the Refunded 2005-C Bonds were redeemed on July 1, 2015. The Authority has not agreed to any additional covenants for the benefit of the Banks in connection with the 2015-C Bonds that are not contained in the 1978 Trust Agreement. The Authority has agreed with the Banks to make the 2015-C Bonds subject to the Authority's continuing disclosure obligations. See "CONTINUING DISCLOSURE – Continuing Disclosure Undertakings."

Before giving effect to the issuance of the 2015 Bonds, the Authority has outstanding under the 1978 Trust Agreement 14 Series of Bonds in the aggregate principal amount of \$1,103,105,000, consisting of the Series listed in the following table.

BONDS OUTSTANDING UNDER THE 1978 TRUST AGREEMENT BEFORE GIVING EFFECT TO THE ISSUANCE OF THE 2015 BONDS

as of July 2, 2015

<u>Series</u>	<u>Issued</u>	Amount <u>Outstanding</u>
Revenue Refunding Bonds, Series 2007-A (Non-AMT)	June 2007	\$43,305,000
Revenue Refunding Bonds, Series 2007-C (AMT)	June 2007	25,200,000
Revenue Bonds, Series 2008-A (Non-AMT)	June 2008	21,455,000
Revenue Refunding Bonds, Series 2008-C (Non-AMT)	July 2008	17,625,000
Revenue Bonds, Series 2010-A (Non-AMT)	August 2010	92,210,000
Revenue Refunding Bonds, Series 2010-B (Non-AMT)	August 2010	129,985,000
Revenue Refunding Bonds, Series 2010-C (AMT)	August 2010	10,615,000
Revenue Refunding Bonds, Series 2010-D (AMT)	August 2010	84,165,000
Revenue Bonds, Series 2012-A (AMT)	July 2012	104,305,000
Revenue Refunding Bonds, Series 2012-B (Non-AMT)	July 2012	158,830,000
Revenue Bonds, Series 2014-A (Non-AMT)	July 2014	45,455,000
Revenue Bonds, Series 2014-B (AMT)	July 2014	48,230,000
Revenue Refunding Bonds, Series 2014-C (Non-AMT)	July 2014	150,995,000
Revenue Refunding Bonds, Series 2015-C (Non-AMT)	June 2015	170,730,000
Total		\$1,103,105,000

The Bonds on the foregoing list are the only Bonds currently outstanding under the 1978 Trust Agreement. For a description of the Authority's subordinated obligations, also issued under the 1978 Trust Agreement but not on parity with the Bonds, see APPENDIX A – Information Statement of the Authority – Other Obligations – Subordinated Revenue Bonds. For a description of other obligations of the Authority not issued on a parity with the Bonds, see APPENDIX A – Information Statement of the Authority – Other Obligations.

The Authority has no power to levy any taxes or pledge the credit or create any debt of the Commonwealth or any political subdivision thereof. The Authority's Bonds and certain other obligations are payable only out of Revenues of the Authority as described herein or the proceeds of Bonds subsequently issued, and are not debts of the Commonwealth or of any such subdivision, nor are they guaranteed by any of them. Under the Enabling Act and the 1978 Trust Agreement, the Authority does not have the power to mortgage the Airport Properties or the Port Properties, or any additional revenue-producing facilities hereafter acquired or constructed by the Authority or extensions, enlargements and improvements of the foregoing. Under its Enabling Act, the Authority has the power to acquire improvements to its Projects and, in certain instances, to sell property included in the Projects. Acquisitions of new facilities unrelated to the Projects and sales of all or substantially all of any existing Project would require authorizing legislation.

Flow of Funds

The Authority's pledge of its Revenues to secure the Bonds is subject to the provisions of the 1978 Trust Agreement regarding the application of Revenues. A brief description of the flow of funds of the Revenues is presented below. For a more complete summary, see APPENDIX E – Summary of Certain Provisions of the 1978 Trust Agreement – Application of Revenues.

The 1978 Trust Agreement provides that all Revenues are deposited daily in the Revenue Fund and are then transferred to the credit of the Operating Fund as soon and as often as practicable. The Authority shall pay when due all Operating Expenses from the Operating Fund and, once each month, shall transfer from the Operating Fund amounts, if any, to be deposited to its pension, post-retirement health benefits and self-insurance accounts. Any amounts deposited in the pension and post-retirement health benefit accounts will, upon the occurrence of an event of default under the 1978 Trust Agreement, first be applied to present and accrued pension benefits and post-retirement health benefits of the Authority's employees. See APPENDIX A – Information Statement of the

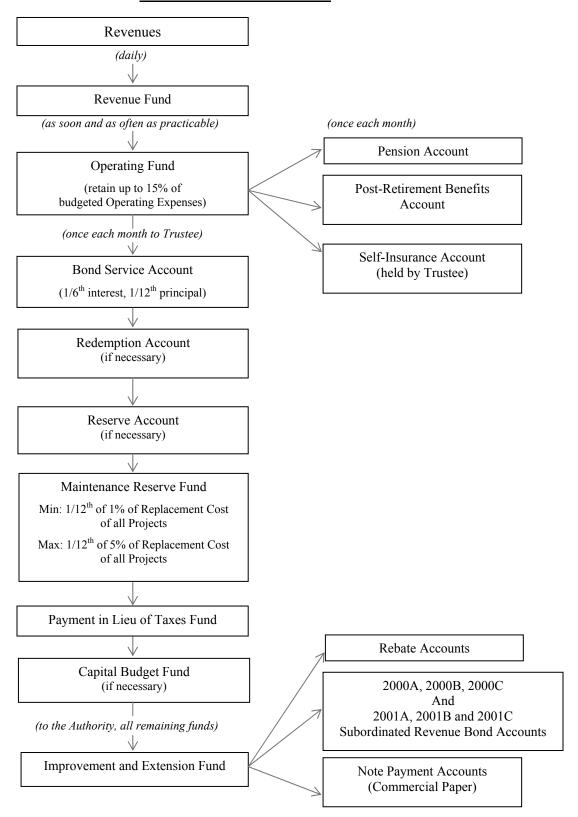
Authority – General Operational Factors – Financial Considerations – Authority Pension Funding and APPENDIX E – Summary of Certain Provisions of the 1978 Trust Agreement – Pledge Effected by the 1978 Trust Agreement.

The Authority retains in the Operating Fund as working capital such amounts as the Authority may determine necessary, provided that the balance therein shall not exceed 15% of the annual Operating Expenses established in the Authority's current annual budget. The balance of the Operating Fund is transferred monthly to the Trustee and applied as follows:

- (a) First, to deposit to the credit of the Bond Service Account of the Interest and Sinking Fund, the amount required to make the balance of the Bond Service Account equal to the sum of the interest accrued and to accrue until the first day of the next month on all outstanding Bonds and the principal accrued and to accrue until the first day of the ensuing month of all serial Bonds, if any, which will become payable within the next twelve (12) months.
- (b) Second, to deposit to the credit of the Redemption Account of the Interest and Sinking Fund, the amount, if any, required to make the amounts deposited in the Redemption Account for the current fiscal year equal to the portion of the Amortization Requirement, if any, for such fiscal year for the outstanding term Bonds of each Series, accrued and to accrue until the first day of the next month.
- (c) Third, to deposit to the credit of the Reserve Account of the Interest and Sinking Fund (i) an amount, if any, equal to one-sixtieth (1/60th) of the difference, if any, between (x) the maximum annual Principal and Interest Requirements for all Bonds then outstanding at the time of issuance of each Series of additional Bonds, less (y) the amount deposited into the Reserve Account as of the issuance of such Series of Bonds until the balance in the Reserve Account is equal to the maximum annual Principal and Interest Requirements for all outstanding Bonds, (ii) any amount which may have been withdrawn from the Reserve Account for paying interest, maturing principal or meeting Amortization Requirements or deposits to any Term Bond Investment Account and not theretofore replenished and (iii) any outstanding deficiency in deposits to the Reserve Account.
- (d) Fourth, to deposit to the credit of the Maintenance Reserve Fund, the amount required to make the deposit in the Fund during such month equal to one-twelfth (1/12) of one percent (1%) of the Replacement Cost of all Projects of the Authority as determined by the Consulting Engineer for the thencurrent fiscal year, or a greater amount as may have been specified by the Authority in its annual budget for the fiscal year (not to exceed in any fiscal year five percent (5%) of the Replacement Cost of all Projects).
- (e) Fifth, to deposit to the credit of the Payment in Lieu of Taxes Fund, the amount, if any, required to make the balance of the Payment in Lieu of Taxes Fund equal to the amount that should be on deposit therein, assuming that the amounts payable on the respective next following payment dates pursuant to the in-lieu-of tax agreements referred to in the 1978 Trust Agreement were paid in equal monthly installments from each respective preceding payment date.
- (f) Sixth, to deposit to the credit of the Capital Budget Fund, the amount, if any, required to make the balance of the Capital Budget Fund equal to the sum of the remaining portion of the Capital Budget for the then-current fiscal year budgeted to be paid from the Capital Budget Fund plus all amounts in the Capital Budget Fund obligated with respect to prior fiscal years but not yet expended; provided, that the Authority by resolution may increase or reduce the amount otherwise required to be deposited in the Capital Budget Fund.
- (g) Seventh, to the Authority for deposit to the credit of the Improvement and Extension Fund any amounts remaining in the Operating Fund after compliance with the above provisions. The 1978 Trust Agreement provides that moneys held in the Improvement and Extension Fund may be used for any lawful purpose of the Authority.

A chart summarizing the foregoing flow of funds is set forth on the following page.

APPLICATION OF REVENUES



Covenants as to Fees and Charges

The Authority covenants under the 1978 Trust Agreement to fix and revise as necessary the tolls, rates, fees, rentals and other charges for use of its Projects. The 1978 Trust Agreement requires that in each fiscal year Revenues be at least equal to the greater of (i) Operating Expenses plus 125% of debt service requirements for such year on all outstanding Bonds, and (ii) the sum of (A) Operating Expenses and debt service and reserve requirements on all outstanding Bonds, plus (B) amounts, if any, required to be deposited to the Maintenance Reserve Fund, the Payment in Lieu of Taxes Fund and the Capital Budget Fund, plus (C) amounts required to be deposited to the credit of the Improvement and Extension Fund pursuant to the Twelfth Supplemental Agreement between the Authority and the Trustee, made pursuant to the 1978 Trust Agreement. In addition, the Authority has covenanted to set tolls, rates, fees, rentals and other charges sufficient to reimburse the letter of credit provider under the Authority's commercial paper program. If in any year Revenues are less than the amount required, the Authority is required to cause recognized experts to recommend revised schedules of rates and charges and, if the Authority shall comply with all such recommendations, the failure of Revenues to equal the amount specified will not, of itself, constitute a default under the 1978 Trust Agreement. See APPENDIX E – Summary of Certain Provisions of the 1978 Trust Agreement – Covenants as to Fees and Charges.

Reserve Account

The 1978 Trust Agreement establishes a Reserve Account within the Interest and Sinking Fund that secures all Bonds on a parity basis. Such Reserve Account shall be used to pay debt service on the Bonds secured thereby to the extent of deficiencies in the applicable Bond Service Account. As a result of the deposits previously made to the Reserve Account upon the issuance of Bonds under the 1978 Trust Agreement, plus subsequent monthly deposits, the balance in such Reserve Account as of March 31, 2015 was approximately \$102.47 million. The balance in the Reserve Account is currently held in cash and Investment Securities (as that term is defined in the 1978 Trust Agreement). It is the Authority's policy to fund its reserve funds with cash and cash equivalents; the Authority has not used any surety policies to fund the debt service reserve funds for any of its Bonds. Upon issuance of any additional Bonds (other than certain refunding Bonds), the 1978 Trust Agreement requires that there be deposited to the Reserve Account an amount at least equal to one-half of the difference between (a) the amount of the increase in the maximum annual debt service requirement on such Bonds and all then-outstanding Bonds and (b) the amount, if any, in the Reserve Account in excess of the maximum annual debt service requirement on all then-outstanding Bonds. A portion of the Reserve Account requirement applicable to the 2015 Bonds will be funded with proceeds of the 2015 Bonds. At the time of issuance of the 2015 Bonds, the Reserve Account is expected to be fully funded with respect to all outstanding Bonds (including the 2015 Bonds and after giving effect to the refunding of the Refunded 2005-C Bonds). See APPENDIX E - Summary of Certain Provisions of the 1978 Trust Agreement -Application of Revenues.

Permitted Investments

Moneys held for the credit of the funds and accounts established under the 1978 Trust Agreement may, with certain exceptions, be invested only in "Investment Securities" as defined in the 1978 Trust Agreement. See APPENDIX E – Summary of Certain Provisions of the 1978 Trust Agreement – Certain Definitions. The exceptions are that moneys held for the credit of any special separate pension account in the Operating Fund may be invested in such manner as provided in the resolution of the Authority establishing such account, and that moneys held for the credit of certain other accounts may be invested solely in Government Obligations. See APPENDIX E – Summary of Certain Provisions of the 1978 Trust Agreement – Investments in Funds and Accounts. For a description of the Authority's investment policy, see APPENDIX A – Information Statement of the Authority – General Operational Factors – Investment Policy.

Additional Bonds

Under the 1978 Trust Agreement the Authority may, on the fulfillment of certain conditions, issue additional Bonds. The Enabling Act does not limit the amount of additional Bonds that may be issued by the Authority. Bonds may be issued under provisions of the 1978 Trust Agreement to finance, among other things, the cost of acquiring and constructing Additional Facilities and Additional Improvements and to refund outstanding Bonds. These provisions of the 1978 Trust Agreement permit the issuance of a series of additional Bonds if, among

other conditions, the Authority complies with one or more tests based on historical or projected Net Revenues and debt service requirements. See APPENDIX E – Summary of Certain Provisions of the 1978 Trust Agreement – Issuance of Additional Bonds.

In connection with the issuance of the 2015 Bonds, the following test will be applicable: that the Net Revenues of the Authority (the excess of Revenues over Operating Expenses during the applicable period) for any 12 consecutive months of the last 18 months have been at least 125% of the maximum annual Principal and Interest Requirements on all outstanding Bonds, after giving effect to the issuance of the 2015 Bonds (and any subsequent additional Bonds estimated to be issued under the 1978 Trust Agreement to complete Additional Improvements or Additional Facilities partially financed by Bonds then outstanding). For the purpose of this calculation, annual Principal and Interest Requirements on outstanding Bonds means, for any fiscal year of the Authority, interest accrued on such Bonds during such fiscal year, excluding interest for such period paid or to be paid from the Construction Fund, and maturing principal and mandatory amortization requirements due and payable on the July 1 immediately following such fiscal year. In the case of Bonds that bear interest at a variable rate, the interest component of maximum annual Principal and Interest Requirements is computed at the rate estimated by a nationally known investment banking firm selected by the Authority as the rate at which such Bonds would bear interest if issued at par with a fixed rate of interest and the same maturity.

For the 12 months ended March 31, 2015, coverage for purposes of the additional Bonds test described in the preceding paragraph was 240%, based upon Net Revenues for such period of \$257.9 million and maximum annual Principal and Interest Requirements of approximately \$107.26 million, determined as described above, after giving effect to the issuance of the 2015 Bonds and the 2015-C Bonds.

Other Revenues of the Authority Not Pledged as Security for the Bonds

Passenger Facility Charges. Under the 1978 Trust Agreement, PFCs assessed by the Authority on eligible enplaning passengers at the Airport have been excluded from Revenues at the election of the Authority, and the proceeds of PFCs are collected, held and expended outside the Funds and Accounts established under the 1978 Trust Agreement, and are not security for the Bonds. See APPENDIX A – Information Statement of the Authority – Capital Program – Funding Sources. For a description of certain revenue bonds issued by the Authority and secured by PFCs (collectively, the "PFC Revenue Bonds"), see APPENDIX A – Information Statement of the Authority – Other Obligations – PFC Revenue Bonds. The PFC Revenue Bonds are not issued under or secured by the 1978 Trust Agreement.

Customer Facility Charges. In December 2008, the Authority instituted a CFC for each transaction day that a car is rented at Logan Airport. The purpose of the CFC is to fund the evaluation, design, financing and development of the new Rental Car Center ("RCC") and related facilities at the Airport, which opened in September 2013. On June 8, 2011, the Authority issued its first series of special facility revenue bonds (the "CFC Revenue Bonds") under a Trust Agreement dated as of May 18, 2011 (the "CFC Trust Agreement") by and between the Authority and U.S. Bank National Association, as trustee, for the purpose of providing funds sufficient, together with other available funds, to finance the development and construction of the RCC and related improvements. Pursuant to the CFC Trust Agreement, the CFC revenues are pledged as security for the CFC Revenue Bonds, and the CFC revenues are not included in Revenues securing the 2015 Bonds and other Bonds issued under the 1978 Trust Agreement. For a further description of the RCC and the CFC Revenue Bonds, see (i) APPENDIX A – Information Statement of the Authority – Airport Properties – Airport Facilities – Service and Support Facilities and (ii) APPENDIX A – Information Statement of the Authority – Other Obligations – CFC Revenue Bonds. The CFC Revenue Bonds are not issued under or secured by the 1978 Trust Agreement.

Other Obligations and Commitments. The Authority is permitted by the 1978 Trust Agreement to incur borrowings or issue other obligations, including bond anticipation notes issued in the form of commercial paper, that are generally subordinate to the rights of holders of the Bonds and are payable solely from moneys in the Improvement and Extension Fund, proceeds of borrowings or obligations subsequently incurred or issued and, in certain circumstances, Bonds subsequently issued. For a description of such borrowings, including the Authority's commercial paper program, see APPENDIX A – Information Statement of the Authority – Other Obligations. The Authority has also issued special facilities revenue bonds for various capital projects on a non-recourse basis. The principal of and interest on the special facilities revenue bonds issued by the Authority are special obligations of the

Authority, payable solely from the sources provided; none of such special facilities revenue bonds is secured by the Revenues of the Authority. For a description of these bonds, see APPENDIX A – Information Statement of the Authority – Other Obligations – Special Facilities Revenue Bonds.

Additional Facilities. The Authority may acquire or construct revenue-producing facilities (in addition to Additional Improvements to the Airport Properties or the Port Properties) that serve a public purpose as may hereafter be authorized by the Legislature of the Commonwealth. Under the 1978 Trust Agreement, the Authority may not construct, acquire or operate any other building, structure or other facility financed other than by additional Bonds, unless the Consulting Engineer files a statement to the effect that in their opinion the operation of such facility will not materially adversely affect the Net Revenues or impair the operating efficiency of the Projects taken as a whole. Such a statement was delivered by the Consulting Engineer in connection with the issuance of each series of non-recourse bonds issued by the Authority. See "Other Obligations and Commitments" above and APPENDIX A – Information Statement of the Authority – Other Obligations.

Separately, the 1978 Trust Agreement permits the Authority to contract with any municipality or political subdivision of the Commonwealth, or with any public agency or instrumentality thereof or of the United States of America or the Commonwealth, to provide for the construction, operation and maintenance and/or administration of any facility or improvement, whether or not connected with or made a part of the Airport Properties or the Port Properties, if permitted by law. The Authority may expend or contribute moneys for such purpose from the Improvement and Extension Fund, but only, in the case of construction, if the construction of such facility or improvement (i) will result in increasing the average annual Net Revenues of the Authority, during the period of sixty (60) months immediately following the placing of such facility or improvement in operation, by an amount not less than 5% of the amount of moneys to be so expended or contributed by the Authority, and (ii) will not impair the operating efficiency or materially adversely affect the Revenues of any Project.

Modifications of the 1978 Trust Agreement

On several occasions commencing in 1988, the Authority has approved modifications to the 1978 Trust Agreement, which modifications either (i) were permissible under the terms of the 1978 Trust Agreement without Bondholder consent or (ii) took effect when approved by the holders of the requisite percentages of the outstanding Bonds. With respect to the modifications requiring Bondholder consent, the requisite percentage, in the case of most modifications, is 51% of the outstanding Bonds or, if fewer than all Series of Bonds are affected, 51% of the outstanding Bonds of each affected Series. See APPENDIX E – Summary of Certain Provisions of the 1978 Trust Agreement – Modifications of the 1978 Trust Agreement.

The Bond Resolution approved the Twentieth Supplemental Agreement, which will amend the 1978 Trust Agreement and provides for certain additional modifications to the 1978 Trust Agreement that are expected to become effective on July 18, 2015 upon expiration of the required thirty (30) day notice period to existing Bondholders and execution of the Twentieth Supplemental Agreement by the Authority and the Trustee. These modifications:

expand the definition of "Investment Securities" (that is, permitted investments for funds (i) held under the 1978 Trust Agreement) to include, in addition to those already permitted, the following: (w) Advance-refunded municipal bonds rated in the highest rating category, without regard to gradations within such category, by Moody's Investors Service ("Moody's") and Standard & Poor's Ratings Services, a Division of the McGraw-Hill Companies, Inc. ("S&P"); (x) U.S. dollar denominated debt offerings of a multilateral organization of governments rated in the highest rating category, without regard to gradations within such category, by Moody's and S&P; (y) U.S. dollar denominated corporate bonds, notes or other debt obligations issued or guaranteed by a domestic or foreign corporation, financial institution, non-profit or other entity rated in one of the three highest rating categories, without regard to gradations within such categories, by Moody's Investors Service and S&P; and (z) Negotiable bank certificates of deposit, deposit notes or other deposit obligations issued by a nationally or state chartered bank, credit union or savings association, or by a federally or state-licensed branch of a foreign bank or financial institution, in each case rated in one of the three

- highest rating categories, without regard to gradations within such categories, by Moody's or S&P; and
- (ii) delete provisions and references that apply solely to the Series 1978 Bonds, which have been fully paid and are no longer Outstanding under the 1978 Trust Agreement; and
- (iii) delete provisions and references to the Escrow Deposit Agreement established for the benefit of certain "Refunded Bonds" (as previously defined in the 1978 Trust Agreement), which have been fully paid and are no longer Outstanding under the 1978 Trust Agreement; and
- delete references to the Port Properties Fund under the 1978 Trust Agreement and provisions relating solely to such Fund, which revisions are permissible because, under Section 30 of Chapter 208 of the Acts of 1988, the Commonwealth has acknowledged that all payments to be made by the Authority to the Commonwealth pursuant to Section 6 of the Enabling Act on account of the Port Properties have been made in full and that the Authority has no further liability to make any payments to the Commonwealth regarding the Port Properties.

The Twentieth Supplemental Agreement has been provided to each of Moody's, S&P and Fitch Ratings, Inc. in connection with the issuance of the 2015 Bonds and the ratings assigned by each such rating agency to the 2015 Bonds is not lower than the rating assigned by such rating agency to outstanding Bonds prior to the modifications to the definition of Investment Securities set forth in the Twentieth Supplemental Agreement.

No proposed but unapproved modifications of the 1978 Trust Agreement other than those described above in the Twentieth Supplemental Agreement are pending. The descriptions of provisions of the 1978 Trust Agreement contained in this Official Statement, including APPENDIX E – Summary of Certain Provisions of the 1978 Trust Agreement, are inclusive of all modifications and amendments that have taken effect to date and the amendments described above.

By their acceptance of the 2015 Bonds, the owners thereof agree to all of the terms of the 1978 Trust Agreement as currently in effect.

TAX MATTERS

In the opinion of Foley & Lardner LLP, Bond Counsel, based on existing laws, regulations, rulings and court decisions, and assuming, among other matters, compliance with certain covenants, as described herein, interest on the 2015 Bonds is excluded from gross income for federal income tax purposes under Section 103 of the Internal Revenue Code of 1986, as amended (the "Code"), except for interest on any 2015-B Bond for any period during which such 2015-B Bond is held by a person who is a "substantial user" of facilities financed with the proceeds of the 2015-B Bonds or a "related person" of such a substantial user (within the meaning of Section 147(a) of the Code). In addition, interest on the 2015-A Bonds is not a specific preference item for purposes of the federal individual or corporate alternative minimum taxes, although Bond Counsel observes that such interest is included in adjusted current earnings in calculating federal alternative minimum taxable income of certain corporations. Interest on the 2015-B Bonds is a specific preference item for purposes of the federal individual and corporate alternative minimum taxes. A copy of the proposed form of the opinion of Foley & Lardner LLP, as Bond Counsel, is set forth in APPENDIX G.

The Code imposes various restrictions, conditions and requirements relating to the exclusion from gross income for federal income tax purposes of interest on obligations such as the 2015 Bonds. Certain different restrictions, conditions and requirements apply to the 2015-A Bonds, which are issued as "governmental bonds" that are not treated as "private activity bonds" under Section 141 of the Code, and the 2015-B Bonds, which are issued as "exempt facility bonds" under Section 142 of the Code. The Authority has covenanted to comply with certain restrictions and requirements designed to assure that the interest on the 2015 Bonds will not be included in gross income for federal income tax purposes, and that interest on the 2015-A Bonds will not be treated as a specific preference item for purposes of the federal individual or corporate alternative minimum taxes. Failure to comply

with these covenants may result in such interest being included in gross income for federal income tax purposes, possibly from the original issuance date of the 2015 Bonds. The opinion of Foley & Lardner LLP, as Bond Counsel, assumes compliance with these covenants. Bond Counsel has not undertaken to determine (or to inform any person) whether any actions taken (or not taken) or events occurring (or not occurring) after the issuance of the 2015 Bonds may adversely affect the tax status of the interest on the 2015 Bonds. Accordingly, the opinion of Bond Counsel is not intended to, and may not, be relied upon in connection with any such actions, events or matters.

The opinion of Bond Counsel relies on factual representations made by the Authority and other persons. These factual representations include but are not limited to certifications by the Authority regarding its reasonable expectations regarding the use and investment of bond proceeds. Bond Counsel has not verified these representations by independent investigation. Bond Counsel does not purport to be an expert in asset valuation and appraisal, financial analysis, financial projections or similar disciplines. Failure of any of these factual representations to be correct may result in interest on the 2015 Bonds being included in gross income for federal income tax purposes, possibly from the original issuance dates of such 2015 Bonds.

Although Bond Counsel is of the opinion that interest on the 2015 Bonds is excluded from gross income for federal income tax purposes, and interest on the 2015-A Bonds is not a specific preference item for purposes of the federal individual and corporate alternative minimum taxes, the ownership or disposition of, or the accrual or receipt of interest on, the 2015 Bonds may otherwise affect a Beneficial Owner's federal tax liability. The nature and extent of these other tax consequences will depend upon the particular tax status of the Beneficial Owner or the Beneficial Owner's other items of income or deduction. Bond Counsel expresses no opinion regarding any such other tax consequences.

Current and future legislative proposals, if enacted into law, clarification of the Code or court decisions may cause interest on the 2015 Bonds to be subject, directly or indirectly, to federal income taxation or otherwise prevent the Beneficial Owners from realizing the full current benefit of the tax status of such interest. As one example, the Obama Administration has announced a legislative proposal which generally would limit the exclusion from gross income of interest on obligations like the 2015 Bonds to some extent for taxpayers who are individuals and whose income is subject to higher marginal tax rates. Other proposals have been made that could significantly reduce the benefit of, or otherwise affect, the exclusion from gross income of interest on obligations like the 2015 Bonds. The introduction or enactment of any such legislative proposals, clarification of the Code or court decisions may also affect, perhaps significantly, the market price for, or marketability of, the 2015 Bonds. Such future legislation, if enacted, possibly could apply to obligations issued before such legislation is enacted and some or all of the 2015 Bonds possibly could be treated for purposes of such future legislation as issued on one or more dates after the dates of original issuance of the 2015 Bonds. Prospective purchasers of the 2015 Bonds should consult their own tax advisors regarding any pending or proposed federal or state legislation, regulations or litigation, and regarding the impact of future legislation, regulations or litigations, as to which Bond Counsel expresses no opinion.

The opinion of Bond Counsel speaks only as of its date and is based on current legal authorities, covers certain matters not directly addressed by such authorities, and represents Bond Counsel's judgment regarding the proper treatment of the 2015 Bonds for federal income tax purposes. It is not binding on the Internal Revenue Service (the "IRS") or the courts, and it is not a guarantee of result. Furthermore, Bond Counsel cannot give and has not given any opinion or assurance about the future activities of the Authority or about the effect of changes to the Code, the applicable regulations, the interpretation thereof or the enforcement thereof by the IRS. The Authority has covenanted, however, to comply with the applicable requirements of the Code.

Bond Counsel is not obligated to defend the Authority regarding the tax-exempt status of the 2015 Bonds in the event of an examination by the IRS. Under current IRS procedures, the Beneficial Owners and parties other than the Authority would have little, if any, right to participate in an IRS examination of the 2015 Bonds. Moreover, because obtaining judicial review in connection with an IRS examination of tax-exempt bonds is difficult, obtaining independent review of IRS positions with which the Authority legitimately disagrees may not be practicable. Any action of the IRS, including but not limited to selection of the 2015 Bonds for examination, or the course or result of such an examination, or an examination of bonds presenting similar tax issues may affect the market price, or the marketability, of the 2015 Bonds, and may cause the Authority or the Beneficial Owners to incur significant expense.

Payments of interest on tax-exempt obligations, including the 2015 Bonds, are generally subject to IRS Form 1099-INT information reporting requirements. If a Beneficial Owner of a 2015 Bond is subject to backup withholding under those requirements, then payments of interest will also be subject to backup withholding. Those requirements do not affect the exclusion of such interest from gross income for federal income tax purposes.

Premium. 2015 Bonds purchased, whether at original issuance or otherwise, for an amount greater than their principal amount payable at maturity (or, in some cases, at their earlier call date) ("Tax-Exempt Premium Bonds") will be treated as having amortizable bond premium. No deduction is allowable for the amortizable bond premium in the case of bonds, like the Tax-Exempt Premium Bonds, the interest on which is excluded from gross income for federal income tax purposes. However, the amount of tax exempt interest received, and a Beneficial Owner's basis in a Tax-Exempt Premium Bond, will be reduced by the amount of amortizable bond premium properly allocable to such Beneficial Owner. Beneficial Owners of Tax-Exempt Premium Bonds should consult their own tax advisors with respect to the proper treatment of amortizable bond premium in their particular circumstances.

State Tax Exemption

In the opinion of Foley & Lardner LLP, Bond Counsel, under existing Massachusetts law, the 2015 Bonds, their transfer and the income therefrom (including any profit made on the sale thereof) are exempt from taxation within the Commonwealth. Bond Counsel expresses no opinion as to whether the 2015 Bonds or the interest thereon will be included in the measure of Massachusetts estate and inheritance taxes and certain Massachusetts corporation excise and franchise taxes. Bond Counsel expresses no opinion regarding any other Massachusetts tax consequences, or regarding tax consequences of states other than The Commonwealth of Massachusetts.

ELIGIBILITY FOR INVESTMENT

The Enabling Act provides that the 2015 Bonds are eligible for investment by all Massachusetts insurance companies, trust companies in their commercial departments, banking associations, executors, trustees and other fiduciaries.

RATINGS

The 2015 Bonds have been assigned ratings of "AA" (outlook: stable) by Fitch, Inc. ("Fitch"), "Aa2" (outlook: stable) by Moody's Investors Service ("Moody's") and "AA" (outlook: stable) by Standard & Poor's Ratings Services, a Division of The McGraw-Hill Companies, Inc. ("S&P"), respectively. Such ratings reflect only the respective views of Fitch, Moody's and S&P, and an explanation of the significance of such ratings may be obtained from the rating agency furnishing the same. There is no assurance that such ratings will continue for any given period of time or that they will not be revised or withdrawn entirely by any or all of such rating agencies if, in its or their judgment, circumstances so warrant. Any such downward revision or withdrawal of such ratings may have an adverse effect on the market price of the 2015 Bonds.

FORWARD-LOOKING STATEMENTS

If and when included in this Official Statement, the words "expects," "forecasts," "projects," "intends," "anticipates," "estimates" and analogous expressions are intended to identify forward-looking statements as defined in the Securities Act of 1933, as amended, and any such statements inherently are subject to a variety of risks and uncertainties that could cause actual results to differ materially from those projected. Such risks and uncertainties include, among others, general economic and business conditions, changes in political, social and economic conditions, regulatory initiatives and compliance with governmental regulations, litigation and various other events, conditions and circumstances affecting airports and the airline industry, seaports, maritime and commercial real estate, many of which are beyond the control of the Authority. These forward-looking statements speak only as of the date of this Official Statement. The Authority disclaims any obligation or undertaking to release publicly any updates or revisions to any forward-looking statement contained herein to reflect any change in the Authority's expectations with regard thereto or any change in events, conditions or circumstances on which any such statement is based.

CERTAIN LEGAL MATTERS

The unqualified approving opinion of Foley & Lardner LLP, Boston, Massachusetts, Bond Counsel to the Authority, will be furnished upon delivery of the 2015 Bonds; the proposed form of such opinion is set forth in APPENDIX G. Certain legal matters will be passed on for the Authority by Rachael S. Rollins, Esquire, its Chief Legal Counsel, and by Locke Lord LLP (successor by merger to Edwards Wildman Palmer LLP), Boston, Massachusetts, its Disclosure Counsel. Certain legal matters will be passed on for the Underwriters by their counsel, Mintz, Levin, Cohn, Ferris, Glovsky and Popeo, P.C., Boston, Massachusetts.

INDEPENDENT AUDITORS

The financial statements of the Authority as of and for the years ended June 30, 2014 and 2013 included in APPENDIX B of this Official Statement have been audited by Ernst & Young LLP, independent auditors, as stated in their report appearing therein.

The prospective financial information (forecasted Operating Results and Debt Service Coverage) included within this Official Statement and the appendices hereto was prepared by the Authority in accordance with accounting principles required by the 1978 Trust Agreement in order to show forecasted debt service coverage and ability to meet other required fund deposits; such information was not prepared with a view toward compliance with the guidelines established by the American Institute of Certified Public Accountants for preparation and presentation of prospective financial information. The prospective financial information included in this Official Statement has been prepared by and is the responsibility of the Authority's management. Neither Ernst & Young LLP nor any other independent auditor has examined, compiled, nor performed any procedures with respect to the accompanying forecast, and accordingly, neither Ernst & Young LLP nor any other independent auditor expresses an opinion or any other form of assurance with respect thereto.

MARKET ANALYSIS AND REVIEW OF AIRPORT PROPERTIES NET REVENUES

The Airport Market Analysis set forth in APPENDIX C was prepared by ICF in connection with the issuance of the 2015 Bonds. Such report is set forth herein in reliance upon the knowledge and experience of such firm as airport consultants. ICF has consented to the inclusion of their report herein.

The Review of Airport Properties Net Revenues Forecasts set forth in APPENDIX D was prepared by LeighFisher in connection with the issuance of the 2015 Bonds. The review should be read in its entirety for an understanding of the forecasts and the key assumptions therein. Such review is set forth herein in reliance upon the knowledge and experience of such firm as airport financial consultants. LeighFisher has consented to the inclusion of their report herein.

UNDERWRITING

The 2015 Bonds are being purchased by the underwriters listed on the cover page hereof (collectively, the "Underwriters"), for whom Citigroup Global Markets Inc. is acting as representative. The Underwriters have agreed, subject to certain conditions, to purchase all of the 2015 Bonds from the Authority at an aggregate underwriters' discount from the initial public offering prices or yields set forth on page (i) hereof equal to \$634,617.56 and to reoffer such 2015 Bonds at public offering prices not higher than or at yields not lower than those set forth on page (i) hereof. The Underwriters are obligated to purchase all such 2015 Bonds if any are purchased. The obligation of the Underwriters to make each such purchase will be subject to certain terms and conditions set forth in the purchase contract relating to the 2015 Bonds, the approval of certain legal matters by counsel and certain other conditions.

The 2015 Bonds may be offered and sold by the Underwriters to certain dealers (including dealers depositing such 2015 Bonds in unit investment trusts or mutual funds, some of which may be managed by the Underwriters) and certain dealer banks and banks acting as agents at prices lower (or yields higher) than the public offering prices (or yields) set forth on page (i) of this Official Statement. Subsequent to such initial public offering,

the Underwriters may change the public offering prices (or yields) as they may deem necessary in connection with the offering of such 2015 Bonds.

The following language has been provided by the Underwriters named therein. The Authority takes no responsibility as to the accuracy or completeness thereof.

Citigroup Global Markets Inc. ("Citigroup"), an underwriter of the 2015 Bonds, has entered into a retail distribution agreement with each of TMC Bonds L.L.C. ("TMC") and UBS Financial Services Inc. ("UBSFS"). Under these distribution agreements, Citigroup may distribute municipal securities to retail investors through the financial advisor network of UBSFS and the electronic primary offering platform of TMC. As part of this arrangement, Citigroup may compensate TMC (and TMC may compensate its electronic platform member firms) and UBSFS for their selling efforts with respect to the 2015 Bonds.

Jefferies LLC ("Jefferies"), an underwriter of the 2015 Bonds, has entered into an agreement (the "Agreement") with E*TRADE Securities LLC ("E*TRADE") for the retail distribution of municipal securities. Pursuant to the Agreement, Jefferies will sell 2015 Bonds to E*TRADE and will share a portion of its selling concession compensation with E*TRADE.

Loop Capital Markets LLC ("Loop Capital") has entered into distribution agreements (each a "Distribution Agreement") with each of Deutsche Bank Securities Inc. ("DBS") and Credit Suisse Securities USA LLC ("CS") for the retail distribution of certain securities offerings at the original issue prices. Pursuant to each Distribution Agreement, each of DBS and CS will purchase the 2015 Bonds from Loop Capital at the original issue prices less a negotiated portion of the selling concession applicable to any 2015 Bonds that such firm sells.

Each of the Underwriters and their respective affiliates are full service financial institutions engaged in various activities, which may include securities trading, commercial and investment banking, financial advisory, investment management, principal investment, hedging, financing and brokerage activities. Certain of the Underwriters and their respective affiliates have, from time to time, performed, and may in the future perform, various investment banking services for the Authority for which they received or will receive customary fees and expenses. In the ordinary course of their various business activities, each of the Underwriters and their respective affiliates may make or hold a broad array of investments and actively trade debt and equity securities (or related derivative securities) and financial instruments (which may include bank loans and/or credit default swaps) for their own account and for the accounts of their customers and may at any time hold long and short positions in such securities and instruments. Such investment and securities activities may involve securities and instruments of the Authority.

One or more of the Underwriters may have from time to time entered into, and may in the future enter into, distribution agreements with other broker-dealers (that have not been designated by the Authority as Underwriters) for the distribution of the 2015 Bonds at the original issue prices. Such agreements generally provide that the relevant Underwriter will share a portion of its underwriting compensation or selling concession with such broker-dealers.

FINANCIAL ADVISOR

Public Financial Management, Inc. ("PFM") is serving as financial advisor to the Authority for the issuance of the 2015 Bonds. PFM is not obligated to undertake, and has not undertaken, either to make an independent verification of or to assume responsibility for, the accuracy, completeness, or fairness of the information contained in this Official Statement. PFM is an independent financial advisory firm and is not engaged in the business of underwriting, trading or distributing securities. PFM is a registered municipal advisor with the Securities and Exchange Commission and the Municipal Securities Rulemaking Board under the Dodd-Frank Act of 2010.

CONTINUING DISCLOSURE

1978 Trust Agreement Information

The Authority is required by the 1978 Trust Agreement to prepare, file with the Trustee and mail to all Bondholders of Record (DTC or DTC's partnership nominee, as long as the 2015 Bonds are so registered), within 60 days of the end of each fiscal year, a report setting forth, among other things, the status of all funds and accounts created under the 1978 Trust Agreement, and to prepare, file with the Trustee and mail to all such Bondholders of Record within three months of the end of each fiscal year a report on the audit of the books and accounts of the Authority by the Authority's independent public accountants. The Authority is also required by the 1978 Trust Agreement to send certain documents and reports to all Bondholders of Record. The Director of Administration and Finance of the Authority, or his or her designee from time to time, shall be the contact person on behalf of the Authority from whom the foregoing information, data and notices may be obtained. The name, address and telephone number of the initial contact person are John P. Pranckevicius, Director of Administration and Finance and Secretary-Treasurer, Massachusetts Port Authority, One Harborside Drive, Suite 200S, East Boston, Massachusetts 02128-2909, Tel: (617) 568-5000.

Continuing Disclosure Undertakings

The Authority has undertaken for the benefit of the owners of the 2015 Bonds to provide certain continuing disclosure pursuant to the provisions of Rule 15c2-12(b)(5) under the Securities Exchange Act of 1934 (as amended, the "Rule"). Specifically, the Authority executed and delivered a Continuing Disclosure Certificate dated as of July 19, 2012 (the "Continuing Disclosure Certificate") for the benefit of the owners of all Bonds (including the 2015 Bonds) issued by or on behalf of the Authority that are designated by the Authority as subject to and having the benefits of the Continuing Disclosure Certificate. The Continuing Disclosure Certificate requires the Authority to provide, or cause to be provided, annual financial information and operating data and event notices with respect to the 2015 Bonds in accordance with the Rule. See APPENDIX F – Form of Continuing Disclosure Certificate.

In connection with the issuance of its PFC Revenue Bonds and its CFC Revenue Bonds, the Authority has agreed to provide annual updated data with respect to certain other information regarding the Authority and the Airport pursuant to a Continuing Disclosure Agreement dated as of May 6, 1999 between the Authority and The Bank of New York with respect to the PFC Revenue Bonds (the "PFC CDA") and a Continuing Disclosure Certificate dated as of June 15, 2011 with respect to the CFC Revenue Bonds (the "CFC Disclosure Certificate"). The Authority has also previously undertaken for the benefit of the owners of its Bonds issued prior to the 2015 Bonds certain continuing disclosure pursuant to a Continuing Disclosure Agreement dated as of August 1, 1997 (the "1997 CDA") between the Authority and U.S. Bank National Association (as successor-in-interest to State Street Bank and Trust Company).

In order to provide certain continuing disclosure with respect to its Bonds previously issued under the 1978 Trust Agreement, its PFC Revenue Bonds and CFC Revenue Bonds, the Authority entered into a Disclosure Dissemination Agent Agreement with Digital Assurance Certification, L.L.C. ("DAC"), dated as of January 8, 2010. The Authority shall amend the Disclosure Dissemination Agreement to include coverage of the 2015 Bonds by this agreement.

For fiscal year 2011, when the Annual Filing was filed as part of the Authority's Comprehensive Annual Financial Report, fiscal year 2011 data in one of the appendices pertaining to the CFC Revenue Bonds was available only from July 2010 through March 2011. The Authority supplemented such appendix when the information became available to include data from July 2010 through June 2011, which supplemental information was filed on May 11, 2012. In addition, during the last five years, certain notices regarding changes in short-term ratings on the 2008-A Bonds and the Authority's Series 2010-D Bonds due to changes in the respective credit provider ratings were not filed; and certain notices regarding changes in ratings on certain of the insured Bonds with respect to bond insurer rating downgrades either were not filed or were not timely filed. In the case of the bond insurer rating downgrades, in each instance the downgrade resulted in the rating on the insured Bonds being identical to the underlying rating of the Authority.

The execution and delivery of this Official Statement have been duly authorized by the Authority.

MASSACHUSETTS PORT AUTHORITY

By: <u>/s/ Douglas M. Husid</u>
Douglas M. Husid, Vice Chairman

By: <u>/s/ Thomas P. Glynn</u>
Thomas P. Glynn, Chief Executive Officer and Executive Director

APPENDIX A

INFORMATION STATEMENT OF THE AUTHORITY

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THE AUTHORITY

Purpose

This Information Statement provides certain information concerning the Massachusetts Port Authority (the "Authority") in connection with the sale by the Authority of its Revenue Bonds, Series 2015-A (Non-AMT) (the "2015-A Bonds"), and its Revenue Bonds, Series 2015-B (AMT) (the "2015-B Bonds," and collectively with the 2015-A Bonds, the "2015 Bonds"). Capitalized terms not defined in this Appendix A are used as defined in the Official Statement. The 2015 Bonds are being issued under the 1978 Trust Agreement and are secured solely by the Revenues pledged thereunder.

The Authority

The Authority, created pursuant to Chapter 465 of the Massachusetts Acts of 1956, as amended to date (the "Enabling Act"), is a body politic and corporate and a public instrumentality of The Commonwealth of Massachusetts (the "Commonwealth" or "Massachusetts"). The Authority owns, operates and manages the following two Projects (as defined in the Enabling Act): the "Airport Properties," which consist of Boston-Logan International Airport (the "Airport," "Logan" or "Logan Airport"), Laurence G. Hanscom Field ("Hanscom Field") and Worcester Regional Airport ("Worcester Regional Airport"); and the "Port Properties," which consist of certain facilities in the Port of Boston (the "Port") and other properties further described herein.

Powers and Facilities

Under the Enabling Act, the Authority has general power, inter alia (a) to issue its revenue bonds and to borrow money in anticipation thereof, (b) to fix, revise, charge and collect tolls, rates, fees, rentals and charges for use of the Projects, (c) to maintain, repair and operate and to extend, enlarge and improve the Projects, and (d) to construct or acquire Additional Facilities (as defined in the Enabling Act) within the Commonwealth when authorized by the Legislature of the Commonwealth. The Authority has the power to acquire property by purchase or through the exercise of the right of eminent domain in certain circumstances. The Authority has no taxing power and receives no money from the Commonwealth's budget.

The Authority's facilities include the Airport Properties, consisting of the Airport, Hanscom Field and Worcester Regional Airport and the Port Properties, consisting of Moran Terminal, Hoosac Pier (site of Constitution Center), Mystic Piers 1, 48, 49 and 50 and the Medford Street Terminal, all of which are located in Charlestown; Conley Terminal, the North Jetty and Fargo Street Terminals, the former Army Base (including Black Falcon Cruise Terminal), the Boston Fish Pier, Commonwealth Pier (site of World Trade Center Boston), and a portion of Commonwealth Flats, all of which are located in South Boston; and the East Boston Piers and the Boston Marine Works, both located in East Boston.

Members and Management

The Enabling Act provides that the Authority shall consist of seven Members (collectively, the "Board"). Six Members are appointed by the Governor of the Commonwealth, including the Secretary of Transportation of the Commonwealth; the seventh member is appointed by the Massachusetts Port Authority Community Advisory Committee. Four Members of the Board constitute a quorum and the affirmative vote of four Members is necessary for any action taken by the Board. With the exception of the Secretary of Transportation, the Members are appointed for staggered seven-year terms. Members completing a term in office are eligible for reappointment and remain in office until their successors are appointed, except that any Member appointed to fill a vacancy shall serve only for the unexpired term. The Members of the Board serve without compensation, although they are reimbursed for expenses they incur in carrying out their duties.

The Chairman of the Board is elected annually by the Members. The Members also annually elect a Vice Chairman and a Secretary-Treasurer (who need not be a Member of the Board), both of whom serve at the pleasure of the Members. The current Members of the Board and the expiration dates of their terms are as follows:

Members of the Board Stanhania Dallaala

Expiration of Term (June 30)

*Secretary of Transportation and Chief Executive Officer of the Massachusetts Department of Transportation (MassDOT), Commonwealth of Massachusetts	*
Michael P. Angelini, Chairman Chairman, Bowditch & Dewey	2017
Douglas M. Husid, Vice Chairman Co-Managing Director, Goulston & Storrs	2015 [†]
Lewis Evangelidis Worcester County Sheriff	2020
L. Duane Jackson Managing Partner, Alinea Capital Partners, LLC	2018
Elizabeth Morningstar Chief Executive Officer, Boston Public Market	2016
Sean M. O'Brien President, Teamsters Local 25	2019

^{*}The Secretary of Transportation is an ex officio Member of the Board.

The management of the Authority and its operations is carried out by a staff headed by the Chief Executive Officer and Executive Director, who is appointed by and reports directly to the Board.

The Authority has two operating Departments – Aviation and Maritime – each of which is charged with profit and loss responsibility. The staff members overseeing the operation of the Authority's facilities are charged with balancing financial performance with operational demands, customer service and community impacts, as well as forecasting the implications of any proposed capital programs or operating initiatives, and for the collection of accounts receivable.

The senior staff of the Authority currently includes the following persons, who are each aided by administrative, operating and maintenance personnel:

Thomas P. Glynn, Chief Executive Officer and Executive Director, joined the Authority in November 2012. In April 2014, the Board voted to extend Mr. Glynn's contract for two years, through October 2017. Prior to coming to the Authority, he served for 14 years as Chief Operating Officer of Partners HealthCare, a network of teaching hospitals and neighborhood health centers, including Massachusetts General Hospital and Brigham and Women's Hospital (both affiliated with Harvard Medical School), with over \$8 billion in annual operating revenues. Before that he served as Deputy Secretary of Labor during the Clinton Administration (from 1993 to 1996) and General Manager of the Massachusetts Bay Transportation Authority ("MBTA") from 1989 to 1991. Mr. Glynn earned a B.A. in Economics from Tufts University and a Ph.D. from the Heller School at Brandeis University. He has served as a trustee at Brandeis University and a director at the John Hancock Company.

John P. Pranckevicius, Director of Administration and Finance and Secretary-Treasurer, joined the Authority in May 2007. He oversees the Authority's financial responsibilities including treasury, budgeting, accounting, debt and investment management and administration, and serves as Treasurer-Custodian of the Massachusetts Port Authority Employees' Retirement System and Chair of the Authority's Retiree Benefits Trust. Prior to joining the Authority, he served as the Chief Financial Officer for the City of Worcester, Massachusetts. Mr. Pranckevicius is licensed in the Commonwealth as a Certified Public Accountant, and holds a B.A. degree and a Masters in Public Administration from the University of Maine and an M.S. in Accountancy from Bentley University.

[†] Will continue to serve until a successor is appointed and qualified.

Francis X. Anglin, Chief Information Officer, joined the Authority in September 1984 and was appointed to his current position in October 1994. He oversees the Authority's Information and Telecommunications systems for employees and members of the public who use the Authority's facilities and systems. Prior to joining the Authority, Mr. Anglin's private sector work included: food manufacturing—wholesale and retail; and education—computer design and curriculum. He holds a B.S. in Transportation Logistics from Northeastern University and an M.B.A. from Babson College.

Matthew Brelis, Director of Media Relations, joined the Authority in 2007. He directs a staff of three, and proactively shapes the public perception of the Authority through traditional and social media. Prior to coming to the Authority, Mr. Brelis spent 27 years at major metropolitan newspapers. He received a bachelor's degree from Vassar College and is a Nieman Fellow at Harvard University.

Betty J. Desrosiers, Chief of Staff/Director of Strategic Planning, joined the Authority in 1992. She was appointed Director of Strategic Planning in November 2012 and Chief of Staff in November 2013. She previously served as Director of Aviation Planning and Strategy, a position she held since 1995, as well as Interim Chief of Staff from July 2012 through November 2012. Prior to joining the Authority, Ms. Desrosiers worked as an urban planner for ten years with the City of Cambridge and spent three years at the Massachusetts Aeronautics Commission as the Project Manager for the Second Major Airport Siting Study. She has a B.A. from the University of Massachusetts, and a Masters in Public Administration from Harvard University.

James P. Doolin, Chief Development Officer, joined the Authority in 1995 as Deputy Director for Planning and Development. Mr. Doolin was appointed Chief Development Officer in March 2013, and also served as Acting Chief Development Officer from March 2012 to March 2013. Prior to joining the Authority, Mr. Doolin was a Senior Associate at Sasaki Associates, a multidisciplinary consulting firm with services in planning, urban design, architecture and landscape architecture.

Edward C. Freni, Director of Aviation, joined the Aviation Division of the Authority in 2000 as the Deputy Director of Aviation Operations at Logan Airport, Hanscom Field and Worcester Regional Airport and was appointed to his current position in 2007. He is responsible for administering, coordinating and managing all airside and landside activities and operations at all three airports. Prior to joining the Authority, Mr. Freni worked for 23 years at American Airlines. He holds a B.S. degree from the University of New Hampshire.

David M. Gambone, Director of Human Resources, joined the Authority in March 2004. He oversees all core functions of Human Resources, including recruitment, compensation, benefits, training and development, performance management, employee relations, health and wellness, leave management, and human resources management systems. Mr. Gambone has over 25 years of human resources management experience having worked in the private sector as the head of human resources for consulting firms and training organizations focused on executive leadership development. He holds a B.A. in Philosophy from Boston College. He is also certified as a Senior Professional in Human Resources (SPHR).

Deborah A. Hadden, Port Director, joined the Authority in 1994 and was appointed to her current position in September 2013, having served as Acting Port Director since October 2012. She oversees all aspects of the Authority's Maritime Department and is responsible for the management and promotion of the Port of Boston, including strategies for the development, marketing, operation and maintenance of its public marine terminals. She previously served as the Deputy Port Director, Properties and Transportation, a position she held from 2000 to 2012. She has also served as the Manager of Maritime Environmental Affairs and Projects as well as the Environmental Permitting Program Manager. Prior to joining the Authority, Ms. Hadden worked with Fort Point Associates, Inc. and Camp Dresser & McKee, Inc. She has a B.S. in Biology from Bucknell University and a M.S. in Biology from Northeastern University.

Joris M. Jabouin, Director of Internal Audit, joined the Authority in October 2012. He assists the Members of the Authority with their oversight responsibilities through audits, investigations and evaluations of the Authority's activities. Mr. Jabouin has over 20 years of auditing experience as a regulator, external auditor and internal auditor reviewing the business and operations of governmental entities, publicly-traded companies, private organizations and trusts. Prior to joining the Authority, he served as the chief auditor for Burger King Corporation, BankUnited

and Dresdner Bank in Miami, Florida. Mr. Jabouin is a Certified Public Accountant and holds Master of Business Administration and Bachelor of Business Administration degrees from the University of Miami.

Danny T. Levy, Director of Strategic Communications & Marketing, joined the Authority in 2004. She oversees the Authority's external and internal communications and marketing strategies, branding, promotional campaigns and event planning both for the Authority and its facilities. Ms. Levy was appointed to her current position in 2007 after three years as the Authority's Director of Communications overseeing media relations, during which time she implemented the business practices and corporate communications experience she gained in financial services (Bank of America formerly FleetBoston Financial Corporation) and certain of Boston's leading non-profits—the United Way of Mass Bay and the Boys & Girls Clubs of Boston. She has a B.A. from Boston College and an M.B.A. from Simmons School of Management.

José C. Massó, III, Director of Community Relations, joined the Authority in March 2013 and is responsible for directing the development and implementation of community relations and charitable giving initiatives designed to lessen the impact the Authority's facilities have on its neighbors. Mr. Massó has a long and distinguished career in government, community affairs, communications and consulting. He began his public service career in 1983 in the Governor's Office of Community Services and has held key posts at the MBTA, Northeastern University and the Puerto Rico Federal Affairs Administration. He is fluent in Spanish and skilled in cross-cultural communications, with a B.A. degree from Antioch College.

Joseph F. McCann, Comptroller, joined the Authority in 2010 and is responsible for coordinating all accounting activities throughout the Authority and administering the Authority's internal controls and financial reporting efforts. Prior to joining the Authority, Mr. McCann was the Chief Financial Officer for the Massachusetts Turnpike Authority. Mr. McCann is licensed in the Commonwealth as a Certified Public Accountant, and holds a B.S. degree from Northeastern University.

George Naccara, Chief Security Officer, joined the Authority in January 2014. He oversees the implementation, management and administration of all security and emergency management activities for all Authority physical assets. Previously, he served as the Federal Security Director at Logan Airport, working for the Transportation Security Administration ("TSA") under the U.S. Department of Homeland Security. He had responsibility for all airports in Massachusetts and for security associated with mass transit, commuter rail, maritime and pipeline issues in the Commonwealth. Prior to TSA, he served in the U.S. Coast Guard for over 37 years, retiring as a Rear Admiral. A Harvard University Fellow, he also holds a master's degree from Central Michigan University and a bachelor's degree from the U.S. Coast Guard Academy.

Rachael S. Rollins, Chief Legal Counsel, joined the Authority in September 2013. She oversees legal activity in all functional areas including real estate, construction, litigation, employment and ethics, maritime, aviation, security and public finance. Prior to joining the Authority, Ms. Rollins was the General Counsel of the Massachusetts Department of Transportation and the MBTA. She is also a former Assistant United States Attorney for the District of Massachusetts. Prior to joining the United States Attorney's Office, Ms. Rollins was an associate at the law firms of Bingham McCutchen LLP and Seyfarth Shaw LLP. Ms. Rollins holds degrees from Northeastern School of Law (J.D.), Georgetown University Law Center (L.L.M.) and University of Massachusetts at Amherst (B.A.). Ms. Rollins has announced she will be leaving the Authority effective July 31, 2015. Associate Chief Legal Counsel Catherine M. McDonald will serve as Interim Chief Legal Counsel until a new Chief Legal Counsel is appointed by the Board.

Houssam H. Sleiman, Director of Capital Programs and Environmental Affairs, joined the Authority in October 1993 and was appointed to his current position in May 2006. He directs the overall management of the Authority's capital improvement program, safety program, utilities management, in-house design and environmental permitting and management. He also served as the Authority's Director of Aviation Administration and Development. Prior to joining the Authority, he worked for the Town of Lexington, Massachusetts. He is a licensed registered Professional Engineer in the Commonwealth. He holds a M.S. degree in Civil Engineering and a B.S. degree in Civil Engineering from Northeastern University.

Kelly B. Strong, Director of Labor Relations/Labor Counsel, joined the Authority in April 2004. He is responsible for all matters related to each of the Authority's union collective bargaining agreements and all other

union related matters affecting the Authority's mission and its tenants, customers, employees and the public. Mr. Strong is responsible for negotiating and properly administrating the Authority's union collective agreements, as well as overseeing the resolution of all union labor disputes. Prior to joining the Authority, he was a Senior Labor Relations Representative for the MBTA and prior to that was a labor and employment attorney with a Boston law firm. He has a B.A. in Criminal Justice from the Military College of Vermont at Norwich University and received his J.D. from Suffolk University Law School.

Anna M. Tenaglia, Director of Treasury, joined the Authority in June 2008 and was appointed to her current position in March 2015. She is responsible for defining and implementing the Authority's financial policy including debt financing, investment of the Authority's cash and development of the strategy for the use of passenger facility charge ("PFC") applications, and she manages all aspects of the Treasury department. Prior to joining the Authority, Ms. Tenaglia was the Chief Financial Officer for the City of Gloucester, the Treasurer/Assistant Finance Director for the City of Chelsea and was also a former Vice President at State Street's Institutional Investor Services Division. She holds a B.S. in finance from Suffolk University and is currently pursuing an M.B.A. with a concentration in finance from Southern New Hampshire University. Designations include Certified Treasury Professional (CTP) and Certified Energy Procurement Professional (CEP).

Kenneth L. Turner, Director of Diversity & Inclusion/Compliance, joined the Authority in June 2013. He oversees and manages the Authority's multiple diversity programs, including business and supplier diversity, workforce diversity and airport concessions, as well as all compliance initiatives associated with the Authority's Disadvantaged/Minority/Women Business Enterprise programs. Prior to joining the Authority, Mr. Turner served as Deputy Secretary for Administration & Finance for the Commonwealth of Massachusetts Department of Veterans' Services. He also has over 20 years of general management and executive experience in various Fortune 100 companies, including having served as a Senior Vice President at AOL Time Warner and as Vice President of Marketing for Simmons College. A retired U.S. Navy Captain with 26 years of service, Mr. Turner holds a B.S. degree in Liberal Arts from Southern University and A&M College.

AIRPORT PROPERTIES

Boston-Logan International Airport

The Airport is the principal source of the Authority's Revenues, Operating Expenses and Net Revenues and is the dominant factor in the determination of the Authority's financial condition. The Airport is situated principally in East Boston (with a small portion situated in the Town of Winthrop), approximately three miles from downtown Boston and adjacent to Boston Harbor. The total land area of the Airport is approximately 2,400 acres.

Air Service Region. The Airport serves the greater Boston area and plays the leading role in New England's air service infrastructure. Based upon information provided by the United States Department of Transportation ("*USDOT*") and Airport traffic statistics for the one-year period ending September 30, 2014 (the most recent data available), approximately 95.0% of total scheduled domestic passengers at the Airport begin or end their air travel ("*origin-destination*" travel) at Logan Airport. See APPENDIX C – Boston Logan International Airport Market Analysis.

The high percentage of origin-destination passengers in both the business and leisure markets is in contrast to many other major airports that are used in large part by airlines as connecting hubs for passengers en route to another point as their final destination. As a result of this traffic base, overall activity levels at Logan Airport are less vulnerable to fluctuations in connecting traffic resulting from route restructuring by individual airlines or other factors affecting particular airlines. Rather, Airport activity levels tend to reflect general economic conditions, regional economic and demographic trends and the economics of the airline industry. See APPENDIX C – Boston Logan International Airport Market Analysis.

Massachusetts continues to recover from the global recession. The Boston metropolitan area had an unemployment rate of 4.9% in January 2015, below the national average of 5.7%, and 4.9 percentage points lower than the peak of 9.8% in January 2010. The unemployment rate in the Boston metropolitan area was the 12th lowest among the nation's 49 large metropolitan areas (*i.e.*, those with populations of larger than one million) as of January

2015. In the greater Boston area, the following six major sectors have contributed to the Boston region's economic growth since the early 1990s and currently account for approximately one half of the Boston area employment base: high technology, biotechnology, health care services, financial services, higher education and tourism. The Boston metropolitan area's average per capita personal income in calendar year 2013 was 38.0% above the national average and 12.7% above the New England average. During the period 2000 to 2012, Massachusetts per capita income grew faster than in the U.S. as a whole, and it is projected to grow at a pace slightly above the national average during the period 2012 to 2030. See APPENDIX C – Boston Logan International Airport Market Analysis.

Airport Traffic Levels. The following table summarizes Airport operations and passenger traffic statistics for the most recent five fiscal years and the nine-month periods ended March 31, 2014 and 2015. Both operations and passengers are grouped by origin and destination regardless of whether the carrier was a U.S. air carrier or a foreign flag carrier.

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SELECTED BOSTON-LOGAN INTERNATIONAL AIRPORT TRAFFIC STATISTICS

(Fiscal Year Ended June 30)

	2010	2011	2012	2013	2014	Nine Months Ending 3/31/2014	Nine Months Ending 3/31/2015
Aircraft Operations (1)							
Domestic (2)	200,015	213,314	210,309	206,541	219,534	162,070	164,155
International (3)	33,814	35,707	37,956	38,400	38,059	27,542	29,861
Regional	100,148	92,670	87,895	79,634	79,983	59,462	54,330
General Aviation	13,766	20,740	29,062	26,924	26,286	18,948	18,656
Total Operations	347,743	362,431	365,222	351,499	363,862	268,022	267,002
Aircraft Landed Weights (1,000 pounds) (4)	18,681,983	19,712,657	19,858,768	19,494,836	20,297,299	14,859,914	15,142,886
Passengers Traffic							
Domestic (2)							
Enplaned	10,062,680	10,988,533	11,296,136	11,374,807	11,990,184	8,756,156	9,097,352
Deplaned	10,085,288	11,026,815	11,308,598	11,409,669	12,045,512	8,723,869	9,062,895
International (3)							
Enplaned	1,818,370	1,975,182	2,146,491	2,216,937	2,337,269	1,645,684	1,853,391
Deplaned	1,834,023	2,001,459	2,182,472	2,255,775	2,348,399	1,676,273	1,896,158
Regional	1.006.145	1 174 412	1 114 704	1 020 077	1 011 200	720 456	670.000
Enplaned	1,236,145	1,174,413	1,114,704	1,029,877	1,011,299	720,456	679,000
Deplaned	1,223,010	1,173,788	1,117,810	1,024,898	1,021,968	721,046	686,383
Subtotal	26,259,516	28,340,190	29,166,211	29,311,963	30,754,631	22,243,484	23,275,179
General Aviation							
Total Passengers	54,946	84,096	117,798	96,942	95,632	68,662	67,804
Total Passengers	26,314,462	28,424,286	29,284,009	29,408,905	30,850,263	22,312,146	23,342,983
Total Enplaned Passengers (excluding GA)	13,117,195	14,138,128	14,557,331	14,621,621	15,338,752	11,122,296	11,629,743
(creating only	13,117,173	14,130,120	14,337,331	14,021,021	13,330,732	11,122,270	11,027,743
Average Passengers Per Flight							
Domestic (2)	100.7	103.2	107.5	110.3	109.5	107.9	110.6
International (3)	108.0	111.4	114.1	116.5	123.1	120.6	125.6
Regional	24.6	25.3	25.4	25.8	25.4	24.2	25.1
Air Carrier and Passenger Metrics							
Primary carrier	JetBlue	JetBlue	JetBlue	JetBlue	JetBlue	JetBlue	JetBlue
Primary carrier market share	16.4%	21.2%	23.9%	26.3%	26.5%	26.7%	27.1%
Two top carriers market share	33.2%	36.4%	38.8%	40.6%	40.7%	40.6%	41.7%
Origination & destination share (5)	95.0% (6)	95.6% (7)	95.5% (7)) 95.0% (7)	94.2% (7)	NA	NA
Compensatory airline payments to Massport per enplaned passenger (8)	\$14.93	\$13.65	\$13.20	\$13.16	\$13.55	\$13.59	\$14.13
Logan Airport revenue per enplaned passenger (9)	\$33.45	\$32.23	\$32.75	\$33.00	\$34.07	\$34.25	\$35.49
Total Cargo & Mail (1,000 pounds)	563,210	568,836	546,243	552,378	572,226	422,833	467,493

⁽¹⁾ Includes all-cargo flights, but excludes helicopters.

Source: Authority reports.

⁽²⁾ Includes domestic flights on jets and charters.

⁽³⁾ Includes international flights on jets, charters and commuter carriers.

⁽⁴⁾ Excludes general aviation and non-tenant.

⁽⁵⁾ The FY2010 statistic reflects the percentage of domestic origin and destination travelers as compared to all domestic passengers. The statistic for FY2011 through FY2014 is calculated based on outbound passengers only.

⁽⁶⁾ Source: ICF SH&E market study dated June 21, 2012.

⁽⁷⁾ Source: Massachusetts Port Authority; U.S. DOT, Air Passenger Origin-Destination Survey, reconciled to Schedules T1 and 298C T1; as reported in Appendix CFC-1 to the Authority's CAFR.

⁽⁸⁾ Consists of landing fees, terminal rents, certain non-PFC passenger fees and aircraft parking fees.

⁽⁹⁾ Consists of landing fees, terminal rents, parking, utilities, non-terminal and ground rent, concessions and baggage fees.

Passenger traffic at the Airport totaled 30.8 million passengers for fiscal year 2014, a 4.9% increase from the 29.4 million passengers who used the Airport in the prior year. Passenger traffic increased 0.4% in fiscal year 2013 and 3.0% in fiscal year 2012. For the nine-month period ending March 31, 2015 passenger traffic was 4.6% greater than the nine-month period ending March 31, 2014. Landed weights for fiscal year 2014 were 4.1% higher than fiscal year 2013, and in the nine-month period ending March 31, 2015, were 1.9% greater than for the same nine-month period ending in 2014. See "AUTHORITY REVENUES – Airport Properties Revenues" and "MANAGEMENT'S DISCUSSION OF HISTORICAL OPERATING RESULTS."

In fiscal year 2014, regional airlines accounted for approximately 6.6% of total passenger traffic at the Airport, or approximately 2.0 million passengers. The number of regional passengers (excluding passengers traveling internationally) decreased by 1.0% and 8.0% in fiscal years 2014 and 2013, respectively, from the prior fiscal year. In fiscal year 2014, international passengers (including those traveling on foreign flag and regional carriers) accounted for 15.2% of passenger traffic, or approximately 4.7 million passengers. This is an increase of 4.8% or 213,000 international passengers over the prior fiscal year.

On a calendar year basis, passenger traffic at the Airport totaled 31.6 million passengers in 2014, which, according to data from the Airports Council International ("ACP"), ranked it the most active airport in New England and the 18th most active airport in the United States based upon total passenger volume. This represented a 4.7% increase in passenger traffic over calendar year 2013, following calendar year passenger traffic increases of 3.4% and 1.1% in calendar years 2013 and 2012, respectively. In calendar year 2013 (the most recent year for which data is available), Logan Airport was the 54th most active in the world according to data from the ACI.

The following table shows monthly growth in enplaned passengers for the 12 months ended March 31, 2014 and 2015. As shown on the table below, for the 12 months ending March 31, 2015, the number of enplaned passengers at the Airport was 4.9% higher than for the same period in 2014.

BOSTON-LOGAN INTERNATIONAL AIRPORT MONTHLY GROWTH IN ENPLANED PASSENGER (Year over Year) 12 Months ended 3/31/2014 and 3/31/2015

April	1,265,457	1,351,676	6.8%
May	1,325,576	1,415,887	6.8
June	1,402,982	1,462,378	4.2
July	1,470,810	1,552,353	5.5
August	1,502,977	1,560,316	3.8
September	1,243,930	1,326,709	6.7
October	1,349,970	1,416,524	4.9
November	1,154,750	1,215,177	5.2
December	1,208,131	1,262,032	4.5
January	989,775	1,027,286	3.8
February	985,700	987,435	0.2
March	1,250,584	1,315,813	5.2
Total 12 months	15,150,642	15,893,586	4.9%

Source: Authority.

Domestic jet passengers (including charters) accounted for 75.9% of passenger traffic in calendar year 2014 and 75.4% of passenger traffic in calendar year 2013. The Airport's domestic jet passenger traffic reached 24.5 million in calendar year 2014, surpassing the Airport's previous record for domestic jet passengers of 23.5 million in calendar year 2013. This represents a 4.0% increase for calendar year 2014.

In calendar years 2014 and 2013, passengers traveling domestically on regional airlines accounted for approximately 6.4% and 6.7% of total passenger traffic at the Airport, respectively, or approximately 2.0 million passengers each calendar year. The number of regional passengers (excluding passengers traveling internationally)

increased by 1.1% in calendar year 2014, decreased by 2.2% in 2013, decreased by 11.3% in 2012, and increased by 0.6% in calendar year 2011.

International passengers, including those traveling on foreign flag and U.S. flag carriers (including U.S. regional carriers) accounted for 15.8% of passenger traffic in calendar year 2014, or approximately 5.0 million passengers. This segment increased by 9.8% in calendar year 2014 and increased by 3.7% in 2013 following an increase of 10.6% in 2012. Of the 15.8% of passengers traveling internationally in calendar year 2014, 59.0% traveled to or from Europe, 5.0% to or from Middle East, 17.8% to or from Bermuda and the Caribbean, 13.4% to or from Canada, 1.4% to or from Central and South America and 3.4% to or from the Trans-Pacific.

In calendar year 2014, there were approximately 363,797 airline operations (including both commercial and general aviation) at the Airport, an increase of 0.7% from calendar year 2013. While airline operations at the Airport decreased more than 11.1% between calendar year 2005 and 2014, the Airport's total passengers (including both commercial and general aviation) increased by 16.8% over the same period. This was due, in part, to the airlines' use of larger-sized aircraft and their achievement of higher capacity utilization during this period.

Airline Passenger Services. As primarily an origin-destination airport, Logan Airport is served today, as it has been in the past, by a wide variety of carriers. As of July 1, 2015, airline service at the Airport, both scheduled and non-scheduled, will be provided by 43 airlines, as listed in the table below, including nine domestic large jet carriers, 21 non-U.S. flag ("foreign flag") carriers and 13 domestic regional and commuter airlines ("regional airlines" or "regional carriers").

BOSTON-LOGAN INTERNATIONAL AIRPORT AIRLINES SERVING THE AIRPORT* (Scheduled as of July 1, 2015)

U.S. Domestic Large Jet Carriers	U.S. Domestic Regional Carriers ¹					
Alaska	Independent:	Affiliated:				
American/ US Airways	Cape Air	Air Wisconsin (US Airways Express)				
Delta	PenAir	Compass Airlines (Delta Connection)				
JetBlue		Endeavor Air (Delta Connection)				
Southwest		ExpressJet (Delta Connection and United Express)				
Spirit		GoJet (Delta Connection)				
Sun Country		Mesa (United Express)				
United		Piedmont (US Airways Express)				
Virgin America		Republic Airlines (US Airways Express and United Express)				
		Shuttle America (Delta Connection and United Express)				
		SkyWest (United Express)				
		Transtates (United Express)				

	TOTCIENTIAL CATTICIS							
Aer Lingus	Copa Airlines	Lufthansa						
Aeroméxico	El Al	Porter Airlines						
Air Canada ²	Emirates	SATA						
Air France	Hainan Airlines	Swiss International						
Alitalia	Iheria	Turkish Airlines						

Foreign Flag Carriers

Virgin Atlantic Airways British Airways Icelandair Cathay Pacific Wow Air

Japan Airlines

As of July 1, 2015, Logan Airport is also served by 29 different charter-only airlines.

The independent U.S. domestic regional carriers operate their own routes. The affiliated U.S. domestic regional carriers serving Logan are either wholly owned by a network carrier or operate under joint marketing agreements with network carriers. Three affiliated U.S. domestic regional carriers—ExpressJet, Republic and Shuttle America—operate for more than one network carrier.

Includes regional carriers Jazz Air and Sky Regional Airlines, both of which operate as part of Air Canada Express.

The Authority maintains separate statistical data for regional airlines. For purposes of the Authority's data compilation, regional airlines are defined as domestic commuter carriers that exclusively operate smaller regional jet and turbo-prop aircraft with fewer than 100 seats. Most of these carriers are generally subsidiaries or affiliates of major domestic carriers, as noted above, with the exception of Cape Air and PenAir, which operate their own routes. As of June 30, 2014, the top five regional airlines were Shuttle America Corporation with 24.1% of domestic regional passengers, followed by Endeavor Air with 17.2%, Air Wisconsin Airlines Corporation with 11.8%, Republic Airlines with 10.1%, and Cape Air with 9.7% of domestic regional passengers.

In response to competitive pressures, the U.S. airline industry has consolidated over the past decade. In September 2005, US Airways and America West merged, and in October 2008, Delta and Northwest Airlines merged. In November 2010, United Airlines and Continental Airlines completed a merger transaction and in March 2012 consolidated all activity under the United name. In May 2011, Southwest Airlines and AirTran Airways completed a merger transaction and as of the end of calendar year 2014 consolidated all operations under the Southwest name. Finally, in December 2013, American Airlines and U.S. Airways merged, creating the world's largest airline. The single operating certificate was received from the FAA in April 2015; the integration of operations will follow and may take several years. As a result of the above-described mergers, the four largest U.S. air carrier airlines now consist of American/US Airways, Delta, Southwest and United.

The following table shows changes in passenger traffic for the carriers providing service from Logan Airport for the past five fiscal years and for the nine months ended March 31, 2015. For the nine months ended March 31, 2015, the Airport experienced an aggregate 4.64% increase in passenger traffic, compared to the nine months ended March 31, 2014.

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BOSTON-LOGAN INTERNATIONAL AIRPORT ANNUAL GROWTH IN PASSENGERS BY CARRIER

(fiscal year ended June 30, except as noted)

						Nine	Nine	
						Months	Months	
(1)						Ended	Ended	
Air Carrier (1)	<u>2010</u>	<u>2011</u>	<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>3/31/14</u>	<u>3/31/15</u>	Growth %
American/ US Airways (2)	7,887,848	7,320,526	7,117,928	6,868,539	6,941,775	5,047,941	5,152,971	2.08%
American	4,233,823	3,530,568	3,262,121	3,173,727	3,082,718	2,268,191	2,229,092	(1.72)
US Airways	3,654,025	3,789,958	3,855,807	3,694,812	3,859,057	2,779,750	2,923,879	5.18
Delta Air Lines (3)	4,430,631	4,316,337	4,372,566	4,215,879	4,374,313	3,112,465	3,402,825	9.33
JetBlue Airways	4,292,387	6,012,754	6,970,516	7,719,513	8,181,523	5,949,190	6,336,396	6.51
Southwest (4)	2,195,364	2,888,646	2,749,065	2,384,502	2,540,146	1,854,404	1,787,933	(3.58)
AirTran Airways	1,352,869	1,245,129	1,137,054	863,013	599,766	500,341	100,691	(79.88)
Southwest	842,495	1,643,517	1,612,011	1,521,489	1,940,380	1,354,063	1,687,242	24.61
United Airlines (5)	3,537,671	3,574,201	3,636,617	3,611,244	3,749,091	2,754,586	2,599,803	(5.62)
Continental Airlines	1,168,684	1,198,956	834,484	0	0	0	0	*
United	2,368,987	2,375,245	2,802,133	0	0	0	0	*
Foreign Flag	2,516,952	2,683,152	2,822,066	3,034,958	3,359,482	2,365,596	2,764,103	16.85
Regional U.S. Carriers (6)	180,973	181,862	208,271	248,051	265,274	202,197	182,888	(9.55)
Other U.S. Carriers (7)	1,217,690	1,362,712	1,289,182	1,229,277	1,343,027	<u>957,105</u>	1,048,260	9.52
Total ⁽⁸⁾	26,259,516	28,340,190	29,166,211	29,311,963	30,754,631	22,243,484	23,275,179	4.64%

⁽¹⁾ For purposes of comparison, data for consolidated air carriers (American/US Airways, Southwest and United) is presented for all fiscal years. In the case of each such consolidated air carrier, the data provided for each period occurring prior to the consolidation is estimated based on a summation of the individual carrier information for such period. The data provided for period(s) occurring after the consolidation reflects actual data for such period(s). To the extent individual merged carriers continue to operate separately, individual carrier information is also shown for the periods occurring post-merger, which information may not add to the consolidated figure.

Source: Authority.

The relative share of various carriers at the Airport has fluctuated with no individual carrier having a market share of over 26.5% in any of the past ten fiscal years (excluding regional partners). The following table presents the relative shares of the U.S. air carrier airlines carrying the highest shares of total passenger traffic at the Airport, as well as the relative shares of the independent regional airlines and foreign flag carriers, during the last five fiscal years and the nine-month periods ended March 31, 2014 and 2015. As reflected in the table below, in fiscal year 2014, JetBlue Airways ("JetBlue") had the largest market share with 26.5% of all passengers, and for the nine months ended March 31, 2015, JetBlue also had the largest share with 27.1%. The carriers with the highest market shares—American/US Airways (including US Airways Shuttle), Delta Air Lines, JetBlue, Southwest and United Airlines—carried an aggregate of 82.4% of all passengers traveling through the Airport during the nine months ended March 31, 2015. See APPENDIX C – Boston Logan International Airport Market Analysis. The market shares reported in APPENDIX C may differ from those stated herein because the Authority includes data on airlines' regional affiliates when reporting market share data.

⁽²⁾ Includes American Eagle (through November 2011), US Airways Shuttle and associated regional carriers. In December 2013, American merged with US Airways, but both continue to operate independently until operations are integrated.

⁽³⁾ Includes Delta Shuttle, Delta Express and associated regional carriers.

⁽⁴⁾ In May 2011, Southwest merged with AirTran Airways, and effective January 1, 2015, the two airlines are fully integrated under the Southwest name.

⁽⁵⁾ Includes United Express, Continental Express and associated regional carriers. In March 2012, Continental merged into United and discontinued service as an independent entity. For purposes of comparison, data reflects consolidated United and Continental Airlines passenger growth information for all fiscal

⁽⁶⁾ Includes PenAir and Cape Air.

⁽⁷⁾ Includes Alaska Airlines, Spirit Airlines, Sun Country, Virgin America and charter/non-scheduled domestic service.

⁽⁸⁾ Excludes general aviation figures.

Not meaningful.

BOSTON-LOGAN INTERNATIONAL AIRPORT MARKET SHARES OF TOTAL PASSENGER TRAFFIC

(fiscal year ended June 30, except as noted)

Air Carrier	<u>2010</u>	<u>2011</u>	<u>2012</u>	<u>2013</u>	<u>2014</u>	Nine Months Ended 3/31/14	Nine Months Ended 3/31/15
American/ US Airways (1)	20.0%	25.7%	24.5%	23.6%	22.5%	22.7%	22.0%
American	16.1	12.4	11.2	10.9	10.0	10.2	9.5
US Airways	13.9	13.3	13.3	12.7	12.5	12.5	12.5
Delta Air Lines (2)	16.8	15.2	14.9	14.3	14.2	13.9	14.6
JetBlue Airways	16.4	21.2	23.9	26.3	26.5	26.7	27.1
Southwest (3)	8.3	10.2	9.4	8.1	8.2	8.3	7.6
AirTran Airways	5.1	4.4	3.9	2.9	1.9	2.2	0.4
Southwest	3.2	5.8	5.5	5.2	6.3	6.1	7.2
United Airlines (4)	13.4	12.6	12.5	12.3	12.2	12.3	11.1
Continental Airlines	4.4	4.2	2.8				
United	9.0	8.4	9.7				
Foreign Flag	9.6	9.4	9.6	10.3	10.9	10.6	11.8
Regional U.S. Carriers (5)	0.7	0.6	0.7	0.7	0.9	0.9	0.8
Other U.S. Carriers (6)	<u>4.8</u>	<u>5.1</u>	<u>4.4</u>	<u>4.3</u>	<u>4.7</u>	<u>4.6</u>	<u>4.8</u>
Total	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%

⁽¹⁾ Includes American Eagle (through November 2011), US Airways Shuttle and associated regional carriers. In December 2013, American merged with US Airways, but both continue to operate independently until operations are integrated. For purposes of comparison, however, data reflects consolidated American and US Airways market share information for all fiscal years.

Source: Authority.

⁽²⁾ Includes Delta Shuttle, Delta Express and associated regional carriers.

⁽³⁾ In May 2011, Southwest merged with AirTran Airways, and effective January 1, 2015, the two airlines are fully integrated under the Southwest name. For purposes of comparison, data reflects consolidated Southwest and AirTran passenger growth information for all fiscal years.

⁽⁴⁾ Includes United Express, Continental Express and associated regional carriers. In March 2012, Continental merged into United and discontinued service as an independent entity. For purposes of comparison, data reflects consolidated United and Continental Airlines passenger growth information for all fiscal years.

⁽⁵⁾ Includes PenAir and Cape Air.

⁽⁶⁾ Includes Alaska Airlines, Spirit Airlines, Sun Country and Virgin America.

The following table shows changes in passenger traffic for the largest carriers serving Logan Airport for the past five fiscal years and for the nine months ended March 31, 2015. For the nine months ended March 31, 2015, American/US Airways, Delta, JetBlue, other U.S. carriers (as a group), and the foreign flag carriers as a group experienced a positive rate of passenger growth.

BOSTON-LOGAN INTERNATIONAL AIRPORT ANNUAL GROWTH IN PASSENGERS BY CARRIER

(fiscal year ended June 30, except as noted)

						Nine Months	*
Air Carrier (1)	<u>2010</u>	<u>2011</u>	<u>2012</u>	<u>2013</u>	<u>2014</u>	Ended <u>3/31/15</u>	CAGR* 2010-14
American/US Airways (2)	(0.5)%	(7.2)%	(2.8)%	(3.5)%	1.1%	2.1%	(3.1)%
American	2.9	(16.6)	(7.6)	(2.7)	(2.9)	(1.7)	(7.6)
US Airways, Inc.	(4.1)	3.7	1.7	(4.2)	4.4	5.2	1.4
Delta Air Lines (3)	(12.6)	(2.6)	1.3	(3.6)	3.8	9.3	(0.3)
JetBlue Airways	16.9	40.1	15.9	10.7	6.0	6.5	17.5
Southwest (4)	78.7	31.6	(4.8)	(13.3)	6.5	(3.6)	3.7
AirTran Airways	10.1	(8.0)	(8.7)	(24.1)	(30.5)	(79.9)	(18.4)
Southwest (5)		95.1	(1.9)	(5.6)	27.5	24.6	23.2
United Airlines (6)	0.7	1.0	1.7	(0.7)	3.8	(5.6)	1.5
Continental Airlines	0.4	2.6	(30.4)				NM
United	0.9	0.3	18.0				NM
Foreign Flag	3.4	6.6	5.2	7.5	10.7	16.8	7.5
Regional U.S. Carriers (7)	9.4	0.5	14.5	19.1	6.9	(9.5)	10.0
Other U.S. Carriers (8)	39.0	13.0	(2.8)	(5.7)	8.5	8.8	2.5
Total (9)	5.6%	8.0%	3.0%	0.4%	4.9%	4.6%	4.0%

⁽¹⁾ For purposes of comparison, data for consolidated air carriers (American/US Airways, Southwest and United) is presented for all fiscal years. In the case of each such consolidated air carrier, the data provided for each period occurring prior to the consolidation is estimated based on a summation of the individual carrier information for such period. The data provided for period(s) occurring after the consolidation reflects actual data for such period(s). To the extent individual merged carriers continue to operate separately, individual carrier information is also shown for the periods occurring post-merger, which information may not add to the consolidated figure.

NM Not meaningful.

Source: Authority.

⁽²⁾ Includes American Eagle (through November 2011), US Airways Shuttle and associated regional carriers. In December 2013, American merged with US Airways, but both continue to operate independently until operations are integrated.

⁽³⁾ Includes Delta Shuttle, Delta Express and associated regional carriers.

⁽⁴⁾ In May 2011, Southwest merged with AirTran Airways, and effective January 1, 2015, the two airlines fully integrated under the Southwest name.

⁽⁵⁾ Southwest Airlines commenced service at Logan Airport in August 2009, thus the first full fiscal year for which annual growth can be shown is fiscal year 2011.

⁽⁶⁾ Includes United Express, Continental Express and associated regional carriers. In March 2012, Continental merged into United and discontinued service as an independent entity.

⁽⁷⁾ Includes PenAir and Cape Air.

⁽⁸⁾ Includes Alaska Airlines, Spirit Airlines, Sun Country, Virgin America and charter/non-scheduled domestic service.

⁽⁹⁾ Excludes general aviation figures.

^{*} CAGR stands for Compound Annual Growth Rate.

International Passenger Services. International passenger traffic on foreign flag carriers increased 28.3% from fiscal year 2010 to fiscal year 2014, and, as reflected in the immediately preceding table, the market share of foreign flag carriers serving the Airport has increased over the five years ending in fiscal year 2014, from 3.4% of passenger traffic in fiscal year 2010 to 10.7% in fiscal year 2014. The foreign flag carriers with the largest market shares in fiscal year 2014 were British Airways, Lufthansa German Airlines, Aer Lingus, Air Canada and Air France, with 18.6%, 13.1%, 11.1%, 8.4% and 7.4% of international passenger traffic, respectively. For fiscal year 2014, the shares of international passengers at the Airport were 64.0% for Europe and the Middle East, 13.8% for Canada and 18.2% for Bermuda and the Caribbean. In fiscal year 2014, the top five international origin-destination markets were London, Toronto, Paris, Dublin and Amsterdam. International passenger traffic grew by 4.8% and 3.3% in fiscal years 2014 and 2013, respectively.

The following table shows changes in passenger traffic for the carriers providing international service from Logan Airport for the past five fiscal years and for the nine months ended March 31, 2015. For the nine months ended March 31, 2015, the Airport experienced an aggregate 12.6% increase in international passenger traffic.

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BOSTON-LOGAN INTERNATIONAL AIRPORT ANNUAL GROWTH IN PASSENGERS BY INTERNATIONAL CARRIER

(fiscal year ended June 30, except as noted)

Air Carrier ¹	<u>2010</u>	2011	2012	2013	2014	Nine Months Ended 3/31/14	Nine Months Ended 3/31/15	Growth %
All Carrier	2010	2011	2012	<u>2013</u>	<u> </u>	3/31/14	<u>3/31/13</u>	Glowth 70
Aer Lingus Limited	126,797	121,356	134,035	155,727	187,543	129,817	143,198	10.3%
Air Canada	86,345	102,334	113,739	132,247	143,285	102,687	114,857	11.9
Air France	139,885	142,557	135,663	133,369	121,647	86,401	82,167	(4.9)
Alitalia	65,776	65,019	59,939	57,475	53,560	35,403	38,214	7.9
American Airlines	241,508	183,079	135,759	84,373	18,409	15,120	4,817	(68.1)
British Airways	212,195	237,910	247,310	264,342	307,669	221,809	217,341	(2.0)
COPA Airlines ²	-	-	-	-	33,201	24,863	25,914	4.2
Delta Airlines ³	154,536	205,853	257,595	244,191	259,683	180,242	179,515	(0.4)
Emirates ⁴	-	-	-	-	26,056	4,743	71,632	*
Frontier Airlines	-	-	4,108	-	-	-	-	*
Hainan Airlines ⁵	-	-	-	-	1,401	-	34,254	*
IBERIA	46,377	48,609	47,180	46,168	31,521	18,973	18,904	(0.4)
Icelandair	58,665	69,074	73,012	78,691	91,109	64,761	73,868	14.1
Japan Airlines	-	-	9,537	50,876	58,028	43,275	43,976	1.6
Jazz Air Inc.	88,680	92,493	91,864	91,660	93,040	66,169	65,214	(1.4)
JetBlue	129,702	247,088	338,468	369,288	371,912	273,871	296,357	8.2
Lufthansa German Airlines	195,046	195,582	214,692	212,508	221,380	155,392	151,966	(2.2)
Porter Airlines Inc.	24,383	48,851	66,627	71,275	81,277	58,374	64,356	10.2
SATA Internacional	34,230	37,485	36,431	40,486	45,114	31,928	37,097	16.2
Swiss International	68,333	69,464	68,214	73,030	73,029	53,205	52,299	(1.7)
TACV-Cabo Verde Airlines ⁶	13,190	14,800	15,058	15,519	14,405	10,710	10,935	2.1
Turkish Airlines ⁷	-	-	-	-	10,760	-	58,558	*
US Airways, Inc.	68,477	1,483	8,308	9,694	11,299	8,265	8,700	5.3
Virgin America, Inc.	-	-	-	3,607	-	-	-	*
Virgin Atlantic Airways, Ltd.	85,674	84,063	81,074	80,698	80,183	58,660	58,013	(1.1)
Wow Air ⁸	-	-	-	-	-	-	1,133	*
Discontinued Service 9	4,964	769	-	-	-	-	-	*
Non-Signatory/Charter	7,146	7,313	7,878	1,713	<u>1,758</u>	<u>1,016</u>	<u>1,239</u>	21.9
Total	1,851,909	1,975,182	2,146,491	2,216,937	2,337,269	1,645,684	1,853,391	12.6%

¹ In addition to the carriers shown in this table, Cathay Pacific commenced service from Logan to Hong Kong in May 2015, Aeroméxico commenced service from Logan to Mexico City in early June 2015, and El Al Israel Airlines commenced service from Logan to Tel Aviv in late June 2015.

Source: Authority.

² COPA Airlines commenced service from Logan to Panama City in July 2013.

³ Includes both Delta and Northwest Airlines, which merged in January 2010.

⁴ Emirates commenced service from Logan to Dubai in March 2014.

⁵ Hainan Airlines commenced service from Logan to Beijing in June 2014 and from Logan to Shanghai in mid-June 2015.

⁶ TACV-Cabo Verde Airlines discontinued service to Praia, Cape Verde starting June 2015.

⁷ Turkish Airlines commenced service from Logan to Istanbul in May 2014.

⁸ Wow Air commenced service from Logan to Reykjavik in March 2015.

⁹ Includes Aeroméxico, Air One S.p.A and Finnair, which discontinued services from Logan Airport prior to fiscal year 2012. Aeroméxico recommenced service from Logan in June 2015, as stated above.

^{*} Not Meaningful.

Passenger Markets. As of December 31, 2014, scheduled non-stop service from the Airport was offered to 74 domestic and 42 international destinations compared with 76 domestic and 36 international destinations as of December 31, 2013. Based on published preliminary airline schedules, total scheduled seat capacity is expected to increase by approximately 5.2% during the second half of calendar year 2015, from the same period in the prior year. American, Southwest, Air Canada, Alaska, Delta, JetBlue and US Airways are all expected to increase their scheduled seats. Overall, scheduled seat capacity to international destinations is expected to increase by 7.4%. Scheduled seat capacity to domestic destinations for the second half of calendar year 2015 is expected to increase by 4.8% over the same period last year.

The destinations chosen by passengers using the Airport have changed over the years, reflecting the impacts of domestic and international economic cycles, security screening and the relative cost of air travel. The percentage of passengers traveling by air between Boston and New York/Newark has declined while international traffic and long-haul domestic traffic have increased. The percentage of origin and destination passengers does not include passengers only connecting at an airport such as JFK (e.g., JetBlue). The New York market, which includes traffic to LaGuardia, JFK and Newark, has traditionally been the Airport's largest market, but since 2010 had fallen to second place behind the Washington, D.C. market, and in 2014 fell to third place behind the Washington, D.C. and Chicago markets, respectively. Demand in the Boston-New York/Newark market has decreased by approximately 18.8% from 1.6 million passengers in the 12 months ended December 31, 2004 to 1.3 million passengers for the 12 months ended December 31, 2014. During that same period, the Southeast region (Georgia and Florida), which is dominated by the Florida markets, has become the Airport's largest market area, accounting for 16.8% of origin and destination passengers for the 12 months ended December 31, 2014.

In addition, international traffic as a percentage of overall traffic was 15.8% in calendar year 2014, up from 15.1% in calendar year 2013 and 15.0% in calendar year 2012. In calendar year 2014, the top five international markets served (by scheduled seats) were London, Toronto, Paris, Dublin and Amsterdam. New international service from the Airport to the following destinations commenced within the past several years: Tokyo (April 2012), Panama City (July 2013), Dubai (March 2014), Istanbul (May 2014), Beijing (June 2014), Hong Kong (May 2015), Tel Aviv (June 2015), Mexico City (June 2015) and Shanghai (June 2015).

The following table shows the percentage of origin and destination passengers traveling on U.S. air carriers between the Airport and other final domestic destinations for the 12 months ended December 31, 2014 (the most recent 12 month period for which data is available), as reported by USDOT. Passengers traveling on international flights are not included. It also shows the comparative rankings of the top 20 domestic destinations for calendar year 2004.

BOSTON-LOGAN INTERNATIONAL AIRPORT TOP TWENTY DOMESTIC ORIGIN & DESTINATION PASSENGER MARKETS U.S. CERTIFICATED CARRIERS

(12 Months Ended December 31, 2004 and December 31, 2014)

	12 Months Ended 12/31/14	12 Months Ended 12/31/14	12 Months Ended 12/31/04
Market	Percentage	Rank	Rank
Washington, D.C. (IAD, DCA) ¹	6.01%	1	3
Chicago, IL (ORD, MDW) ²	5.73	2	5
New York Area (JFK, LGA, EWR) ³	5.65	3	1
SFO: San Francisco, CA	5.29	4	7
LAX : Los Angeles, CA	4.54	5	4
MCO : Orlando, FL	3.54	6	2
PHL: Philadelphia, PA	3.07	7	9
ATL: Atlanta, GA	3.03	8	8
BWI : Baltimore, MD	3.00	9	11
FLL: Fort Lauderdale, FL	2.77	10	6
Dallas/Fort Worth, TX (DFW & DAL) ⁴	2.72	11	13
DEN: Denver, CO	2.59	12	14
RSW: Fort Myers, FL	2.21	13	15
Houston, TX (IAH & HOU) ⁵	2.08	14	22
TPA: Tampa, FL	2.00	15	10
CLT : Charlotte-Douglas, NC	1.96	16	32
RDU: Raleigh/Durham, NC	1.95	17	25
SEA: Seattle, WA	1.90	18	20
MSP: Minneapolis/St. Paul, MN	1.77	19	18
LAS : Las Vegas, NV	1.75	20	12
Total for Cities Listed	63.0%		

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Source: DiiO: USDOT, O&D Survey.

Note: The figures above may vary slightly from those reflected in Exhibit 4-15 of Appendix C – Boston Logan International Airport Market Analysis (the "ICF Report") due to differences in the proprietary data processing methods used by DiiO (the source for the data above) and Database Products (the source for the data in the ICF Report) to scale-up the U.S. DOT O&D Survey data

Factors Affecting Passenger Traffic/Markets. The future level of aviation activity and enplaned passenger traffic at the Airport will depend upon factors such as general regional, national and international economic conditions, potential security threats and the financial condition of individual airlines and their continued service at the Airport. The Authority strives to manage operating and capital costs to relieve the burden on aeronautical rates and charges for airlines and their passengers when possible.

There are two regional airports in New England—T.F. Green Airport in Providence, Rhode Island ("T.F. Green") and Manchester-Boston Regional Airport in Manchester, New Hampshire ("Manchester")—that compete with Logan Airport. Logan Airport is by far the largest airport in the region and the only one providing direct service to Europe, the Caribbean, Japan, the Middle East, Central America and China. In the late 1990s and early 2000s, these regional airports gained market share through a combination of increased service levels and competitive airfares (largely due to Southwest Airlines) along with capitalizing on the hampered access to Logan due to the Central Artery/Tunnel project. In recent years, growth of low cost service at Logan, airline retrenchment from smaller, secondary markets (such as these regional airports) and the completion of the Central Artery/Tunnel project has resulted in a shift in the market dynamics between the three airports, with Logan's passenger traffic growing and T.F. Green and Manchester experiencing decreased passenger traffic. The following table shows passenger activity at T.F. Green, Manchester and Logan Airport for the five most recent calendar years.

¹ Includes Dulles Airport & National Airport.

² Includes Chicago O'Hare Airport and Midway Airport.

³ Includes JFK, La Guardia and Newark Liberty International Airports.

Includes Dallas/Fort Worth Airport and Dallas Love Field Airport.

⁵ Includes Houston Intercontinental Airport and Houston Hobby Airport.

Airport Passengers (in millions)

Airport	2010	% of <u>Total</u>	<u>2011</u>	% of <u>Total</u>	<u>2012</u>	% of <u>Total</u>	<u>2013</u>	% of <u>Total</u>	<u>2014</u>	% of <u>Total</u>	(2013-14) <u>% Change</u>	l
Logan Airport T.F. Green Manchester	27.4 4.0 2.8	80.1% 11.7 8.2	28.4 3.9 2.7	81.2% 11.1 7.7	29.2 3.7 2.4	82.7% 10.3 7.0	30.2 3.8 2.4	82.9% 10.4 6.6	31.6 3.6 2.1	84.8% 9.6 5.6	4.67% (6.32) (13.64)	1
Total	34.2		35.0		35.3		36.4		37.3			ì

Cargo Airline Services. The Airport plays an important role as a center for processing domestic and international air cargo. According to ACI, in calendar year 2013 (the most recent year for which data is available), the Airport ranked 22nd in the nation in total air cargo volume. As of June 30, 2014, the Airport was served by five all-cargo and small package/express carriers. For fiscal year 2014, the companies with the largest shares of enplaned and deplaned cargo at the Airport, based upon cargo tonnage, were Federal Express, United Parcel Service, Atlas Air (DHL), Lufthansa German Airlines, British Airways and Delta Airlines. Together, these five carriers accounted for 77.0% of total cargo and mail handled at the Airport in fiscal year 2014.

Cargo and Mail Traffic. In fiscal year 2014, total combined cargo and mail volume was approximately 572.2 million pounds. Total volume consisted of 61.9% small package/express, 34.8% freight and 3.3% mail. The total volume of air cargo and mail handled at the Airport increased in fiscal year 2014 by 3.6% compared to fiscal year 2013 and increased by 1.1% in fiscal year 2013 relative to fiscal year 2012. Fiscal year 2014 cargo and mail volume was 1.8% above that of fiscal year 2010. A large percentage of total cargo volume for these periods is attributable to integrated all-cargo companies and small package/express carriers. The integrated all-cargo companies, which include Federal Express and United Parcel Service, handled approximately 63.6% of the Airport's cargo in both fiscal year 2014 and fiscal year 2013.

Airport Facilities

Airside Facilities. The Airport has four major runways, all of which can accept Group V types of aircraft. In addition, it has a 5,000 foot uni-directional runway, and a 2,557-foot runway used primarily by general aviation aircraft and some small commuter aircraft. A380s have landed on the Airport's two longest runways—Runway 4R/22L and Runway 15R/33L. In recent years, the Authority has undertaken a number of projects to enhance safety at the Airport. These include the construction of inclined safety over-run areas at the end of three of the Airport's runways and a fire and rescue access road at the approach end of two runways provides emergency access in the event of a water rescue operation. In addition, the Airport has an Engineered Material Arresting System ("EMAS") installed at the end of two of its runways. EMAS is an engineered bed of ultra-light, crushable concrete blocks, designed to slow an aircraft that has overrun the end of a runway. Further, the Airport has a Foreign Object Debris detection system on one runway (Runway 9-27) and has installed runway status lights at various hot spots on the airfield. Takeoff Hold Lights (THLs) and Runway Intersection Lights (RILs) were installed on Runways 15R and 9; and Runway Entrance Lights were installed at various taxiways intersecting runways at critical locations. Status lights provide the pilots with additional safety cues beyond verbal guidance from air traffic control and work in concert with Airport Surface Detection Equipment (ASDE). The table below provides an overview of the Airport's runways and certain of the above-described related safety features.

<u>Runway</u>	Length (in feet)	<u>EMAS</u>	Status <u>Lights</u>	Inclined Safety Area	Foreign Object Debris Detection <u>System</u>
Runway 15R/33L	10,083	Yes – at 33L	Yes		
Runway 4R/22L	10,005		Yes	Yes – at 22L	
Runway 4L/22R	7,860	Yes – at 22R	Yes	Yes – at 22R	
Runway 9/27	7,000		Yes	Yes - at 27	Yes
Runway 14/32	5,000				
Runway 15L/33R	2,557				

The Airport also has approximately 93 acres of concrete apron, 144 acres of asphalt apron and 16.3 miles of taxiway. The airfield is equipped with a 250-foot high control tower staffed by the FAA; high intensity runway edge and centerline lights; four approach light systems; threshold lights and touchdown zone lights; airport surveillance radar; aircraft radio communication facilities; radio navigation installations; and Category III Instrument Landing Systems ("ILS") operational at two runway approaches and Category I ILS systems at two other runway approaches. Navigational equipment is operated and maintained by the FAA. The Airport has a fire and rescue facility and a satellite fire and rescue facility on the airfield.

Terminal Facilities. The airport has four commercial passenger terminals (the "*Terminals*") that provide a total of 98 contact gates. As of April 1, 2015, the Terminals in operation included: (1) Terminal A with 21 gates (2) Terminal B with 37 gates; (3) Terminal C with 27 gates; and (4) Terminal E with 13 gates, each of which are further described below. The Airport also has general aviation facilities located in the North Cargo Area currently occupied by Signature Flight Support.

Terminal A. The new Terminal A opened in March 2005, with 670,000 square feet of lobby and gate space, divided between an 11-gate main terminal building and a ten-gate satellite terminal. Terminal A was designed in the post 9/11 era and allows for rapid processing of passengers through the security screening areas and improved placement of food and retail concessions to maximize commercial revenues. Terminal A is currently used by Southwest and Delta (including Delta Shuttle and Compass Airlines (Delta Connection)).

Terminal B is the largest terminal at Logan with 37 contact gates, or 37% of total Airport gates. Terminal B is used by Air Canada/Air Jazz, American, PenAir, Spirit Airlines, United/United Express, US Airways/US Airways Express/US Airways Shuttle and Virgin America.

Terminal C. Terminal C is the second largest terminal at Logan with 27 contact gates. Terminal C is used by Cape Air, JetBlue, Alaska Air and Sun Country.

Terminal E. Terminal E, which has 13 gates, is used for all arriving international flights requiring federal inspection services and most departures by foreign flag carriers. The majority of charter airlines utilize Terminal E, although charter airlines also operate from other Terminals.

See the inside back cover of this Official Statement for a map of the Airport's terminal facilities. For information regarding recently completed, ongoing and planned improvements to terminal facilities, see "CAPITAL PROGRAM" herein.

Lease Arrangements for Terminal Facilities. The Authority exercises significant control over Terminal facilities at Logan Airport through the leasing arrangements it has entered into with the carriers operating at the Airport. The Authority uses a combination of short-term leases, preferential use provisions, recapture provisions and forced subletting provisions to allow it to allocate its gate resources effectively and accommodate new entrant carriers.

In general, the Authority prefers to lease space on a short term basis—either on a month-to-month or year-to-year basis. This provides the Authority the flexibility to allocate gates so that carriers will maximize usage of these facilities. The Authority also has adopted a preferential gate use policy applicable to all gates at Logan Airport. Under the conditions specified in the policy, the Authority may schedule arrivals and departures at a gate by carriers other than the tenant for any period that the tenant is not using the gate. The tenant carrier must permit the carrier being accommodated under the policy to use the facilities required for the functional use of the gate, and may assess reasonable fees for such use. If a tenant carrier fails to accommodate a carrier under the terms of the preferential use policy, then the Authority may convert the gate to a common use gate.

The table below reflects the Authority's current lease arrangements at the Airport. In addition to those listed below, one gate in Terminal B, five gates in Terminal C and all of the gates in Terminal E are currently common use.

Terminal	Carrier	# of Gates	Lease Term	Expiration Date
Terminal A	Delta	16	10 years	June 30, 2016
	Southwest	5	Monthly	n/a
Terminal B	American/US Airways	7 [‡]	20 years	June 13, 2021
	-	13 [‡]	25 years	September 30, 2023
		7	Monthly	n/a
	United	8	1 year	*
	Virgin America	1	Monthly	n/a
Terminal C	Alaska Airlines	1	Monthly	n/a
	JetBlue	<u>21</u> [†]	1 year	**
	Total:	79		

^{*} The United lease was entered into on May 1, 2014 with an original term of one year. The lease is renewable on a year-to-year basis.

Each of the above leases provides for the "recapture" of gates by the Authority if the tenant carrier's average usage (measured in the number of daily operations per gate) falls below a certain Airport-wide average for such usage. These leases also generally require that, at the request of the Authority, the tenant carrier sublease a certain number of gates, as specified in the lease.

While the Authority prefers to lease space on a short-term basis, it has granted longer term leases to carriers that have made significant capital investments in terminal facilities. The lease arrangements with Delta and US Airways were entered into in connection with significant capital investments that each carrier made in terminal facilities. The new Terminal A reopened in 2005 following construction that was largely financed with special facility debt incurred by Delta; and US Airways constructed two projects in Pier B of Terminal B, completed in 1998 and 2000, adding a wing with four new gates, as well as expanded and renovated holdroom, baggage and concessions areas. The Terminal improvements were financed with proceeds of special facilities revenue bonds issued by the Authority on a non-recourse basis. In no case are such bonds secured by Revenues of the Authority or by a mortgage or other lien on property at the Airport.

With respect to the Terminal A special facility bonds, the Authority is under no obligation to assume the liability for such bonds or to direct revenue, other than a portion of the Terminal A airline billings, to service the special facility debt incurred by Delta to reconstruct Terminal A. However, the Authority has agreed with respect to its leases with Delta and US Airways to use reasonable efforts to re-let gates in the event of a default by the tenant. In addition, the Authority has received FAA approval to use PFCs to pay a portion of the debt service on the special facility bonds allocable to the public space within Terminal A and applies approximately \$12.0 million per year of PFCs for such purpose. See "OTHER OBLIGATIONS – Special Facilities Revenue Bonds" herein.

Parking Facilities. Private automobiles are the primary means of ground transportation to and from the Airport. Based upon a 2013 air passenger survey, the Authority estimates that approximately 43.0% of all passengers arrive at Logan Airport in private automobiles, and of those, approximately 30.0% (or 13.0% of total passengers) use the Airport's parking facilities for long-term duration parking.

The number of on-airport commercial and employee parking spaces is currently limited to 21,088, of which 18,415 spaces are currently designated for commercial use and 2,673 spaces for employee parking. These limitations are pursuant to the State Implementation Plan ("SIP") filed by the Commonwealth with the United States Environmental Protection Agency ("EPA") under the federal Clean Air Act. Under the Airport parking freeze, the Authority may shift the location of on-Airport parking spaces or convert the use of spaces from employee use to commercial use. Once parking spaces have been converted from employee to commercial use, however, they cannot

^{**} The JetBlue lease was entered into on January 20, 2005 with an original term of five years with 20 automatic one-year extensions thereafter.

US Airways subleases six gates (three under each lease) to other airlines: one to Spirit, three to Air Canada and two to the Authority, which gates are re-leased to United.

[†] JetBlue subleases one gate to Cape Air.

be converted back to employee use. There is no regulatory limit on the number of parking spaces that are available to the rental car industry at the Airport. In compliance with the terms of the Airport parking freeze, the Authority is currently constructing 2,050 additional parking spaces at the Airport including an expansion to the west side of the Central Parking Garage. See "CAPITAL PROGRAM – Authority Funded Capital Projects – Logan Airport Improvements – *Improvements to Facilitate Airport Parking*" herein.

In 2010, the Authority constructed the new Economy Parking Garage at the site formerly known as the Robie Parcel. The garage consolidated 1,000 spaces displaced by the construction of the Rental Car Center facility in the Southwest Service Area (see "Service and Support Facilities" below) or previously located at other various locations at the Airport. The \$33.0 million project was completed in the winter of 2011 and was financed using proceeds from the Authority's Revenue Bonds, Series 2010-A.

In fiscal year 2012, the Authority completed renovations of the Terminal B Parking Garage. This project included approximately \$54.5 million for structural repairs and lighting upgrades. For additional information regarding additional planned parking improvements, see "CAPITAL PROGRAM" herein.

In April 2014, the Board voted to increase Logan Airport parking rates by \$2.00 per day commencing July 1, 2014 and by \$3.00 per day commencing July 1, 2016. These increases impact all on-Airport commercial parking, including the Economy Parking Garage, as reflected below:

Logan Airport Maximum Daily Parking Rates (Effective July 1,)

	<u>2014</u>	<u>2015</u>	<u>2016</u>
Central Parking Garage	\$27.00	\$29.00	\$32.00
Terminal B Garage	27.00	29.00	32.00
Terminal E Lots	27.00	29.00	32.00
Economy Parking	18.00	20.00	23.00

In addition, the Authority is considering a possible \$2.00/day increase in fiscal year 2019 at all the above-described parking lots/garages, although any such increase is subject to approval by the Board.

Cargo Facilities. As of March 31, 2015, Logan Airport's cargo facilities include six buildings containing approximately 250,989 square feet of warehouse space. Tenants of cargo facilities at the Airport include Federal Express (occupying 99,564 square feet of warehouse space), American, United, Delta, Quantum Aviation Services, United Parcel Service, Servisair, Southwest and Swissport. The majority of the remaining cargo and passenger airlines contract services with the above listed cargo processing tenants in various areas of the Airport. In addition, a number of air cargo operations have moved to off-Airport locations using through-put facilities operated by cargo handlers.

Aircraft Fuel Systems. Aircraft fuel is currently stored in and distributed through an integrated fuel storage and distribution system, which provides for a redundant underground distribution system for aircraft fuel to all gates at the terminals. The fuel system, financed with special facilities revenue bonds of the Authority, is leased to BOSFUEL Corporation ("BOSFUEL"), a membership corporation whose members consist of the principal air carriers serving the Airport, and the system is operated by Swissport, Inc. See "OTHER OBLIGATIONS – Special Facilities Revenue Bonds." The lease between the Authority and BOSFUEL requires BOSFUEL to pay ground rent and other fees for the use of the fuel system, including amounts sufficient to pay the debt service on the BOSFUEL Bonds (defined herein), and BOSFUEL is responsible for the operation and maintenance of the fuel system.

Service and Support Facilities. Airport service and support facilities currently include two facilities for preparation of in-flight meals, a Hilton hotel, a Hyatt conference center and hotel and six aircraft maintenance hangars. Recently constructed in the southwest service area ("SWSA") of the Airport is the new Rental Car Center ("RCC"), which opened in September 2013. The RCC provides integrated airport-related rental car operations and facilities by consolidating on the Airport all 11 rental car brands serving the Airport. The RCC is a consolidated

rental car facility, consisting of a four-level garage with ready/return spaces, a customer service center, seven acres of quick-turn-around ("QTA") fueling and cleaning facilities and nine acres of on-site rental car storage. The RCC is served by a common bus fleet of clean fuel vehicles that also serves the MBTA Blue Line (Airport Station) riders. See "Ground Access to the Airport" below.

In addition, the Authority operates field maintenance facilities, a water pumping station, electrical substations and distribution system, and a plant that supplies steam, hot water and chilled water. In September 2005, the Authority entered into a long-term agreement pursuant to which NStar provides wholesale electrical distribution services to the Authority, which agreement is still in effect. At that time, the Authority also completed the competitive procurement of electricity supply (power generation) from qualified competitive suppliers. In 2011, the Authority entered into a five-year contract for the supply of base load electricity supply with Shell Energy North America, (US), L.P., which expires December 31, 2015. In April 2015, the Authority issued a request for bids to procure electric supply from qualified competitive suppliers for a three-year term commencing January 1, 2016. The Authority has awarded Master Power Agreements with five suppliers for a term of six years beginning on January 1, 2016. Two transaction agreements for base load supply were awarded for a term of three years effective January 1, 2016. Additionally, the Authority purchases ancillary services and a portion of its electricity needs from the Independent Systems Operator of New England (ISO-NE) managed energy markets.

Ground Access to the Airport. Access between the Airport and the central business district of Boston and the western and southern suburbs requires transportation across Boston Harbor. The Ted Williams Tunnel ("Ted Williams Tunnel"), which is owned and operated by the Massachusetts Department of Transportation ("MassDOT"), provides direct highway access between the Airport, the Massachusetts Turnpike/Interstate Route 90 (the "Massachusetts Turnpike" or "I-90"), the Southeast Expressway/Interstate Route 93 ("I-93") and Boston's South Station passenger rail and intercity bus terminal. The Sumner Tunnel (the "Sumner Tunnel") and Lieutenant William F. Callahan Tunnel (the "Callahan Tunnel") lie side-by-side and function as a single tunnel, with the Callahan Tunnel leading from downtown Boston to East Boston and the Airport, and the Sumner Tunnel leading from East Boston and the Airport to I-93 northbound, Storrow Drive and other points in downtown Boston. Route 1A/McClellan Highway, a major arterial roadway, provides access between the Airport and points northeast. Both the Ted Williams Tunnel westbound and the Sumner Tunnel are tolled facilities owned and maintained by MassDOT.

The Authority encourages the use of alternatives to private automobile transportation through public information and advertising campaigns and the development of reliable and innovative alternative transportation services. As part of its planning to enhance Airport roadway efficiency and terminal curb utilization while protecting environmental quality, the Authority operates the "Logan Express" scheduled bus service between the Airport and four suburban park-and-ride locations: Framingham, Braintree, Woburn and Peabody. In April 2014, the Authority launched a new express shuttle bus service from Boston's Back Bay area, providing another alternative for passengers traveling to Logan Airport (although branded Back Bay Logan Express, this shuttle bus service does not serve a parking facility). To further encourage the use of its Logan Express service, the Authority is in the process of making significant improvements to its Framingham and Braintree Logan Express facilities. See "CAPITAL PROGRAM" herein.

In addition to Logan Express, the Authority has contracted for the operation of free shuttle bus service from the Terminals to the MBTA Airport Blue Line station and the RCC, and also to the Authority's on-Airport Economy Garage and remote employee parking lots. Similarly, the Authority provides free shuttle service between the Terminals and the Airport's Water Transportation Dock—an on-demand water taxi service to downtown Boston runs year round, weather permitting, from this location. The MBTA operates additional scheduled water shuttle service from the Commonwealth's South Shore communities to the Airport.

The MBTA also provides service to Logan Airport through the Silver Line, a bus rapid transit service that originates at South Station and also serves the South Boston Waterfront/Seaport District (the location of the Boston Convention and Exhibition Center). The shuttle service is free for Logan Airport customers boarding at the Airport, and allows for a free transfer to the MBTA's Red Line subway at South Station.

Hanscom Field

Hanscom Field is located principally in the Town of Bedford, Massachusetts, approximately 15 miles northwest of Boston. It encompasses approximately 1,300 acres, of which about 55 acres are occupied by the United States Air Force. Hanscom Field has two principal runways of 5,107 and 7,011 feet, respectively, hangars, a terminal building, taxiways and ramps. The Air Force owns approximately 850 acres adjacent to Hanscom Field. In July 1974, the Authority assumed full responsibility for operating and maintaining the airfield by agreement with the United States Air Force.

Hanscom Field is a corporate jet reliever for Logan Airport. It is anticipated that Hanscom Field will continue to develop as an alternative to the Airport for general aviation and may accommodate niche commercial passenger service. General aviation operations, including business-related activity, charters and light cargo, as well as flight training and recreational flying, currently represent 99% of the activity at Hanscom Field; military aircraft conduct about 1% of the operations. Through March 31, 2015, Hanscom reported 90,258 total operations, of which 32,498 operations were local (Touch and Go), 22,175 were single engine operations and 21,289 were jet operations. The airfield is currently served by three full service fixed base operators, as well as several limited service fixed base operators.

Worcester Regional Airport

On July 1, 2010, the Authority purchased the Worcester Regional Airport for approximately \$15.5 million, in accordance with the terms of Chapter 25 of the Acts of 2009, as amended (the "*Transportation Reform Act*"), and assumed responsibility for all capital and operating costs thereof.

As of March 31, 2015, Worcester Regional Airport had 75 aircraft based on site and a total of 25,807 operations were recorded, ranging from small single-engine aircraft to large corporate business jets to one large commercial airline (JetBlue). The Authority continues to actively engage in recruiting additional commercial airlines to serve Worcester Regional Airport. In November 2012, Rectrix Commercial Aviation Services, Inc. ("Rectrix") began operating as a full service fixed based operator at Worcester Regional Airport. In May 2013, they relocated their operation temporarily into the main Passenger Terminal Building so that construction could begin on a \$5.0 million development project that will include a new 27,000 square foot facility providing full service fixed base operations as well as the base for the maintenance operation for their growing corporate fleet. Rectrix is scheduled to move into the new space in early Fall 2015.

On November 7, 2013, JetBlue began commercial service from Worcester Regional Airport. Since commencement of service, it has served 158,200 passengers, including 88,820 passengers in fiscal year 2015 through March 31, 2015.

PORT PROPERTIES

The Authority owns, develops, operates and maintains Port Properties comprising certain waterfront properties transferred to it from the Commonwealth in 1959, as well as additional properties subsequently acquired. The Authority's Maritime Department manages (i) a cargo terminal containing 1,850 feet of berthing space with a water depth of 45 feet, which terminal is equipped with six low profile ship-to-shore (STS) cranes and (ii) a cruise ship passenger terminal. The Authority's Real Estate and Asset Management Department plans, develops and manages related maritime properties in the Port, including real estate for maritime, industrial and commercial uses. The Authority believes that in the long-term, this diversified land use strategy will provide a non-maritime revenue stream to finance the continuing capital development of the Port's cargo and passenger terminals, reducing the burden on the Authority's other revenue sources. The Authority views the Port Properties as an important component of its goal to facilitate the participation of the Massachusetts economy in international trade and tourism.

Maritime Properties

The Authority owns, manages, develops, operates and markets the public cargo and passenger terminals and related maritime properties of the Port. Boston is New England's major port and the only port in the region

providing a full range of container handling, cruise ship, bulk, breakbulk, automobile processing, petroleum, and ship repair services. The Authority's maritime business activities include cargo handling (including containers, bulk materials and automobiles), serving as a home port and port of call for cruise ships, and leasing property for maritime industrial uses.

Cargo activity during fiscal years 2010 through 2014 and for the nine-month periods ending March 31, 2014 and March 31, 2015 is summarized in the table below.

PORT OF BOSTON CARGO ACTIVITY

(fiscal years ended June 30)

Port Activity	<u>2010</u>	<u>2011</u>	<u>2012</u>	<u>2013</u>	2014	Nine Months Ended <u>3/31/2014</u>	Nine Months Ended <u>3/31/2015</u>
Containers (1) Automobiles (2) Bulk Tonnage	100,970	106,857	107,477	110,163	116,800	86,081	94,141
	33,208	42,256	37,215	46,166	57,662	43,315	44,295
	89,394	112,667	144,430	121.890	182,714	132,221	111.254

⁽¹⁾ Does not include over-the-road volumes.

All container operations are consolidated at Conley Terminal in South Boston with related chassis rental and repair services at Fargo Street Terminal North. The Moran Terminal, Medford Street Terminal and Mystic Piers in Charlestown function as an automobile import, export, preparation, processing and distribution facility as well as a bulk cargo facility.

Conley Terminal. Conley Terminal, a 101-acre facility in South Boston, is served weekly by nine international steamship lines. In March 2002, a consortium comprised of Cosco, K Line, Yang Ming Line and Hanjin Shipping Company began providing direct weekly inbound and outbound service between Asia and Boston. Evergreen Line was added to this alliance in 2014. Since 1988, Mediterranean Shipping Company has provided direct weekly service between Boston and Northern European and Mediterranean ports. In January 2015, Mediterranean Shipping Company partnered with Maersk Line on its Mediterranean service. Container volume is closely tied to overall economic conditions in Massachusetts, New England and international markets. The Port of Boston is currently ranked as the 12th largest container port in the United States' Atlantic Coast by container volume.

Moran Terminal, Medford Street Terminal and Mystic Piers. This 80-acre facility in Charlestown is leased to Boston Autoport LLC ("Boston Autoport") through June 2051. Boston Autoport is the only automobile processing entity using the Port. Increased domestic production by foreign automakers has reduced vehicle imports into the United States by water. However, Boston Autoport continues to import and store Subarus and other automobiles as well as to export used automobiles, and to pursue other complementary marine industrial subtenants, while making base lease payments to the Authority and receiving other revenues from subleases on the site. Boston Autoport has a number of subtenants on its lease area, including Massachusetts Clean Energy Technology Center, which operates a 46,000 square foot facility to test wind blades to meet certification and investor requirements and support wind industry research and development activities. The Massachusetts Clean Energy Technology Center facility began operating in July 2011.

Black Falcon Cruise Terminal. This terminal at the former Boston Army Base in South Boston opened in 1986. In 2011, the Authority completed an \$11.0 million renovation of the terminal that included improvements in passenger amenities, safety and lighting. The table below reflects total passenger volume at the cruise terminal for each of calendar years 2010 through 2014:

⁽²⁾ Does not include vehicles entered by over-the-road means. Source: Authority Reports.

BLACK FALCON CRUISE TERMINAL VESSEL AND PASSENGER VOLUME

(calendar year ended December 31)

	Vessels	Total Passengers
2010	111	322,161
2011	107	310,238
2012	117	380,054
2013	116	382,885
2014	113	315.030

The Atlantic coast market is dominated by Florida ports, which handle over 84% of such passengers. In calendar year 2014, the Port of Boston ranked as the 8th largest cruise port on the U.S. Atlantic Coast with 2% of all cruise passengers. Cruise destinations from the Port of Boston include Bermuda and multiple locations in Canada. The decrease in total passengers in calendar year 2014, was due to the loss of the Carnival Glory, which provided service from Boston to Nova Scotia in calendar years 2012 (85,059 total passengers) and 2013 (70,741 total passengers). In calendar year 2014, the Carnival Glory was repositioned to Miami to provide service to the Caribbean.

Marine and Commercial Real Estate Properties

Other Maritime Facilities. The Authority controls several facilities that are used for warehousing, or for importing, processing or distributing bulk and other waterborne commodities such as cement and seafood. These facilities include 88 Black Falcon (an intermodal cargo warehouse and office facility formerly known as International Cargo Port-Boston), the North Jetty/Massport Marine Terminal facility (40 acres) and the Fargo St. Terminal North (13 acres). The Massport Marine Terminal site is home to corporate headquarters of Legal Sea Foods and the Harbor Seafood Center, a 65,000 square foot multi-tenant facility. Massport has planned the balance of the site for seafood, warehouse, and bulk use and is evaluating short and long-term development options. In addition, Massport uses portions of the site to meet cruise and other operational needs.

Fargo Street Terminal South. In March 2010, the Authority and Boston Harbor Industrial Development LLC ("BHID") entered into a 75-year ground lease for approximately 38 acres of land that abuts the Reserved Channel. The property contains approximately 784,000 square feet of building area in seven existing buildings that house a variety of industrial/warehousing tenants and other similar uses. A predecessor entity to BHID had been leasing this site since 1965 under a prior ground lease with the Authority. In addition to substantially increased ground rent to the Authority, the lease required BHID to make substantial investments in roadway and seawall infrastructure improvements, which were completed in 2014. BHID has proposed additional investments in the existing buildings and re-developing a portion of the site to include a grocery store and retail-type uses.

South Boston Commercial and Residential Development. The Authority has actively redeveloped a portion of its land in the South Boston Waterfront as part of a mixed-used plan for approximately seven million square feet of office, hotel, restaurant/retail and residential development. Since the mid-1980's, completed projects include the World Trade Center/Commonwealth Pier, the Seaport Hotel, the East and West Office Buildings, the John Hancock U.S. headquarters office building, the Park Lane Seaport Apartments, the Renaissance Boston Waterfront Hotel, and the construction of new roadways, utilities and the South Boston Maritime Park on D Street. Liberty Wharf, which opened in 2011, is a multi-use development containing five restaurants, boutique office space, a public harbor walk and water slips for transient vessel slips. Waterside Place, a residential development, opened in January 2014; phase II of the project is in design. The MBTA's Silver Line provides rapid transit service from South Station to the South Boston Waterfront (and on to Logan Airport), with two stations located within the mixed-use Commonwealth Flats. The Boston Convention and Exhibition Center and other private developments are also located in the area.

Boston Fish Pier and South Boston Seafood District. The Boston Fish Pier provides 100,000 square feet of seafood processing space and 60,000 square feet of office space, roughly half of which is occupied by Massport Maritime Department administrative functions and maritime-related tenants. The Fish Pier is the home of Boston's commercial fishing boat fleet, and is expected to remain so for the foreseeable future. In 1996, the Authority designated a minimum of eight acres at the Massport Marine Terminal in South Boston for state-of-the-art seafood-processing facilities. Harbor Seafood Center, the first phase of the new district, opened in 2001 and is fully

occupied. The Legal Sea Foods Quality Control Center is also located within this district. See "Other Maritime Facilities" above.

Constitution Center. Constitution Center is a multi-tenant, low-rise office property located in the Gateway area of Charlestown. The property consists of three buildings containing approximately 179,000 aggregate square feet located on approximately 8.4 acres of land. The property also has approximately 470 surface parking spaces. The property is leased from Massport under two ground leases, both of which run through 2082, including all option terms.

Constitution Marina. Constitution Marina is located adjacent to Constitution Center and its leasehold consists primarily of the water sheet (approximately 4.6 acres in area). Constitution Marina has approximately 260 vessel slips and a clubhouse, and operates 12 months a year. The Authority is currently negotiating a 10-year lease extension with Constitution Marina, with no change to the current financial terms, that will run through October 2024.

East Boston Properties. The Authority has entered into agreements with Roseland Property Company ("Roseland") to redevelop East Boston Pier One (and backlands) into a residential development that will include parking, retail and community space. Site work commenced in 2006, however development of this project was delayed due to the economic downturn in 2007. Construction resumed in 2013, and the first building opened in the fall of 2014. Construction on the next two buildings is expected to commence in the fall of 2015. The Authority also designed and constructed a park on Pier 4 known as "East Boston Piers Park." Phase I of the park opened to the public in 1995. The Authority has entered into a long-term ground lease with Coastal Marine Management to operate, maintain and improve the East Boston Shipyard and Marina. Within the terms of the ground lease, the tenant is required to undertake significant capital improvements to the properties.

STRATEGIC PLAN

During fiscal year 2013, the Members of the Authority voted to undertake the "Massport 2022" strategic planning initiative to help guide the future of the Authority in the coming decade and beyond. This initiative involved Authority staff, the surrounding community, MassDOT and the Authority's other stakeholders in the cooperative, community discussion about how the Authority can best achieve its mission of promoting economic prosperity in a dynamic, highly competitive and ever-changing and expanding global environment. The strategic planning initiative constituted a comprehensive review of all of the Authority's aviation, maritime, real estate and employee assets and outlines concrete actions that benefit the Authority's customers and the community in the fairest and most effective way possible, balancing the Authority's specific goals with the larger objectives of the City of Boston, the Commonwealth and the entire New England region.

Pursuant to the Massport 2022 strategic initiative, during fiscal years 2013 and 2014, the Authority engaged in a 24-month effort to prepare a unified Strategic Plan (the "*Plan*") for all of its facilities, which Plan was adopted by Members of the Authority in November 2014. The goal of the Plan is to support and allow Logan Airport to serve the needs of 35 million passengers by 2022 and to enable the Conley Terminal to prepare for the larger ships and consolidated shipping lines that are expected to appear after the opening of the expanded locks in the Panama Canal. The Plan also examines how best to position the Authority's real estate holdings in East Boston and South Boston that are not required for aviation or maritime uses. The Plan identifies the following key opportunities aimed at achieving these goals, among others:

Investing in the Authority's Airports:

- Accommodating 35 million passengers at Logan Airport through (i) further development of the Airport terminal complex for domestic and international passengers and (ii) continued improvements to ground access to the Airport through the further promotion of high occupancy vehicle (HOV) initiatives and continued management of the on-Airport parking supply in order to meet the growth in air passengers;
- Enhancing security at Logan Airport through the construction of a consolidated vendor delivery inspection station and joint operations center;
- Improving technology to improve the passenger experience at Logan Airport;

- Building the commercial passenger market at Worcester Airport (Worcester being New England's second largest city); and
- Continuing Hanscom Field's role as a premier corporate and business aviation facility for the Boston and New England region and an important commercial/general aviation facility.

Revitalizing the Maritime Mission

- Making Conley Terminal "big ship ready" through (i) the Boston Harbor dredging project, and (ii) investment in new berths, container gantry cranes, backlands and landside transport access, including a new dedicated freight corridor;
- Improving the Black Falcon Cruise Terminal to accommodate the growth in cruise passenger activity, including (i) terminal improvements and (ii) securing control of Black Falcon Avenue and (iii) providing adequate cruise parking; and
- Optimizing maritime use of Fish Pier and assessing the seafood industry's future needs.

Developing and Protecting Massport's Real Estate Assets

- Constructing the Air Rights Garage in South Boston;
- Maximizing real estate revenue to support maritime investments; and
- Implementing the recommendations from a recently completed Disaster and Infrastructure Resiliency Plan (DIRP) study, which identified improvements designed to make the Authority's buildings, facilities and infrastructure more resilient to withstanding threats and hazards.

The Plan provides a framework for prioritizing the Authority's strategies and investments moving forward; the specifics will be adjusted as necessary to respond to the rapidly changing environment in which the Authority operates. During the next fiscal year, staff will continue working to develop specific business plans designed to address and implement the strategic initiatives. The Plan has helped shape the FY15-FY19 Capital Program (defined below) and the more detailed business plans will shape subsequent capital plans.

CAPITAL PROGRAM

The Authority utilizes a rolling, five-year capital program as its comprehensive and coordinated capital improvement and financial master plan for all Authority facilities. The capital program, which is amended and approved by the Board annually, sets forth the planned capital projects and expected sources of funding therefor for the next succeeding five-year period. While the Board annually approves a five-year capital program as a whole, each individual project within the capital plan is its own "module," the scope of and budget for which must be approved separately by the Board before work on such module is commenced.

Many of the commitments within the Authority's capital plan, such as the replacement and optimization of the Checked Baggage Inspection System ("CBIS") and the construction of the Framingham Logan Express parking garage contained in the current capital program (discussed further below), have already been authorized by the Authority and extend over several years. The modular design of the capital plan, however, allows the Authority to continually monitor and make adjustments to the overall program, even after work on individual projects has commenced. If significant changes were to occur in available amounts from expected funding sources, or if the costs of certain projects were to increase significantly, the Authority would adjust the timing or reduce the scope of individual proposed projects or the overall program, or both, to accommodate such changed circumstances. For example, in October 2001, as part of its financial recovery plan in response to the financial and operational implications of the events of September 11, 2001, the Authority successfully postponed projects and reduced the capital program for fiscal years 2001 through 2006 from a six-year plan to a two-year plan. The Authority believes that the modular design of the capital program significantly increases its ability to make adjustments in capital spending levels, if necessary.

On February 19, 2015, the Authority approved the Fiscal Year 2015-2019 Capital Program (the "FY15-FY19 Capital Program"). The FY15-FY19 Capital Program represents a comprehensive and coordinated capital improvement and financial master plan for all Authority facilities. The program was developed to be consistent with the Plan and the Authority's strategic goals of meeting growing demand at Logan, protecting the future of the Maritime container and cruise lines of business and defining the role of the commercial real estate properties, while

maintaining strong financial management and competitive rate structures, being a good neighbor, planning for increased resiliency, prioritizing security and improving customer service levels in the face of rising demand. Specifically, the program funds major initiatives that support Massport's strategic goals such as:

Increased Use of HOV Modes of Access to Logan:

- Acquiring the Braintree Logan Express site; and
- Building the Framingham Logan Express parking garage.

Supporting Logan's Ability to Handle 35 million Passengers:

- Checked Baggage Inspection Systems (CBIS) Replacement and Modernization;
- Addition of 2,050 new parking spaces at the Airport;
- Completing programmed airfield improvements and HVAC equipment upgrades;
- Aiding the expansion of low cost carriers at Logan by expanding and relocating airlines to achieve consolidation;
- Renovating and Enhancing Terminal E to serve the international market needs;
- Completing the RCC and Terminal B improvement projects; and
- Demolishing Hangar Building 16 to create additional remain overnight parking spaces.

Safety and Security:

• Implementing security enhancements throughout all of the Authority's facilities, including construction of Joint Operations Center at Logan.

Fostering the Development of the Working Port and Developing the Authority's Real Estate Assets:

- Boston Harbor dredging;
- Construction of a dedicated freight corridor at Conley Terminal; and
- Constructing the Air Rights Garage.

In addition, the FY15-FY19 Capital Program includes the installation of a Category III ILS and taxiway improvements at Worcester Airport, construction of the airfield rescue and fire facility ("ARFF") and customs and border patrol ("CBP") facility at Hanscom Field, and residential soundproofing in the communities neighboring the Airport and the maintenance and renewal of its existing facilities, all as more fully described below.

The FY15-FY19 Capital Program includes forecasted total expenditures of approximately \$1.4 billion by the Authority and approximately \$1.3 billion by third-party or non-recourse funding sources for ongoing projects and for projects to be commenced during the five-year program period, for a total of approximately \$2.7 billion.

Set forth in the following table is a summary of the Authority-funded portion of the FY15-FY19 Capital Program, including estimated funding sources and a summary of uses, showing capital projects by funding category. The Authority-funded portion of the FY15-FY19 Capital Program is funded from a variety of sources, including bond proceeds, grants, PFCs, Customer Facility Charges ("CFCs") and pay-as-you-go capital. As shown in the table, the Authority's financing plan assumes the issuance of the 2015-A and 2015-B Bonds to fund \$181.3 million of project costs (of which \$143.8 million will be expended during fiscal years 2015 through 2019 and \$37.5 million will be used to reimburse expenditures made prior to fiscal year 2015). These projects include construction of 2,050 additional parking spaces at the Airport including an expansion of the Central Parking Garage, roadway improvements, construction of a new parking garage at Framingham Logan Express, the acquisition and improvement of Braintree Logan Express, HVAC equipment upgrades, construction of post security corridors between Terminals C and E and the replacement of certain electrical substations. The table below does not reflect projects that have been or may be funded through other third-party or non-recourse funding sources. For information about the portion of the FY15-FY19 Capital Program (consisting of approximately \$1.3 billion in projects) anticipated to be funded through third-party or non-recourse funding sources, see "Third Party Funded Capital Projects" below.

FY15-FY19 CAPITAL PROGRAM SUMMARY OF ESTIMATED FUNDING SOURCES AND CAPITAL PROJECTS

(Authority-Funded Portion) 1 (in thousands)

Fund	lina	Sources
runa	HIII	Sources

Funding Sources		
	Maintenance Reserve Fund	\$248,694
	Improvement and Extension Fund	294,091
	PFCs pay-as-you-go	3,165
	PFC – Commercial Paper	169,537
	FAA Entitlement Grants	24,030
	FAA Discretionary Grants	13,041
	TSA Aviation Discretionary Grants	93,341
	Other Grants	4,769
	Prior Bond proceeds ²	69,936
	2015 Bond proceeds ²	143,783
	Future Bond proceeds ²	276,036
	CFCs pay-as-you-go	11,177
	CFC Revenue Bond proceeds ²	11,684
	Custodial Funds ³	11,479
	Total Sources (Authority Funded)	\$1,374,763
Project Costs Funded w	vith Revenue Bonds	
	Terminal E Renovation & Enhancements ⁴	\$156,986
	Construction of 2,050 Additional Parking Spaces ⁵	79,907
	Air Rights Garage at Core Block 4,6	78,000
	Property Acquisition and Parking Improvements – Braintree ⁵	30,000
	Gates 37/38 Connector ⁴	25,000
	Post Security Corridor between C to E ⁶	21,681
	Central Heating Plant Upgrades ⁵	17,000
	Terminal C Roadways ⁷	12,500
	Other Projects ⁸	68,681
		\$489,755
Projects Costs Funded		
	CBIS Replacement Optimization ⁶	127,677
	Post security Corridor between C to E ⁶	35,158
	Rehab East Alpha & Bravo Taxiways ⁶	18,500
	Runway 4R Rehabilitation ⁶	16,600
	Runway 4L-22R Rehabilitation	15,800
	Other Projects ⁸	94,148
Project Costs Funded w	with Massport Internally Generated Funds	\$307,883
Floject Costs Fullded w		55,000
	Harbor Dredging CBIS Replacement Optimization ⁶	55,000
		40,003
	Conley Terminal Dedicated Freight Corridor	33,753
	Worcester CAT III ILS & Taxiway Improvements	28,375 6,000
	Joint Operations Center ARFF & CBP Facility	10,000
	Replace Airfield Equipment	10,894
	Other Projects ⁸	358 759
	Other Projects	\$542,784
Project Costs Funded w	with Customer Facility Charges	φ3π 2 ,/0 1
	Rental Car Center	22,861
		22,001
Project Costs Funded fr		
	Dredging and Terminal A Maintenance	<u>11,479</u>
	Total Capital Projects (Authority Funded)	\$1,374,763

Reflects only that portion of the FY15-FY19 Capital Program expected to be financed by the Authority. Does not include approximately \$1.3 billion of projects expected to be funded through third-party or non-recourse funding sources. See "CAPITAL PROGRAM – Third Party Funded Capital Projects" herein for more information on Third Party Projects included in the FY15-FY19 Capital Program.

Proceeds amount shown here does not include bond reserves, costs of issuance or capitalized interest beyond the fiscal years 2015 through 2019 time period.

Includes funds held by the Authority for harbor dredging as well as the Terminal A Maintenance Reserve Fund.

Expected to be funded with proceeds of the 2016 Bonds (defined herein).

Expected to be funded with proceeds of the 2015-A and 2015-B Bonds.

⁶ Projects with multiple funding sources.

Expected to be funded with proceeds of the 2018 Bonds (defined herein).

⁸ Includes a variety of projects each with an estimated cost of \$10 million or less.

Authority Funded Capital Projects

Logan Airport Improvements. The FY15-FY19 Capital Program includes funding for all or a portion of the following improvements at Logan Airport:¹

Checked Baggage Inspection System ("CBIS") Replacement and Optimization. This project reflects the Authority's commitment to remain a leader in airport security and includes \$216.0 million to improve the existing hold baggage screening system originally installed in 2002. The current screening equipment is reaching the end of its useful life and requires replacement. The TSA will supply the new screening equipment. The construction improvements include realigning bag belts, new check baggage resolution areas and a centralized viewing room for on-screen resolution.

Improvements to Facilitate Airline Consolidation and Domestic Travel Growth at Logan. These projects, designed to aid the expansion of low cost carriers at Logan through facility expansion and airline relocation/consolidation, include (i) the Terminal A airline relocation project (\$23 million), which moved Southwest to Terminal A, (ii) the Terminal B Gates 37 and 38 Connector (\$25 million), which involves the construction of a secure-side link to allow for the closure of the separate checkpoint currently serving only Virgin America, (iii) completion of the renovations and improvements at Terminal B (\$124 million), which allowed for the relocation of United into Terminal B, consolidated the space occupied by American Airlines/US Airways and accommodated the growth of JetBlue in Terminal C, and (iv) the demolition of Hanger Building 16 (\$10.5 million) and the creation of a Remain Overnight (RON) space thereon.

Improvements to Facilitate the Growth of International Traffic at Logan. The Authority is undertaking a variety of projects to support the increase in international traffic, to expand Logan's role as an international connector, and to facilitate the transfer of international passengers to and from domestic flights at other terminals. These include (i) the construction of a secure connection between Terminals C and E (\$60.0 million) and (ii) renovations and enhancements to both the airfield and Terminal E (\$170.0 million) to create new international gates and to accommodate the projected desire expressed by several foreign flag carriers to introduce service with A380s.

Improvements to the Logan Express sites to increase the use of HOV access to and from Logan. As part of the Authority's commitment to increasing the use of HOV modes of access, the FY15-FY19 Capital Program includes \$30.0 million to acquire and improve the site of the Braintree Logan Express and \$34.0 million to complete construction of a 1,100 space structured garage and modernized terminal building at the Framingham Logan Express.

Improvements to Facilitate Airport Parking. The FY15-FY19 Capital Program includes \$80.0 million to construct (i) an extension to the west side of the Central Parking Garage, including construction of new parking levels 7 through 10, extension of the walkway connection from Terminal A to Terminal B, and construction of an elevator connection from the walkways to floors 3 through 5 of the Terminal B parking garage and (ii) additional surface parking spaces. This project will result in the creation of 2,050 additional parking spaces at the Airport.

Other Airport Projects. The remainder of the FY15-FY19 Capital Program relating to the Airport includes a variety of airside, landside and soundproofing projects including the following projects and their estimated costs for fiscal years 2015 through 2019: (i) improvements to Terminal C roadways (\$50.0 million), and (ii) various ground transportation initiatives (\$32.0 million). Approximately \$178 million of additional airfield and soundproofing projects will be funded with grants and PFCs.

Worcester Airport and Hanscom Field Improvements. As part of the Authority's commitment to developing air service for the citizens of Central Massachusetts, from fiscal year 2015 through fiscal year 2019 the Authority expects to spend \$53.5 million on improvements at Worcester Regional Airport, including \$28.4 million on installation of a Category III ILS and related taxiway improvements. In addition, the Authority expects to spend \$10.0 million on building a new ARFF station and CPB facility at Hanscom Field.

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¹ Total project costs reflected in this section may differ slightly from the summary table on the prior page to the extent such projects have multiple funding sources and/or involve spending that has occurred either prior to fiscal year 2015 or that will occur after fiscal year 2019 (and thus falls outside the current capital planning period).

Maritime Improvements. As part of its strategic planning efforts, the Authority is exploring ways to prepare Conley Terminal for the consolidation of shipping lines and the advent of larger ships that is expected to occur after the opening of the expanded locks on the Panama Canal. The FY15-FY19 Capital Program includes \$33.8 million for a dedicated freight corridor and \$8.9 million for the rehabilitation of existing cranes. The FY15-FY19 Capital Program also includes \$55.0 million for Boston Harbor dredging, a component of the Boston Harbor Deep Draft Navigation Improvement Project. This project involves the deepening of the major entrance channel, the main ship channel and the reserved channel of Boston Harbor, which will allow larger containerships to call on Conley Terminal. The Boston Harbor Deep Draft Navigation Improvement Project is expected to cost a total of \$350.0 million, with \$216.0 million in federal dollars coming from the U.S. Army Corps of Engineers pursuant to the Water Resources Reform and Development Act of 2014 ("WRRDA"), \$75.0 million coming from the Commonwealth pursuant to the recently enacted Transportation Bond Bill and \$55.0 million coming from Authority funds. The \$55.0 million expected to be financed with Authority funds is included in the FY15-FY19 Capital Program. The Authority is currently working with the Commonwealth to determine the timing of receipt of the Commonwealth's portion of the project funding.

Real Estate Improvements. The Authority is proceeding with the design of an approximately 1,500 space Air Rights Garage at Core Block, an adjacent parcel to the convention center Headquarters Hotel (see "Third Party Funded Capital Projects – BCEC Headquarters Hotel" below), which garage would provide parking for the hotel and other developments in South Boston. The \$80.0 million garage is expected to be funded with a combination of Bond proceeds and Authority funds.

Third Party Funded Capital Projects

Other Third Party Development Ventures. As described above, the Authority expects that approximately \$1.3 billion of the total FY15-FY19 Capital Program will be financed by third party funds (*i.e.* funds that are not on the Authority's balance sheet). In addition to the \$700.0 million Boston Convention and Exhibition Center ("BCEC") Headquarters Hotel described below, these projects include plans to construct and finance an apartment building and hotel with a below-grade parking structure on Parcel K (\$230.0 million), phase II of the Waterside Place apartment development (\$123.0 million), Roseland's second apartment building in East Boston (\$180.0 million), and Terminal Improvements by JetBlue at Terminal C (\$100.0 million).

BCEC Headquarters Hotel. The Authority has signed a Memorandum of Understanding with the Boston Convention and Exhibition Center ("BCEC") to lease land in South Boston for development of a convention center Headquarters Hotel on the Authority's land opposite the BCEC. The Authority and the Massachusetts Convention Center Authority issued a request for proposals in October 2014 for development of the Headquarters Hotel. Six proposals were received in February 2015. Selection of a recommended developer is currently on hold pending review of the BCEC expansion project by Governor Baker's administration. The Authority cannot predict the outcome of this review. The FY15-FY19 Capital Program assumes that the \$700.0 million Headquarters Hotel will be privately financed and will not be built with Authority funds.

Funding Sources

The various projects listed in the FY15-FY19 Capital Program have been and will be financed: (i) through the issuance of Bonds, commercial paper and CFC Revenue Bonds, (ii) from the application of PFCs, federal grants, CFCs and private capital and (iii) from cash flow from operations. The Authority's commercial paper program provides interim funding for certain projects. See "MANAGEMENT'S DISCUSSION OF FORECAST ASSUMPTIONS – Debt Service and Coverage." As of March 31, 2015, the Authority had the following approximate amounts available for projects included in FY15-FY19 Capital Program: \$221.4 million of cash from operations, \$49.1 million of Bond and commercial paper proceeds, \$40.4 million of pay-as-you-go PFCs, \$0.8 million of 2011 CFC Revenue Bond proceeds and \$9.9 million of CFCs.

Bond Proceeds. The proceeds of the 2015-A Bonds and the 2015-B Bonds are expected to be used by the Authority to fund improvements at the Airport as shown in the table and as described below:

2015-A BONDS	(\$ in thousands)
Framingham Logan Express Garage	\$5,600
Property Acquisition and Parking Improvements – Braintree Construction of 2,050 Additional Parking Spaces	30,000 80,000
construction of 2,000 i talantonia i animag opared	00,000
Total 2015-A Bond Proceeds	\$115,600
2015-B BONDS	(\$ in thousands)
Post-security Corridor between Terminals C and E	\$10,200
HVAC Equipment Replacement	18,500
Central Heating Plant Systems Upgrades	17,000
HVAC Equipment Distribution	9,000
Roof Replacements	3,500
New Remain Overnight Aircraft Parking Spaces	2,500
Terminal A Airline Relocation	5,000
Total 2015-B Bond Proceeds	\$65,700

The amounts set forth in the foregoing table may be reallocated by the Authority in accordance with the 1978 Trust Agreement and the Bond Resolution.

Future Bond Proceeds. The FY15-FY19 Capital Program is based on the assumption that the Authority will issue revenue bonds in fiscal year 2017 (the "2016 Bonds") and 2019 (the "2018 Bonds") to fund \$263.6 million and \$50 million, respectively, in project expenditures for fiscal year 2017 through fiscal year 2020. It is expected that \$276.0 million of the proceeds of the 2016 Bonds and the 2018 Bonds will be spent during FY15-FY19.

Passenger Facility Charges. Since 1993, the Authority has submitted and received FAA approval to impose and use PFCs, which have been at the \$4.50 level since October 1, 2005. In March 2012, the FAA authorized the use application of \$18.3 million for the Runway 33L Safety End, bringing the total collection and use amount to \$1.35 billion. In September 2013, the Authority submitted its eighth PFC application to the FAA to impose and use \$100.0 million of PFCs. At the FAA's request, the Authority submitted a revision to that application on January 28, 2014, and, upon receipt of approval of an air space determination, a final application was submitted on June 10, 2014. The application was approved in August 2014, increasing the Authority's impose and use authority to \$1.45 billion. On July 31, 2014, the Authority submitted its ninth application to the FAA to impose and use an additional \$97.0 million in PFCs. The application was approved in December 2014, increasing the Authority's impose and use authority to \$1.55 billion. In February 2015, the Authority held an airline consultation meeting for an application to impose and use an additional \$171.8 million of PFCs. The Authority has subsequently reduced the impose and use authority being requested in the application to \$137 million, due to federal grant funding expected to be received for projects included therein. The Authority expects to submit this application in the summer of 2015. In accordance with the 1978 Trust Agreement, the proceeds of PFCs have been excluded from the Revenues securing the Bonds. In the event that PFC revenues and other funding sources are inadequate to meet anticipated project costs, the Authority would look for other funding sources.

Customer Facility Charges. In December 2008, the Authority imposed a \$4.00 CFC for each transaction day that a car is rented at Logan. Effective December 2009, the CFC was increased to \$6.00 per transaction day. The proceeds of the CFCs are being used to finance all or part of the RCC and associated bus purchases. The CFC provides security for a special facility financing under the CFC Trust Agreement (as defined herein). Upon the adoption of the CFC Trust Agreement, the CFCs were excluded from Revenues securing the Bonds and pledged as security under the CFC Trust Agreement. See "OTHER OBLIGATIONS – CFC Revenue Bonds."

Federal Grants. The Authority receives grants annually from the FAA pursuant to the AIP and also receives TSA grants from time to time. These grants generally fall into two categories: (i) entitlement grants, which are awarded based upon the number of passengers enplaned at the Airport, and (ii) discretionary grants, which are awarded at the discretion of the FAA based upon specified criteria, including a cost-benefit analysis. Similar to many federal grant-in-aid programs, AIP grants are reimbursement grants. Accordingly, the Authority must expend

its own cash to fund an authorized project and then submit invoices to the FAA for reimbursement of such costs pursuant to the terms of the grant. Thus, while grants may be awarded in one fiscal year, grant funds may be received over a period of several subsequent fiscal years. For a description of the AIP program, see "AVIATION INDUSTRY CONSIDERATIONS – Considerations Regarding Other Sources of Revenue – Federal Grants-in-Aid."

The Authority will continue its practice of fully utilizing the AIP entitlement grants that are awarded to it to maintain and improve Logan Airport, Hanscom Field and Worcester Regional Airport, and of aggressively seeking FAA discretionary grants for soundproofing and runway safety improvements. Based on communications with the FAA, the Authority currently expects \$5.17 million in annual AIP entitlement grants for Logan, as well as \$1.0 million in annual AIP entitlement grants for Hanscom Field and \$0.15 million for Worcester Regional Airport. Worcester entitlement funds will be deferred to federal fiscal year 2016. For fiscal year 2012 through fiscal year 2014, the Authority was awarded \$49.9 million in FAA discretionary grants for the construction of the Runway Safety End for Runway 33L; as of March 31, 2015, the Authority has collected \$46.4 million of such grant funds.

Major projects previously funded in part with TSA grant funds include \$87.0 million to fund a portion of the cost of the infrastructure improvements at the Logan Airport terminals to accommodate the Airport's current hold baggage screening system (which is being replaced by the CBIS), and \$4.2 million for the installation of Closed Circuit Television Cameras. In fiscal years 2011 through 2014, the Authority entered into Other Transaction Agreements ("OTAs") with the TSA for a total of \$121.1 million for the CBIS; through March 31, 2015, the Authority has collected \$32.5 million for this project.

There can be no assurance that additional grants from the FAA or the TSA will be available in the future.

Other Funding Sources. The FY15-FY19 Capital Program has been developed to be achievable within the resources anticipated to be available to the Authority at relevant times, including the capacity of users of the facilities of the Authority to bear additional charges. Moreover, the Authority is expending considerable efforts to assure that program costs are predictable and controlled. Should there occur any significant increases in the costs of projects included in the FY15-FY19 Capital Program, whether due to cost overruns or other financial obligations not now contemplated, or should anticipated resources fail to materialize on schedule, resources available to the Authority may be inadequate to accomplish all objectives of the FY15-FY19 Capital Program. If so, the Authority would be required to reduce or delay components of the FY15-FY19 Capital Program. In that event, the selection of projects to be reduced or delayed will depend on circumstances in existence at the time, including relative stages of development, relative economic importance to the activities of the Authority and degrees of transferability of project funding sources. In addition, if federal grant receipts for airfield projects or TSA grants related to CBIS improvements are delayed or cancelled, the Authority may issue additional Bonds to fund the airfield and security projects contained in the FY15-FY19 Capital Program.

AUTHORITY REVENUES

The Authority operates on a consolidated basis; all Revenues generated by each of the Authority's Projects are pooled to pay the Authority's Operating Expenses and are pledged to support all of the Bonds on a parity basis. Under federal law, the Authority is one of the few "grandfathered" consolidated port authorities permitted to apply revenues generated at an airport owned by the Authority to support other operations of the Authority. See "AVIATION INDUSTRY CONSIDERATIONS – Federal Grants-in-Aid." The Authority generates Revenues from each of its Projects, as described below, and each of the Airport and the Port Properties has several lines of business that generate revenue streams.

Airport Properties Revenues

Revenues to the Authority from Airport operations consist of landing fees, terminal building rental rates and fees, cargo building rents, payments made by automobile rental companies, parking fees, concessions and other payments, including Revenues generated by operations at Hanscom Field and Worcester Regional Airport.

Consistent with federal law, aeronautical fees for use of Logan Airport, including landing fees and terminal building charges, are established on a "compensatory basis," that is, set at levels calculated to compensate the Authority for the actual direct and indirect costs of providing those services and facilities to aeronautical users, principally the airlines. (However, terminal concession leases generally provide that rentals are established based upon a percentage of revenues generated, with a minimum annual guarantee, rather than pursuant to a compensatory method.) Such costs include the direct cost of such facilities, including terminals, runways and aprons, and the allocable portion of indirect costs of capital improvements serving the entire Airport, such as Airport roadways. The Authority has no agreements that require it to obtain "majority-in-interest" approvals from airlines for its operating or capital expenditures. Pursuant to federal law, landing fees and other aeronautical charges must be reasonable. The Authority believes that its rate-setting methodology is reasonable and consistent with federal law. However, there can be no assurance that such methodology will not be challenged and, if a judgment is rendered against the Authority, there can be no assurance that rates and charges paid by aeronautical users of the Airport will not be reduced. For a discussion of the federal laws and regulations affecting the Authority's Airport rates and charges, see "AVIATION INDUSTRY CONSIDERATIONS – Federal Law Affecting Airport Rates and Charges."

The Authority establishes landing fee rates for use of Logan's airfield at levels calculated to recover the direct and indirect costs of providing common use landing field facilities and related services, based on projected aircraft landed weights for each year. Any variance from these projections is calculated after the fiscal year ends, and the adjustment is either paid to or invoiced to the air carriers and other users, although the Authority may adjust the landing fee during the fiscal year in order to reduce any variance that would be due.

Each fiscal year, the Authority also establishes terminal building rental rates and fees for aeronautical tenants of all of the Terminals, also on a compensatory basis. See "AIRPORT PROPERTIES – Airport Facilities – Lease Arrangements for Terminal Facilities." Similar to the manner in which the landing fee is handled (as described above), any variance from projected costs is calculated after the fiscal year ends, and the adjustment is either paid to or invoiced to the air carriers, although the Authority may adjust the terminal rental rates during the fiscal year in order to reduce any variance that would be due. In addition, leases with certain carriers that are obligors of special facilities revenue bonds issued by the Authority and secured by a pledge of certain lease revenues also provide for additional rent in an amount at least sufficient to pay the debt service on such bonds. See "OTHER OBLIGATIONS – Special Facilities Revenue Bonds."

Other Authority Revenues generated at the Airport include parking fees, which are generated according to parking rates set by the Authority, rents and other amounts paid by concessionaires, rental car companies and cargo facility operations, which are set by negotiation or bid.

The FAA has approved Authority applications to impose and use a \$4.50 PFC as authorized by federal legislation through December 1, 2023. The revenues from PFCs are dedicated to certain FAA-authorized capital projects and are excluded from the Revenues pledged under the 1978 Trust Agreement that are securing the Bonds. See "CAPITAL PROGRAM – Funding Sources – Passenger Facility Charges." The Authority also requires CFCs to be paid by rental car customers at Logan. The current CFC of \$6.00 per day is collected by the rental car companies and remitted to the trustee for the CFC Revenue Bonds as security therefor. CFC revenues are excluded from Revenues pledged under the 1978 Trust Agreement securing the Bonds. See "OTHER OBLIGATIONS – CFC Revenue Bonds."

Port Properties Revenues

Revenues from the Port Properties are derived from several different sources, reflecting the diverse business activities at the Authority's maritime terminals. At Moran Terminal, Medford Street Terminal and Mystic Pier No. 1, which are leased to Boston Autoport, the tenant pays a fixed rent, plus a percentage of sublease revenues. At Conley Terminal, which is operated by the Authority, the Authority collects fees from shipping lines for loading and unloading containers and for related services. The Authority also collects dockage and wharfage fees from the vessels. At the Black Falcon Cruise Terminal, the Authority charges per passenger use fees, as well as dockage, water and other charges such as equipment rental.

The Authority also collects dockage and tonnage fees for bulk cargo (most particularly, cement products), ground lease rentals, and building rentals at the various associated office and warehouse buildings included in the

Port Properties. Finally, the Authority realizes revenues from the building or facility rental or ground rental of the various properties it owns in East Boston, South Boston and Charlestown.

Investment Income

The Authority also derives income from the investment of the balances in the Operating Fund, the Maintenance Reserve Fund, the Improvement and Extension Fund, the Capital Budget Fund or Account, and the Reserve and Bond Service Accounts in the Interest and Sinking Fund. See "GENERAL OPERATIONAL FACTORS – Investment Policy."

SELECTED FINANCIAL DATA

The table on page A-39 reflects historical Operating Results and Debt Service Coverage for the five most recent fiscal years and the nine-month periods ending March 31, 2015 and 2014, and has been prepared in accordance with accounting principles required by the 1978 Trust Agreement, which differ in some respects from generally accepted accounting principles ("GAAP"). Information for each of the five fiscal years is derived from the Authority's financial statements for the respective fiscal years. Financial statements of the Authority for fiscal year 2014 and comparative data for fiscal year 2013, together with the report thereon of Ernest & Young, LLP, independent accountants, are included in APPENDIX B to the Official Statement. Information for the nine-month periods ending March 31, 2015 and 2014 under the caption "Historical Operating Results and Debt Service Coverage" is derived from the unaudited financial records of the Authority.

The table on page A-40 reflects forecasted Operating Results and Debt Service Coverage for fiscal year 2015 through fiscal year 2019 and was prepared in accordance with accounting principles required by the 1978 Trust Agreement. The prospective financial information included in this APPENDIX A has been prepared by and is the responsibility of the Authority's management. The Authority and its management believe that the prospective financial information included in this APPENDIX A and appearing on page A-40 has been prepared on a reasonable basis, reflecting the best estimates and judgments, and represent, to the best of management's knowledge and opinion, the Authority's expected course of action. However, because this information is a forecast, it should not be relied on as necessarily indicative of future results. The prospective financial information was prepared by the Authority in accordance with accounting principles required by the 1978 Trust Agreement in order to show forecasted debt service coverage; such information was not prepared with a view toward compliance with the guidelines established by the American Institute of Certified Public Accountants for preparation and presentation of prospective financial information.

Neither Ernst & Young, LLP nor any other independent accountant has examined, compiled or performed any procedures with respect to the "Forecasted Operating Results and Debt Service Coverage" appearing on page A-40 or the Review of Airport Properties Net Revenues Forecasts included in APPENDIX D to the Official Statement, and, accordingly, Ernst & Young LLP does not express an opinion or any other form of assurance on such information or its achievability. Neither Ernst & Young LLP, nor any other independent accountant, assumes any responsibility for or has any association with the prospective financial information and any other information derived therefrom included elsewhere in this offering document.

The Ernst & Young LLP report included in APPENDIX B to the Official Statement relates to the Authority's historical financial information. The Ernst & Young LLP report does not cover any other information in this offering and should not be read to do so.

The following tables show the calculation of Annual Debt Service Coverage of the Authority, as provided under the 1978 Trust Agreement, which equals the ratio of the Net Revenues of the Authority to the Annual Debt Service for such year. "Net Revenues" is defined in the 1978 Trust Agreement as the excess of Revenues over Operating Expenses; provided that for the purpose of the calculations, proceeds of PFCs and CFCs have been excluded from Revenues because such proceeds have been excluded from Revenues under the 1978 Trust Agreement. As used in the tables, "Annual Debt Service" is equal to the "Principal and Interest Requirements" on Bonds outstanding for the applicable fiscal year, less the capitalized interest paid from the applicable Project Fund. See APPENDIX E to the Official Statement – Summary of Certain Provisions of the 1978 Trust Agreement – "Certain Definitions." The calculation of Revenues, Operating Expenses and Annual Debt Service under the caption

"Forecasted Operating Results and Debt Service Coverage" is based upon certain assumptions described below. See "MANAGEMENT'S DISCUSSION OF FORECAST ASSUMPTIONS." While the Authority believes that the assumptions made are reasonable, it makes no representation that the conditions assumed will in fact occur. To the extent that actual future conditions differ from those assumed or from the information on which the assumptions are based, the actual operating results will vary from those forecast, and such variations may be material.

Note 2 to the Financial Statements in APPENDIX B to the Official Statement includes a reconciliation between the increase in Net Assets as calculated under GAAP and Net Revenues as calculated under accounting practices prescribed by the 1978 Trust Agreement. The significant differences between the two methods of accounting are as follows: investment income is included as operating revenue under the 1978 Trust Agreement, not under GAAP; and depreciation expense, interest expense, payments in lieu of taxes, PFC, CFC and capital grant income are all recorded under GAAP, but not under the 1978 Trust Agreement. See APPENDIX B to the Official Statement.

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HISTORICAL OPERATING RESULTS AND DEBT SERVICE COVERAGE UNDER THE 1978 TRUST AGREEMENT

fiscal year ended June 30

(\$ in thousands)

						Nine Months Ended	Nine Months Ended
1978 Trust Agreement	2010	2011	2012	2013	2014	3/31/2014	3/31/2015
Revenues:							
Airport Properties - Logan							
Landing Fees	\$ 89,718	\$ 91,515	\$ 88,287	\$ 86,533	\$ 92,896	\$ 68,605	\$ 71,642
Parking Fees	106,918	116,059	125,771	131,873	136,307	99,181	108,653
Utility Fees	18,442	16,144	15,275	14,867	16,798	12,350	13,959
Terminal Rentals	106,079	110,267	115,567	117,891	129,487	92,532	102,988
Non-Terminal Building and Ground Rents	37,574	39,547	40,107	42,086	46,175	35,221	33,914
Concessions	60,179	62,750	71,342	70,082	76,003	56,245	60,991
Other	19,908	19,417	20,467	19,162	24,895	16,781	20,618
	438,818	455,699	476,816	482,494	522,561	380,915	412,765
Airport Properties - Hanscom	9,227	9,371	9,984	10,377	10,640	7,922	9,048
Airport Properties - Worcester	N/A	911	1,238	774	1,538	875	1,293
Total Airport Properties	448,045	465,981	488,038	493,645	534,739	389,712	423,106
Port Properties							
Maritime Operations	46,540	50,630	50,876	52,444	57,959	43,725	47,560
Maritime Real Estate	17,682	20,079	22,458	24,185	27,762	17,538	19,513
	64,222	70,709	73,334	76,629	85,721	61,263	67,073
D-1 (1)	15 152						
Bridge (1) Total Operating Revenue	15,153 527,420	536,690	561,372	570,274	620,460	450,975	490,179
Total Operating Revenue	327,420	330,090	301,372	370,274	020,400	430,973	490,179
Investment Income (2)	11,243	8,340	6,695	4,168	3,208	2,431	2,730
Total Revenues Before CFC	538,663	545,030	568,067	574,442	623,668	453,406	492,909
CFC Revenues (3)	20,752						
Total Revenues	559,415	545,030	568,067	574,442	623,668	453,406	492,909
Operating Expenses (4):							
Airport Properties							
Logan	243,180	253,062	251,718	267,157	290,641	214,732	229,126
Hanscom	8,159	8,726	8,162	9,235	10,396	7,312	7,398
Worcester	N/A	5,122	5,048	5,012	7,497	5,256	6,684
	251,339	266,910	264,928	281,404	308,534	227,300	243,208
Port Properties							
Maritime Operations	49,345	53,239	52,403	53,455	56,527	41,507	45,655
Maritime Real Estate	14,506	15,380	16,637	17,139	18,499	13,318	14,996
	63,851	68,619	69,040	70,594	75,026	54,825	60,651
Bridge (1)	5,279		-	-	-		
Total Operating Expenses	320,469	335,529	333,968	351,998	383,560	282,125	303,859
Net Revenues	\$ 238,946	\$ 209,501	\$ 234,099	\$ 222,444	\$ 240,108	\$ 171,281	\$ 189,050
Less CFC Revenues	20,752						
Net Revenue Excluding CFCs (3)	\$ 218,194	\$ 209,501	\$ 234,099	\$ 222,444	\$ 240,108	\$ 171,281	\$ 189,050
Annual Debt Service	\$ 104,691	\$ 101,019	\$ 105,836	\$ 90,084	90,463	N/A	N/A
Annual Debt Service Coverage	2.08	2.07	2.21	2.47	2.65	N/A	N/A

⁽¹⁾ Effective January 1, 2010, the Tobin Bridge transferred to the Mass DOT pursuant to the Transportation Reform Act.

⁽²⁾ Excludes investment income earned by and deposited into Construction, PFC and CFC Funds.

⁽³⁾ Includes CFC receipts and investment income thereon. CFC revenues are deducted before calculation of annual debt service coverage to provide comparability to years after the ConRAC financing, when CFC revenues are no longer pledged under the 1978 Trust Agreement.

⁽⁴⁾ Includes allocation of all operating expenses related to Authority General Administration.

FORECASTED OPERATING RESULTS AND DEBT SERVICE COVERAGE UNDER THE 1978 TRUST AGREEMENT

fiscal year ended June 30 (\$ in thousands)

The forecasts presented in this table were prepared by the Authority on the basis of assumptions believed by it to be reasonable. See "MANAGEMENT'S DISCUSSION OF FORECAST ASSUMPTIONS" in this APPENDIX A. Inevitably, some of the assumptions used to develop the forecasts will not be realized, and unanticipated events and circumstances may occur. Therefore, there are likely to be differences between the forecast and actual results, and these differences may be material.

	2015 ⁽¹⁾	2016	2017	2018	2019
1978 Trust Agreement Revenues:					
Airport Properties - Logan					
Landing Fees	\$ 97,690	\$101,392	\$105,773	\$109,724	\$112,428
Parking Fees	146,490	144,675	161,718	164,069	175,904
Utility Fees	17,882	21,853	23,601	25,961	26,481
Terminal Rentals	136,802	145,038	153,308	176,834	186,026
Non-Terminal Building and Ground Rents	46,353	46,431	47,368	48,460	49,413
Concessions	79,821	75,255	75,752	76,562	76,176
Other	26,244	26,322	26,369	26,915	27,476
	\$551,282	\$560,965	\$593,890	\$628,526	\$653,904
Airport Properties - Hanscom	12,245	12,159	12,464	12,728	12,992
Airport Properties - Worcester	1,583	1,580	1,694	1,724	1,754
	\$565,111	\$574,705	\$608,048	\$642,978	\$668,650
Port Properties					
Maritime Operations	\$ 60,683	\$ 60,699	\$ 64,694	\$ 67,743	\$ 70,784
Maritime Real Estate	26,310	27,775	28,080	28,861	31,067
	\$ 86,994	\$ 88,473	\$ 92,774	\$ 96,604	\$101,852
Total Operating Revenue	\$652,104	\$663,178	\$700,822	\$739,582	\$770,502
Investment Income ⁽²⁾	2,197	4,172	3,595	4,320	5,068
Total Revenues	\$654,301	\$667,350	\$704,417	\$743,902	\$775,570
Operating Expenses: (3)					
Airport Properties					
Logan	\$312,573	\$322,136	\$340,695	\$362,546	\$383,758
Hanscom	9,960	12,790	13,364	13,956	14,572
Worcester	8,555	8,929	9,345	9,776	10,202
	\$331,088	\$343,855	\$363,404	\$386,279	\$408,532
Port Properties					
Maritime Operations	\$ 60,158	\$ 62,394	\$ 66,423	\$ 69,195	\$ 71,896
Maritime Real Estate	19,687	20,419	21,738	22,645	23,529
	\$ 79,846	\$ 82,813	\$ 88,161	\$ 91,840	\$ 95,424
Total Operating Expenses	\$410,933	\$426,668	\$451,565	\$478,119	\$503,957
Net Revenues	\$243,368	\$240,682	\$252,852	\$265,783	\$271,613
Annual Debt Service ⁽⁴⁾	\$101,663	\$101,189	\$103,730	\$121,484	\$130,381
Annual Debt Service Coverage	2.39	2.38	2.44	2.19	2.08

⁽¹⁾ Reflects actual data for the nine months ended March 31, 2015, and budgeted data for the remaining three months.

⁽²⁾ Excludes investment income earned by and deposited into Construction, PFC and CFC Funds.

⁽³⁾ Includes allocation of all operating expenses related to Authority General Administration.

⁽⁴⁾ The Authority's 2008-A and 2010-D variable rate bonds are assumed to bear interest at a rate of 3.43% and 3.32%, respectively. Reflects the impact of capitalized interest for no more than 24 months for the 2015-B Bonds. Assumes the Authority will issue \$326.0 million par amount of revenue bonds in fiscal year 2017 and \$54.0 million par amount of revenue bonds in fiscal year 2019.

MANAGEMENT'S DISCUSSION OF HISTORICAL OPERATING RESULTS

The Authority derives revenues from a wide variety of sources, including landing fees and terminal rentals, commercial parking fees, concession and rental car revenues, cargo tariffs and land rentals. Certain of these revenues are regulated by state or federal law, such as aeronautical revenues derived from landing fees and terminal rentals, PFCs and port tariffs. See "AUTHORITY REVENUES – Airport Properties Revenues" and "AVIATION INDUSTRY CONSIDERATIONS – Federal Law Affecting Rates and Charges" and "– Considerations Regarding Other Sources of Revenue." The Authority is not restricted by law with respect to establishing rates for certain other activities, such as commercial parking rates and rental rates for development properties, but the Authority is subject to general market conditions. Similarly, the Authority's operating expenses are governed, in part, by applicable law, which mandates certain standards applicable to large commercial service airports, such as Logan Airport, including safety and security staffing and capital requirements. For example, following September 11, 2001, the FAA and TSA instituted numerous security measures for all U.S. airports and seaports, including Logan Airport, Hanscom Field, Worcester Regional Airport and the Port of Boston, which increased the Authority's Operating Expenses. These measures include, but are not limited to, increasing the number of security and law enforcement personnel, restricting the parking of vehicles near terminals, prohibiting all unticketed persons beyond security checkpoints and enhancing the search and screening of all passengers and baggage.

Total Revenues according to 1978 Trust Agreement accounting in fiscal year 2014 were \$623.7 million, compared to \$574.4 million in fiscal year 2013, while Operating Expenses increased to \$383.6 million in fiscal year 2014 from \$352.0 million in fiscal year 2013 resulting in Net Revenues of \$240.1 million and \$222.4 million in fiscal years 2014 and 2013, respectively. Logan Airport is the primary source of the Authority's Revenues, Net Revenue and Operating Expenses. For a discussion of the differences between the accounting principles required by the 1978 Trust Agreement and GAAP, see Note 2 to the Financial Statements in APPENDIX B to the Official Statement. Revenues and Net Revenues do not include PFC revenues, which are required under federal law to be applied to certain FAA-authorized capital projects at the Airport and are not pledged for the benefit of holders of the Bonds, or CFC revenues, which are pledged as security for the CFC Revenue Bonds. See "OTHER OBLIGATIONS – CFC Revenue Bonds." Operating revenue and expense figures for the Airport Properties and Port Properties do not include certain items, particularly expense items such as payments in lieu of taxes, interest and depreciation and amortization, properly allocable to such properties under GAAP.

The Authority actively manages both its revenues and expenses in order to balance several important goals, including the following: maintaining overall expenses at levels designed to maintain the Authority's standards for customer service, safety and security while maintaining reasonable rates for the users of its facilities, recovering a greater share of the actual costs of each of the Authority's Properties from the users of such Properties, maintaining the Authority's financial flexibility and ability to react to unforeseen events and balancing the mix of revenue sources to reduce reliance on any single source of revenues. Consistent with the profit and loss focus of the Authority's senior management, both of the operating departments, Aviation and Maritime, seek to recover an increasingly greater percentage of the actual operating costs and amortization allocable to each facility. Thus, for example, in recent years the Aviation Department has raised rents at and instituted a new rates and charges policy for use of Hanscom Field and the Maritime Department has increased tariffs for services provided to commercial shippers at the Port of Boston.

The Authority benchmarks certain key indices against its peers and establishes financial targets based upon such indices in order to evaluate its rates and maintain a competitive position in the various markets served by the Authority. The Authority strives to balance the need to maintain competitive rates with the need to provide a high level of service to its customers. Because the aeronautical rates and charges at Logan Airport are driven by actual costs, the Authority continually reviews and analyzes, and ultimately controls, its operating expenses. Thus, the Authority develops its five-year rolling capital program taking into account the annual capital and operating costs that will result from each project within the program. In an iterative process, the Authority develops a five-year rolling projected operating budget based upon the projected five-year capital program and benchmarks the projected operating expenses resulting from the proposed projects in order to constrain the capital program in a manner that allows the Authority to meet its financial targets.

Airport Properties

Airport Properties Net Revenues (Airport Properties Revenues less Airport Properties Operating Expenses), increased from fiscal year 2013 to fiscal year 2014 by 6.6%. The number of passengers using Logan Airport in fiscal year 2014 was 4.9% greater than in the prior fiscal year. Landed weights were 4.1% higher than the prior fiscal year. Parking exits were higher in fiscal year 2014 than in the prior fiscal year, and parking revenues were 3.4% greater than revenues from fiscal year 2013. Logan Airport generated approximately \$522.6 million of Revenues and incurred \$290.6 million of Operating Expenses in fiscal year 2014, compared to \$482.5 million of Revenues and \$267.2 million of Operating Expenses

in fiscal year 2013. Operating revenue and expense figures for Logan Airport stated in this paragraph do not include certain items, particularly expense items, such as interest, depreciation and amortization, properly allocable to Logan Airport under GAAP.

Unlike many airport operators, the Authority is not constrained by contractual arrangements with the air carriers serving the Airport governing the incurrence of aeronautical costs and the recovery of such costs in the landing fee and terminal rentals. Instead, landing fees and terminal rentals are set annually by the Authority on a compensatory basis to cover direct and allocated capital, administrative, maintenance and operating costs. The Authority can also make adjustments during the year to the landing fee and to terminal rental rates, if necessary. Accordingly, each October, the Authority establishes the landing fee for the Airport per thousand pounds of landed weight and the rental rates for the terminals, based upon historic capital costs, projected landed weights and the budgeted direct and allocable indirect operating costs of providing these facilities for that fiscal year. The Authority consults with Logan Airport's airline users prior to rate-setting, but the Authority historically has not entered into use agreements or terminal leases which constrain the exercise of the Authority's rate-setting prerogatives. The Authority has no agreements that require it to obtain "majority-in-interest" approvals from airlines for its operating or capital expenditures.

Landing Fees. Landing fee revenues at the Airport increased from \$86.5 million in fiscal year 2013 to \$92.9 million in fiscal year 2014. During this period, the landing fee rate per thousand pounds of landed weight increased from \$4.34 to \$4.57. Under current policy, any variance between the landing fees collected and the actual costs of operating the airfield during a fiscal year is calculated after the fiscal year ends, and the adjustment is either invoiced to (in the case of a shortfall) or paid to (in the case of a surplus) the air carriers and other aeronautical users. Landed weights at Logan Airport increased from approximately 19,494,836 thousand pounds in fiscal year 2013 to 20,297,245 thousand pounds in fiscal year 2014. Unpaid landing fees are generally recovered by amortizing bad debts over five years and adding such amount to the landing fee.

Pursuant to the Authority's Peak Period Surcharge Regulation, the Authority monitors projected aviation activity at Logan Airport. If as a result of such monitoring, the Authority projects that the total number of aircraft operations scheduled for the Airport will exceed the total number of operations that can be accommodated without incurring unacceptable levels of delay under visual flight rule conditions, then the Authority will provide advance notice of such over-scheduling to the aircraft operators at the Airport. In the event that the aircraft operators at the Airport do not adjust their flight schedules, then the Authority may declare a "Peak Period" during the period of over-scheduling and impose a surcharge, currently set at \$150 for each operation during such Peak Period, subject to certain exemptions. Any surcharge amounts collected are credited to the airfield cost center. However, in accordance with applicable federal law, the Peak Period Surcharge Regulation is intended to be revenue neutral. Accordingly, the Peak Period Surcharge Regulation was adopted in accordance with requirements of the Massachusetts Environmental Protection Act certificate and the FAA's Record of Decision regarding Runway 14/32, and the final decision in Massport v. City of Boston, et al. Based upon the current level of operations at the Airport, there is no Peak Period currently in effect. The Authority expects to continue to seek opportunities to maximize the utilization of existing capacity.

Terminal Rentals. Each fiscal year, the Authority establishes terminal building rental rates and fees for all of the Terminals on a compensatory basis. All leases with air carriers for terminal space at the Airport currently provide that the Authority may revise rental rates periodically, at the discretion of the Authority, to recover the actual direct and indirect capital and operating costs for such leased space. The Authority resets these rates each fiscal year to recover its actual capital and budgeted operating costs. Similar to its policy regarding landing fees (described above), the Authority calculates the variance from the projections after the fiscal year ends, and the adjustment is invoiced to (in the case of a shortfall) or paid to (in the case of a surplus) the air carriers. The Authority's practice, however, is that the Authority does not recover through its terminal rentals the costs allocable to unrented space or bad debts. The Authority can also make adjustments during the year to the rates charged to air carriers for terminal usage. In addition, leases with certain carriers that are obligors of special facilities revenue bonds issued by the Authority and secured by a pledge of certain lease revenues require such carriers to pay rent in an amount at least sufficient to pay the debt service on such bonds and the allocable compensatory costs to the Authority. See "OTHER OBLIGATIONS – Special Facilities Revenue Bonds."

As described under "AIRPORT PROPERTIES – Airport Facilities – Lease Arrangements for Terminal Facilities," the Authority currently leases 79 of its 98 gates to various carriers serving the Airport. See the inside back cover of this Official Statement for a map of the Airport's terminal facilities. Rental revenue from Terminals totaled \$117.9 million in fiscal year 2013 and \$129.5 million in fiscal year 2014. Rental income from non-terminal buildings and ground rents other than Terminals totaled \$42.1 million in fiscal year 2013 and \$46.2 million in fiscal year 2014.

Parking Fees. Airport parking revenues increased from \$131.9 million in fiscal year 2013 to \$136.3 million in fiscal year 2014. The parking revenue increase for the nine months ended March 31, 2015 compared to the nine months ended March 31, 2014 was due to an increase in parking exits and a rate increase that was effective July 1, 2014. An additional rate increase of \$3.00 per day commencing July 1, 2016 has been approved by the Board for all on-Airport parking lots, including the Economy Parking Garage. Parking fees are generated according to parking rates set by the Authority. The Authority does not share parking fees with the carriers as an offset to either landing fees or terminal rents; rather, the Authority retains the business risk and the return of this cost center. The number of commercial parking spaces at the Airport is subject to a limitation imposed by the EPA. See "AIRPORT PROPERTIES – Airport Facilities – Parking Facilities."

Concessions. Revenues from concessions increased from \$70.1 million in fiscal year 2013 to \$76.0 million in fiscal year 2014. Concession revenues include payments made by rental car companies that operate at the Airport and commissions from the following concessions: food and beverage, news and gifts, duty free shops and other specialty shops.

Hanscom Field. During fiscal year 2014, Revenues from operations at Hanscom Field represented approximately 1.7% of the total Revenues of the Authority, and Hanscom's Operating Expenses constituted approximately 2.7% of the Authority's Operating Expenses. In fiscal year 2014, Hanscom Field contributed \$10.6 million of Revenue, with Operating Expenses of \$10.4 million, yielding an operating surplus before debt service or other capital expenses of approximately \$0.2 million. In fiscal year 2013, Hanscom Field generated an operating surplus before debt service or other capital expenses of approximately \$1.1 million.

Worcester Regional Airport. In fiscal year 2014, Revenues from operations at Worcester Regional Airport represented less than 1% of the total Revenues of the Authority and Worcester's Operating Expenses constituted approximately 2.0% of the Authority's Operating Expenses and represented an operating loss of approximately \$6.0 million before debt service and other capital expenses. In fiscal year 2013, Worcester Regional Airport generated an operating loss of approximately \$4.2 million before debt service and other capital expenses.

Port Properties

Maritime Operations includes container activity, cruise passenger activity and automobile activity. Maritime Real Estate includes commercial real estate development and asset management, maritime real estate development and asset management. Project types and assets include office, hotel, residential, retail, seafood, warehouse and parking. With the exception of the Boston Fish Pier, these projects are developed and operated by private third-party entities that have entered into ground leases with the Authority. The department also negotiates numerous license agreements for shorter term and temporary uses of Authority property. Since fiscal year 2004, the Authority has experienced small annual Port Properties operating surpluses.

In fiscal year 2014, the Revenue attributable to the Port Properties totaled approximately \$85.7 million, or approximately 13.7% of the Revenues of the Authority, and the Port Properties accounted for approximately \$75.0 million of Operating Expenses, or approximately 19.6% of the Authority's Operating Expenses. In fiscal year 2014, the Port Properties realized a surplus of \$10.7 million in Net Revenues, following a surplus of \$6.0 million in fiscal year 2013. The Net Revenue from Maritime Operations was a surplus of \$1.4 million for fiscal year 2014, while the Net Revenue from Maritime Real Estate was a surplus of \$9.3 million in fiscal year 2014. Over the period shown, the Authority has pursued a policy of seeking compensatory pricing, aggressively negotiating new lease terms when possible, and revenue development through more intense use of the Port Properties and a marketing program designed to increase the volume of containers handled and the number of cruise passengers who embark or disembark in Boston, in an effort to mitigate these deficits.

Investment Income. Investment income decreased to \$3.2 million in fiscal year 2014 from \$4.2 million in fiscal year 2013, primarily reflecting decreases in short-term interest rates over the period.

Other. Historical operating results of the Authority reflect the revenue and expenses associated with the Tobin Bridge through the end of the second quarter of fiscal year 2010. Pursuant to the Transportation Reform Act, the ownership and operation of the Tobin Bridge as well as all associated liabilities were transferred from the Authority to the newly created MassDOT. On January 1, 2010, the Tobin Bridge became part of MassDOT's metropolitan highway system, and the Bridge's revenue-producing capacity now supports MassDOT's debt and other surface transportation costs.

The terms of the transfer included all Tobin Bridge assets and the assumption by MassDOT of certain Tobin Bridge liabilities, including, but not limited to, public safety responsibilities and a portion of the current payment-in-lieu-of-tax payments associated with the Tobin Bridge, and sets forth the parties' resolution of certain matters extending after the

transfer date. Using funds available in the Improvement and Extension Fund established under the 1978 Trust Agreement, the Authority defeased approximately \$20.9 million of revenue bond debt, which was equal to the outstanding amount of Bonds that financed Tobin Bridge improvements. As a result, debt attributable to the Bridge is no longer an obligation of the Authority.

MANAGEMENT'S DISCUSSION OF FORECAST ASSUMPTIONS

The following discussion elaborates on the information contained in the above table entitled "Forecasted Operating Results and Debt Service Coverage Under the 1978 Trust Agreement" and reflects the most current information available to the Authority. The table and ensuing discussion contain pro-forma forecasts for the period covering fiscal year 2015 through fiscal year 2019. This prospective information was prepared by the Authority in accordance with accounting principles required by the 1978 Trust Agreement in order to show projected debt service coverage; such information was not prepared with a view toward compliance with the guidelines established by the American Institute of Certified Public Accountants for preparation and presentation of prospective financial information. The forecasts were prepared by the Authority's staff. LeighFisher prepared a review of the Authority's Airport Net Revenues Forecasts in connection with the issuance of the 2015 Bonds. In the opinion of LeighFisher, the assumptions upon which the Authority's forecasts are based provide a reasonable basis for such forecasts. See APPENDIX D to the Official Statement for the 2015 Bonds, which should be read in its entirety for an understanding of the forecasts and the key underlying assumptions therein.

For fiscal year 2015, projections are based on the Authority's unaudited actual results through March 31, 2015 and the forecasted budget for the remaining three months of fiscal year 2015. Revenues were forecasted to be \$654.3 million for fiscal year 2015 and the forecasted Operating Expenses total \$410.9 million. Through March 31, 2015, operating revenues of \$490.2 million were 6.8% above budget and 8.3% above the same time period in fiscal year 2014. Total Revenues of \$493.0 million were \$32.3 million, or 7.0% above budget for the same period. For the same period, Operating Expenses of \$303.9 million were \$7.3 million or 2.3% below budget for the first nine months of fiscal year 2015. Net revenues of \$189.1 million for the first nine months of the fiscal year were \$39.6 million or 26.5% greater than budgeted.

The forecasts reflected in the table assume: (a) an increase of operating costs in fiscal year 2015, compared to fiscal year 2014 actual results, of (i) 7.5% for Logan Airport, primarily due to a full year of operations of the RCC, winter storm-related costs and higher utility costs, (ii) 4.2% at Hanscom Field, (iii) 14.1% at Worcester Regional Airport, primarily due to JetBlue initiating passenger air service to Florida, and (iv) 6.4% at the Port Properties; (b) growth of baseline operating costs 5.2% on average annually in fiscal years 2016 and thereafter; (c) inflation of capital costs (to the mid-point of construction) at 4.0% annually; (d) investment income (other than for investment agreements currently in effect) at a rate of 0.5% annually in fiscal year 2015 and 1.0% thereafter; (e) average interest rates of 4.4% on the 2015 Bonds and 6.0% on the 2016 Bonds and the 2018 Bonds; (f) completion dates for capital projects as currently contained in the FY15-FY19 Capital Program; and (g) the addition of staff and contract services in future years, as necessary, to operate new facilities as they are placed in service.

The Authority believes that the forecasts reflected on the table are conservative in nature. The forecast for full fiscal year 2015 is based on actual Airport passenger growth of 3.8% for the first nine months of the fiscal year (through March 2015), and an assumption of 1.5% growth for the remaining three months (April – June 2015). Passenger levels are then forecast to increase 1.5% per annum beginning in fiscal year 2016 through fiscal year 2018 and 1.0% in fiscal year 2019. These forecasts do not assume any significant future disruptions to air travel or cessation of service by any air carrier now serving the Airport. This forecast is intended to be conservative to aid in financial planning and can be contrasted with the Authority's planning forecast and the FAA's terminal area forecast for Logan Airport. See APPENDIX C – Boston Logan International Airport Market Analysis under the heading "Review of Massport Activity Forecasts." If the forecasted Revenues are not realized in a material way, then the Authority expects that it will not execute all of the projects listed in the FY15-FY19 Capital Program. The Authority's willingness and ability to reduce capital spending when events so require was demonstrated in its response to the events of September 11, 2001 and in the subsequent adherence to the financial recovery plan put in place thereafter. In addition, forecasted revenues do not include CFCs that are levied on rental car customers. See "CAPITAL PROGRAM –Funding Sources – Customer Facility Charges."

In December 2013, the Authority made an internal loan in the amount of \$10.0 million from the Improvement and Extension Fund to complete the RCC project. The Authority expects that this loan will be repaid with CFCs by September 2015.

Beginning in fiscal year 2013, certain elements of the RCC facility have affected the Revenues, Operating Expenses and Net Revenues under the 1978 Trust Agreement. The Authority is responsible for operating and performing routine maintenance on the common use areas of the building, and for providing security in the building and surrounding areas. The

rental car companies are obligated to pay building rent to cover these costs. The rental car companies also pay a Common Area Transit ("*CAT*") Fee for their allocable share of the Logan terminal area busing system and a Green Bus Depot Fee to cover the capital cost of constructing that facility. These revenue sources, along with the ground rent that the rental car companies pay for their leased space in the RCC facility, constitute Revenues of the Authority under the 1978 Trust Agreement. Similarly, the Authority's operating and maintenance costs incurred with respect to the RCC facility are considered operating expenses in accordance with the 1978 Trust Agreement.

Airport Properties

Forecasted revenues from landing fees and terminal rentals reflect the periodic revision of such charges at rates designed to recover the net annual cost of providing these airport facilities. Net annual costs include all operating expenses and amortization of capital costs, less any PFC revenues applied to these projects and any federal grant funds received for these projects. For the five-year period from fiscal year 2015 to fiscal year 2019, landing fee revenues are forecasted to increase at an average annual rate of 3.8%. The increases over the forecast period are attributable to the inclusion in the rate base of airfield capital costs, including allocable capital costs from other Airport capital projects and increased operating costs.

Terminal building rental revenues from fiscal year 2015 through fiscal year 2019 are projected to increase at an average annual rate of 8.2%, reflecting the additional build out of terminal facilities coming into service. In fiscal year 2015, terminal building rental revenues are forecast to be \$136.8 million, which is 5.6% greater than fiscal year 2014. The increase forecasted for fiscal year 2015 reflects the increase in passengers, reduced airline vacancies (primarily due to the expansion of service by JetBlue), additional allocable capital costs from Airport capital projects and increased operating costs. See "AIRPORT PROPERTIES – Airport Facilities; Lease Arrangements for Terminal Facilities." Terminal building rentals also include baggage fees calculated to recover the Authority's cost of operating baggage screening in unleased space and per passenger fees that recover Terminal E costs related to international passengers and unleased, common-use space.

In fiscal year 2015, Revenues from non-terminal and ground rents are forecasted to increase less than 1.0%. In April 2014, the Board voted to increase Logan Airport parking rates in fiscal years 2015 and 2017. The Authority is forecasting that the increase in parking rates in fiscal year 2017 will add approximately \$10.0 million in revenues to further fund operating and capital projects. In addition, the forecast includes a \$2.00/day increase in parking rates effective fiscal year 2019, although any such increase is subject to approval by the Board. Concession revenues are forecasted to increase 5.0% for fiscal year 2015 and 0.4% annually thereafter.

From fiscal year 2015 through fiscal year 2019, revenues at Hanscom Field are forecasted to increase at an average annual rate of 1.7%, while expenses are forecasted to increase 28.4% in fiscal year 2016 due to the Authority taking over operation of the ARFF, and then increase at an average annual rate of 4.5% from fiscal year 2017 through fiscal year 2019. Revenues at Worcester Regional Airport are forecasted to remain constant in fiscal year 2016, then increase 7.2% in fiscal year 2017, 1.7% in fiscal year 2018 and 1.7% in fiscal year 2019. Worcester Regional Airport operating expenses are forecasted to increase 4.4% in fiscal year 2016 and then increase 4.6% per annum thereafter. Assuming a combination of low inflation and limited programmatic growth thereafter, Operating Expenses of the Airport Properties are forecasted to increase at an average annual rate of 3.9% for the period from fiscal year 2015 through fiscal year 2016, and at an average annual rate of 5.9% for the remainder of the forecast period.

Forecasted Revenues and Operating Expenses of the Airport are based in part on assumptions regarding future levels of total passengers. The forecast for full fiscal year 2015 is based on actual Airport passenger growth of 4.6% for the first nine months of the fiscal year (through March 2015), and estimates of 1.5% growth for the remaining three months (April – June 2015) and then increases of 1.5% per year through 2018 and 1.0% in 2019. Such estimates reflect the Authority's preference for using conservative estimates in its financial planning.

The following table shows forecast total enplaned passengers and total passengers at the Airport from fiscal year 2015 through fiscal year 2019, as well as forecast revenue per enplaned passenger, debt per enplaned passenger and airline cost per enplaned passenger, for the same period.

	Logan Airport – Growth Forecast (000s)				
	FY 2015	FY 2016	FY 2017	FY 2018	FY 2019
Enplaned Passengers	15,915	16,154	16,396	16,642	16,808
Total Passengers	32,009	32,489	32,977	33,471	33,806
Percentage Change		1.5%	1.5%	1.5%	1.0%
Revenue Per Enplaned Passenger	\$34.64	\$34.73	\$36.22	\$37.12	\$38.98
Debt Per Enplaned Passenger ¹	\$72.47	\$80.73	\$96.56	\$95.08	\$90.46
Airline Cost Per Enplaned Passenger	\$14.43	\$14.94	\$15.48	\$16.24	\$17.50

¹ Calculation based upon outstanding principal amount of Bonds.

The Airport Market Analysis states that the Authority's baseline financial forecast of enplanement growth at the Airport of 1.5% per year through fiscal year 2018 and 1.0% thereafter is reasonable, that the Authority's planning forecast of 1.6% represents a reasonable range of future passenger traffic at the Airport, and that the Authority's financial forecast of 3.8% growth for fiscal year 2015, 1.5% average annual growth from fiscal years 2016 through 2018, and 1.0% average annual growth thereafter is conservative compared to the FAA forecast and the Airport's historical annual growth.

The Authority has assumed that it will receive approximately \$135.2 million of federal TSA, AIP entitlement, noise and other discretionary grant reimbursements during the period from fiscal year 2015 through fiscal year 2019. If these funds are not received, projected landing fees and/or checked bag fees would increase over the coming years. There can be no assurance that such AIP or TSA grant funds will be available in the amounts or at the times projected. See "AVIATION INDUSTRY CONSIDERATIONS – Considerations Regarding Other Sources of Revenue; Federal Grants-in-Aid" and "— Considerations Regarding Other Sources of Revenue; FAA Reauthorization and Level of Federal Airport Grant Funding."

Review of the Boston Regional Market Analysis

The Market Analysis Report set forth in APPENDIX C to the Official Statement was prepared by ICF International in connection with the issuance of the 2015 Bonds. Such report is set forth herein in reliance upon the knowledge and experience of such firm as airport consultants.

Review of Airport Properties Net Revenues Forecasts by Consultants

LeighFisher prepared a review of the Authority's Airport Properties Net Revenue Forecasts in connection with the issuance of the 2015 Bonds, which is included as APPENDIX D to the Official Statement. The review should be read in its entirety for a fuller understanding of the forecasts and the key underlying assumptions therein. In the opinion of LeighFisher, the assumptions upon which the Authority's forecasts are based provide a reasonable basis for the forecasts. As stated in the review, any forecast is subject to uncertainties. Inevitably, some assumptions will not be realized and unanticipated events and circumstances may occur. Therefore, there are likely to be differences between the forecast and actual results and those differences may be material.

Port Properties

Maritime Operations Revenues are forecasted to increase 4.7% in fiscal year 2015, increase 0.03% in fiscal year 2016, and then increase at an average annual rate of 5.0% thereafter through fiscal year 2019, while expenses are projected to increase 6.4% in fiscal year 2015, increase 3.7% in fiscal year 2016 and then increase at an average annual rate of 4.9% thereafter through fiscal year 2019. Maritime Operations is expected to have a surplus of \$525,000 in Net Revenues in fiscal year 2015 and then forecasted to have average annual deficits of approximately \$1.5 million per year thereafter through fiscal year 2019. The deficits forecasted are due to the assumption that container volumes will grow at a slower rate during the forecast period. The projected fiscal year 2015 container volume is expected to be 125,000 containers, which is 16.8% above budget. Container volumes are forecasted to be 120,000 in fiscal year 2016, 122,280 in fiscal year 2017, 124,603 in fiscal year 2018 and 126,971 in fiscal year 2019, reflecting modest increases of 2.0% in container volumes for each of those fiscal years.

Revenues from Maritime Real Estate are forecasted to decrease 5.2% in fiscal year 2015, increase 5.6% in fiscal year 2016 and then increase at an average annual rate of 3.8% from fiscal year 2017 through fiscal year 2019, reflecting additional revenues from South Boston development properties that are currently leased. Revenue forecasts are not included

for projects currently without signed leases. The forecast also assumes a 5.0% average annual increase in Maritime Real Estate Operating Expenses.

Investment Income

The Authority's forecasts of investment income assume that existing investments are held until maturity at their respective stated rates of interest and that available cash will be reinvested at an interest rate of 1.0% in fiscal years 2015 through 2019.

Debt Service and Coverage

The Authority's forecasts include the issuance of additional Bonds in fiscal years 2017 and 2019 to provide adequate capital for the Bond funded projects identified in FY15-FY19 Capital Program. See "CAPITAL PROGRAM - Funding Sources." The Authority anticipates the issuance of (i) \$326.0 million of 2016 Bonds in fiscal year 2017 to fund \$263.6 million in project costs and (ii) \$54.0 million of 2018 Bonds in fiscal year 2019 to fund \$50.0 million in project costs. There can be no assurance, however, that the amount and timing of these Bond issues will be as set forth in the preceding sentence. Both the 2016 Bonds and the 2018 Bonds are assumed to bear interest at a rate of 6.0%. The 2016 Bonds are assumed to include two years of capitalized interest during the construction period, which is netted against annual debt service. The 2018 Bonds are assumed to include no capitalized interest during the construction period. These future bond issues are assumed to include bond proceeds to fully fund the Reserve Account to an amount equal to the Reserve Account requirement. See "SECURITY FOR THE 2015 BONDS - Reserve Accounts" in the Official Statement. The Authority expects that the non-Bond funded modules of the FY15-FY19 Capital Program will be financed from the expenditure of proceeds from commercial paper, the application of PFCs on a pay-as-you-go basis, the application of CFCs including the proceeds of the CFC Revenue Bonds, private sources of capital, federal and other grants and cash flow from operations. The Authority does not project that this amount of additional debt will have an adverse impact on its ability to comply with the coverage requirements of the 1978 Trust Agreement. The Authority's capital program is designed to be modular, and the Authority expects to undertake projects only after sufficient funding has been secured. Forecasted coverage for the Authority's forecasted annual debt service is set forth in the table on page A-40. There can be no assurance, however, that these coverage levels will be achieved. The coverage levels presented do not include PFC or CFC revenues or any debt service for debt payable from PFCs or CFCs. For a discussion of the requirements relating to issuance of additional Bonds, see the section entitled "SECURITY FOR THE 2015 BONDS - Additional Bonds" in the Official Statement.

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DEBT SERVICE REQUIREMENTS UNDER THE 1978 TRUST AGREEMENT

The following table sets forth debt service on the Authority's outstanding Bonds⁽¹⁾ and the 2015 Bonds for each fiscal year in which such Bonds will be outstanding. Column totals may not add due to rounding.

	Other	Outstanding					
Year	Outstanding	Variable Rate		_			T : 1D 1:
Ending	Fixed Rate Bonds	Bonds Debt		Bonds		B Bonds	Total Debt
July 1	Debt Service ⁽²⁾⁽⁵⁾	Service (3)	Debt S	<u>Service</u>	Debt S	Service	Service ⁽⁴⁾
			Principal	Interest	Principal	Interest ⁽⁵⁾	
2016	\$86,667,930	\$9,500,185		\$5,020,844			\$101,188,959
2017	88,774,158	9,731,436		5,224,000			103,729,594
2018	88,902,724	9,783,285		5,224,000		\$3,350,250	107,260,259
2019	81,584,130	9,831,402	\$1,910,000	5,224,000	\$1,225,000	3,350,250	103,124,782
2020	81,590,070	10,060,616	2,005,000	5,128,500	1,290,000	3,289,000	103,363,185
2021	78,467,149	10,219,431	2,105,000	5,028,250	1,350,000	3,224,500	100,394,330
2022	78,465,220	10,379,761	2,210,000	4,923,000	1,420,000	3,157,000	100,554,981
2023	78,489,910	8,121,115	2,325,000	4,812,500	1,490,000	3,086,000	98,324,525
2024	75,079,058	8,093,249	2,440,000	4,696,250	1,565,000	3,011,500	94,885,057
2025	75,082,493	8,289,523	2,560,000	4,574,250	1,645,000	2,933,250	95,084,516
2026	75,110,931	8,417,059	2,690,000	4,446,250	1,725,000	2,851,000	95,240,239
2027	75,110,265	8,552,764	2,825,000	4,311,750	1,810,000	2,764,750	95,374,529
2028	63,504,788	8,750,970	2,965,000	4,170,500	1,900,000	2,674,250	83,965,508
2029	59,606,223	3,054,126	3,115,000	4,022,250	1,995,000	2,579,250	74,371,849
2030	53,496,363	1,372,564	3,270,000	3,866,500	2,095,000	2,479,500	66,579,926
2031	53,527,500	1,438,950	3,430,000	3,703,000	2,200,000	2,374,750	66,674,200
2032	53,535,250	1,461,906	3,605,000	3,531,500	2,310,000	2,264,750	66,708,406
2033	53,540,500	1,482,804	3,785,000	3,351,250	2,425,000	2,149,250	66,733,804
2034	40,673,800	1,531,644	3,975,000	3,162,000	2,550,000	2,028,000	53,920,444
2035	40,678,925	1,527,397	4,170,000	2,963,250	2,675,000	1,900,500	53,915,072
2036	29,292,400	1,536,778	4,380,000	2,754,750	2,810,000	1,766,750	42,540,678
2037	29,297,400	1,584,272	4,600,000	2,535,750	2,950,000	1,626,250	42,593,672
2038	26,163,950	1,613,508	4,830,000	2,305,750	3,095,000	1,478,750	39,486,958
2039	26,165,700		5,070,000	2,064,250	3,250,000	1,324,000	37,873,950
2040	26,160,125		5,325,000	1,810,750	3,415,000	1,161,500	37,872,375
2041	13,940,000		5,590,000	1,544,500	3,585,000	990,750	25,650,250
2042	13,934,250		5,870,000	1,265,000	3,765,000	811,500	25,645,750
2043	6,273,500		6,165,000	971,500	3,955,000	623,250	17,988,250
2044	6,279,000		6,470,000	663,250	4,150,000	425,500	17,987,750
2045			6,795,000	339,750	4,360,000	218,000	11,712,750

Does not include commercial paper or debt service on obligations of the Authority not secured on a parity with the Bonds under the 1978 Trust Agreement, such as subordinated revenue bonds, PFC Revenue Bonds (defined herein), CFC Revenue Bonds (defined herein) and special facilities revenue bonds. For a description of such other obligations, see "OTHER OBLIGATIONS."

The figures shown in this column combine Bond Debt Service for the outstanding 2007 Bonds, 2008-C Bonds, 2010 Bonds (other than the Series 2010-D Bonds), 2012 Bonds, 2014 Bonds and the 2015-C Bonds, which were issued on June 30, 2015.

⁽³⁾ Assumes a 3.43% interest rate for the Authority's Revenue Bonds, Series 2008-A and a 3.32% interest rate for the Authority's Revenue Bonds, Series 2010-D.

⁽⁴⁾ Totals may not add due to rounding.

⁽⁵⁾ Amount shown are net of capitalized interest.

AVIATION INDUSTRY CONSIDERATIONS

General Economic Conditions

Historically, the financial performance of the air transportation industry has correlated with the state of the national and global economy. Following significant and dramatic changes that occurred in the financial markets in September 2008, the U.S. economy experienced a recession followed by weak economic growth. More recently, the significant improvement in economic conditions in the U.S. has contributed to the rebound in aviation activity levels nationwide. It is not known at this time whether the improving national unemployment rate or the current rate of national and global economic growth will persist beyond 2015 and what effect, if any, they will have on the air transportation industry.

Financial Condition of the Airline Industry

The number of passengers using the Airport will depend partly on the profitability of the U.S. airline industry and the associated ability of the industry and individual airlines to make the necessary investment to continue providing service. The airline industry has historically been highly cyclical and is characterized by intense competition, high operating and capital costs, and varying demand. Passenger and cargo volumes are highly sensitive to general and localized economic trends, and passenger traffic varies substantially with seasonal travel patterns. After an exceptional period of volatility in the 2000s, the outlook for U.S. carrier profitability in the nearterm is positive, with the U.S. airline industry having posted its fourth consecutive year of profitability in 2014. This comes as U.S. carriers have continued to exercise significant capacity discipline in recent years by eliminating unprofitable routes and redundant services, reducing service at smaller hubs and in less profitable markets, and focusing on the use of right-sized aircraft to serve markets. While there is cautious optimism that the U.S. airline industry is moving to a cycle of sustainable profits, the profitability of the airline industry, nonetheless, may still fluctuate dramatically from quarter to quarter and from year to year, even in the absence of catastrophic events such as the terrorist attacks of September 11, 2001 and the economic recession of 2008 and 2009.

Further, due to the discretionary nature of business and personal travel spending, airline passenger traffic and revenues are heavily influenced by a variety of factors, including: (i) the strength of the U.S. economy and other regional and world economies, (ii) the cost and availability of labor, fuel, aircraft and insurance, (iii) international trade, (iv) currency values, (v) competitive/partnership considerations, including the effects of airline ticket pricing, (vi) traffic and airport capacity constraints, (vii) governmental regulation, including security regulations and taxes imposed on airlines and passengers, and maintenance and environmental requirements, (viii) passenger demand for air travel, including the availability of business travel substitutes such as teleconferencing, videoconferencing and web-casting, (ix) strikes and other union activities and (x) disruptions caused by airline accidents, criminal incidents, acts of war or terrorism and weather and natural disasters.

The Airport Market Analysis included in APPENDIX C and the Review of Airport Properties Net Revenues Forecasts included in APPENDIX D each reflect that, historically, airline travel demand has recovered from temporary decreases stemming from recessions, carrier liquidations, terrorist attacks and international hostilities. See APPENDIX C – Boston Logan International Airport Market Analysis under the heading "Industry Overview" and APPENDIX D – Review of Airport Properties Net Revenues Forecasts under the heading "Key Factors Affecting the Net Revenues Forecast – Passenger Traffic – The Financial Health of the Airline Industry." Given the strong origin-destination character of the Airport's market, the travel intensity of Boston area's key industries and the high per capita income of the region, the Authority's airport consultants expect that future demand for airline travel at the Airport will depend primarily on economic factors, rather than the financial health of any given air carrier. See APPENDIX C – Boston Logan International Airport Market Analysis and APPENDIX D – Review of Airport Properties Net Revenues Forecasts under the heading "Key Factors Affecting the Net Revenues Forecast" for a further discussion of certain factors affecting future airline traffic.

While the Authority believes that it is less vulnerable to the economic condition of individual airlines because of Logan Airport's high percentage of origin-destination passengers and because no single airline accounts for a majority of enplaned passengers, no assurance can be given as to the financial stability or profitability of the airline industry or of any airline in particular. The Authority makes no representation with respect to the continued

viability of any of the carriers serving the Airport, airline service patterns, or the impact of any Airport revenues. No assurance can be given that airlines serving the Airport will not eliminate or reduce service.

Airline Consolidation

In 2005, ten major airlines were flying inside the United States (AirTran, Alaska Airlines, American Airlines, America West, Continental, Delta, Northwest, Southwest, United and US Airways) and accounted for 87.0% of all available seats. Faced with declining profitability due to increased costs of aviation fuel, lower fares brought on by the proliferation of low cost carriers (as described above), reduced growth potential in the domestic markets and declining passenger activity based on security concerns, the airlines pursued consolidation. As a result of these consolidations, today there are four major airlines flying inside the United States (American/US Airways, Delta, Southwest and United) that account for over 85% of domestic capacity (available seats). Such consolidation, combined with a focus on driving profitability via capacity discipline and unbundling of services and resulting increased fee income, has increased airline profitability. Airline analysts expect the consolidated entities will continue to remain profitable in the near-term with a continued focus on return on invested capital through capacity discipline.

Further airline consolidation remains possible. Depending on which airlines serving the Airport, if any, merge or join alliances, the result may be fewer flights or decreases in gate utilization by one or more airlines. Such decreases could result in reduced Airport revenues, reduced PFC collections and increased costs for the airlines serving the Airport. As stated in APPENDIX C to the Official Statement, the Airport is at a relatively low risk of losing passenger traffic due to further mergers, consolidations or liquidations, beyond some short-term disruption, because of the underlying strengths of the Boston market. See APPENDIX C – Boston Logan International Airport Market Analysis.

Growth of Low Cost Carriers

Low cost carriers ("LCCs") are carriers that take advantage of an operating cost structure that is significantly lower than the cost structure of the network carriers. These advantages can include lower labor costs, greater labor flexibility, a streamlined aircraft fleet (i.e., fewer different types of aircraft in a given airline's fleet) and a generally more efficient operation. These low costs suggest that the LCCs can offer a lower fare structure to the traveling public than network carriers while still maintaining profitability. In calendar year 2014, LCCs provided approximately 28% of the airline seat capacity in the U.S. market.

As the larger U.S. carriers consolidated and became more focused on capacity discipline, fare increases took hold. LCCs began to emerge in larger markets where passenger levels were high enough for the LCCs to overcome certain barriers to entry caused by the larger carriers such as, for example, control of the majority of airport gates and slots. The cost structure of LCCs allows for lower fares, which has stimulated traffic and driven LCCs into more and larger markets. One result of the consolidation of carriers and their capacity discipline and the associated fare increases is that certain price-sensitive travelers are flying less. Recently, these budget conscious flyers have emerged as an underserved segment which has helped to expand the LCC market to include the ultra-low cost carriers ("ULCCs"), such as Allegiant and Spirit.

LCCs and ULCCs have significantly increased their service at the Airport. Five domestic LCCs and ULCCs currently operate at the Airport—JetBlue, Southwest, Spirit Airlines, Sun Country and Virgin America. These airlines collectively lease 28 gates at the Airport. As mentioned under "AIRPORT PROPERTIES – Boston-Logan International Airport – Airline Passenger Services" herein, JetBlue has grown to become the largest carrier at the Airport with a market share of 26.5% in fiscal year 2014. In addition to these domestic low cost carriers, a sixth low cost carrier – WOW Air – provides international service from Logan to Reykjavik. Low cost carriers carried 38.2% of total passengers enplaning at the Airport in fiscal year 2014.

The 2013 merger between American and US Airways required both American and US Airways to divest slots and gates at key constrained airports nationwide, including the Airport. The divestitures were proposed and eventually agreed upon in order to enhance system-wide competition in the airline industry. As a result of this agreement, two gates in Terminal B at the Airport were relinquished by American and US Airways, which gates were subsequently leased by the Authority to United. United, in turn, vacated its remaining gates in Terminal C,

which allowed for JetBlue to further increase its presence at the Airport. Increased access to major markets for LCCs may moderate average airfare increases that can typically result from airline consolidation.

To some extent, the distinction between LCCs and the major network airlines has blurred in recent years. As the LCCs have started to serve airports in major metropolitan areas (such as JetBlue at Logan and New York-JFK and Southwest at New York-LaGuardia) in an effort to capture business travelers, and some LCCs have faced increases in labor costs (e.g., the JetBlue pilots recently unionized), the cost base of the traditional LCC has trended upwards. At the same time, the major network carriers have been adopting some of the practices and operational norms of the LCCs, resulting in a general downtrend for major network airline costs. As a result, the fare differential between LCCs and network carriers has narrowed in recent years.

Structural Changes in the Travel Market

Many factors have combined to alter consumer travel patterns. The threat of terrorism against the United States remains high. As a result, the federal government has mandated various security measures that have resulted in new security taxes and fees and longer passenger processing and wait times at airports. Both add to the costs of air travel and make air travel less attractive to consumers relative to ground transportation, especially to short-haul destinations. Additionally, consumers have become more price sensitive. Efforts of airlines to stimulate traffic by heavily discounting fares have changed consumer expectations regarding airfares. Consumers have come to expect extraordinarily low fares. In addition, the availability of fully transparent price information on the internet now allows quick and easy comparison shopping, which has changed consumer purchasing habits. Consumers have shifted from purchasing paper tickets from travel agencies or airline ticketing offices to purchasing electronic tickets over the internet. This has made pricing and marketing even more competitive in the U.S. airline industry. Finally, smaller corporate travel budgets, combined with the higher time costs of travel, have made business customers more amenable to communications substitutes such as tele- and video- conferencing.

Effect of Bankruptcy of Air Carriers

Since 2001, several airlines with operations at the Airport have filed for and have subsequently emerged from bankruptcy protection, including United, Continental, Delta, Northwest, US Airways and, most recently, American Airlines in 2011. Additional bankruptcies, liquidations or major restructurings of other airlines could occur. The Authority's stream of payments from a debtor airline could be interrupted to the extent of unpaid fees for pre-petition goods and services, including accrued rent and landing fees. Under the U.S. Bankruptcy Code, a debtor airline that is a lessee under an unexpired lease with the Authority of non-residential real property, such as a lease of Terminal space or a hangar, is required within certain statutory time periods to assume or reject such lease. Rejection of a lease or other agreement or executory contract would give rise to an unsecured claim of the Authority for damages, the amount of which in the case of a lease or other agreement is limited by the U.S. Bankruptcy Code. The amount ultimately received in the event of a rejection of a lease or other agreement could be considerably less than the maximum amounts allowed under the U.S. Bankruptcy Code. Additionally, during the pendency of a bankruptcy proceeding, a debtor airline may not, absent a court order, make any payments to the Authority on account of goods and services provided prior to the bankruptcy. The Authority actively monitors past due balances to minimize any potential losses due to such proceedings, aggressively pursues overdue amounts and bankruptcy claims, and includes an allowance for uncollectible debts in its landing fee and terminal rental rates. Whether or not an airline agreement is assumed or rejected by a debtor airline in a bankruptcy proceeding, it is not possible to predict the subsequent level of utilization of the gates leased under such agreement.

It is not possible to predict the impact on the Airport of any future bankruptcies, liquidations or major restructurings of other airlines. Because of the Airport's high percentage of origin-destination passengers and because no single airline accounts for a majority of enplaned passengers, however, the Authority believes it is less vulnerable to the economic condition of individual airlines. In addition, the fact that no airline has given up a lease at Logan through decades of bankruptcies, although Delta renegotiated its lease, demonstrates the value airlines place on having a presence at Logan.

Potential investors are urged to review the airlines' financial information on file with the Securities and Exchange Commission (the "SEC") and USDOT. See also APPENDIX C – Boston Logan International Airport Market Analysis and "AVIATION INDUSTRY CONSIDERATIONS – Information Concerning the Airlines."

Cost of Aviation Fuel

Airline earnings are significantly affected by changes in the price of aviation fuel. According to the Airlines for America (formerly the Air Transport Association) ("A4A"), aviation fuel currently is the largest cost component of airline operations, and therefore an important and uncertain determinant of an air carrier's operating economics. Fuel prices continue to be susceptible to, among other factors, political unrest in various parts of the world (particularly in the oil-producing nations in the Middle East and North Africa), Organization of Petroleum Exporting Countries policy, the rapid growth of economies such as China and India and resulting demand for oil-based fuels, the levels of inventory carried by industries, the amounts of reserves maintained by governments, the amount and availability of new sources of oil (e.g., U.S. "fracking" operations), disruptions to production and refining facilities and weather.

There has been no shortage of aviation fuel since the "fuel crisis" of 1974, but there have been significant price increases for fuel. From 2000 to 2008, the price of aviation fuel more than tripled. Oil prices reached an all-time record high of approximately \$145 per barrel in July 2008, and while they have declined from this elevated level, they have fluctuated significantly since then. During the second half of calendar year 2014, an imbalance between worldwide supply and demand resulted in a significant drop in the price of oil and aviation fuel. As of April 30, 2015, the price of a barrel of crude oil was approximately \$54. According to the U.S. Energy Information Administration, in April 2015, the price of jet fuel (based on the average of daily prices for the month) was at \$1.70 per gallon. According to A4A, fuel expenses, which historically ranged from 10-15% of U.S. passenger airline operating costs, are now estimated to be 32% or more of such costs. Significant fluctuations and prolonged increases in the cost of aviation fuel have adversely affected air transportation industry profitability, causing airlines to reduce capacity, fleet and personnel, to invest in new, more fuel efficient aircraft and equipment and to increase airfares and institute fuel, checked baggage, and other extra surcharges, all of which may reduce demand for air travel.

Many airlines engage in or have engaged in fuel hedging – purchasing fuel in advance at a fixed price through derivative contracts – to help manage the risk of future increases in fuel costs. However, there can be no assurance that any fuel hedging contract can provide any particular level of protection from volatile fuel prices. One carrier has even gone as far as to purchase its own refinery in order to better manage its fuel costs.

Aviation Security and Health Safety Concerns

Concerns about the safety of airline travel and the effectiveness of security precautions, particularly in the context of potential international hostilities and terrorist attacks, may influence passenger travel behavior and air travel demand. These concerns intensified in the aftermath of the events of September 11, 2001, again in 2014 following the high profile disappearance of Malaysia Airlines Flight 370 and the crash of Malaysia Airlines Flight 17, and most recently with the crash of Germanwings Flight 9525 in the French Alps in March 2015. Travel behavior may be affected by anxieties about the safety of flying and by the inconveniences and delays associated with more stringent security screening procedures, both of which may give rise to the avoidance of air travel generally and the switching from air to surface travel modes.

Safety concerns in the aftermath of the terrorist attacks on September 11, 2001 were largely responsible for the steep decline in airline travel nationwide in 2002. Since 2001, government agencies, airlines, and airport operators have upgraded security measures to guard against future terrorist incidents and maintain confidence in the safety of airline travel. These measures include strengthened aircraft cockpit doors, changed flight crew procedures, increased presence of armed sky marshals, federalization of airport security functions under the TSA, more effective dissemination of information about threats, more intensive screening of passengers, baggage and cargo, and deployment of new screening technologies. The airlines and the federal government were primarily responsible for, and bore most of the capital costs associated with, implementing the new security measures. No assurance can be given that these precautions will be successful. Also, the possibility of intensified international hostilities and further terrorist attacks involving or affecting commercial aviation are a continuing concern that may affect future travel behavior and airline passenger demand.

Public health and safety concerns have also affected air travel demand from time to time. In 2003, concerns about the spread of severe acute respiratory syndrome (SARS) led public health agencies to issue

advisories against nonessential travel to certain regions of the world. In 2009, while the United States Centers for Disease Control and Prevention ("CDC") and the World Health Organization ("WHO") did not recommend that people avoid domestic or international travel, concerns about the spread of influenza caused by the H1N1 virus reduced international air travel, particularly to and from Mexico and Asia. More recently, in 2014, an outbreak of Ebola in West Africa and the discovery of a patient and health care workers infected with Ebola in the United States have again raised concerns about the spread of communicable disease through air travel.

Information Concerning the Airlines

Many of the principal domestic airlines serving the Airport, or their respective parent corporations, are subject to the information reporting requirements of the Securities Exchange Act of 1934, as amended, and in accordance therewith file reports and other information with the SEC. Likewise, foreign airlines serving the Airport that have American Depository Receipts ("ADRs") registered on a U.S. national exchange are subject to the same reporting requirements. Certain information, including financial information, concerning such domestic airlines, or their respective parent corporations, and such foreign airlines is disclosed in certain reports and statements filed with the SEC. Such reports and statements can be inspected and copied at the public reference facilities maintained by the SEC and on its website.

Foreign airlines serving the Airport, or foreign corporations operating airlines serving the Airport (unless such foreign airlines have ADRs registered on a national exchange), are not required to file information with the SEC. Such foreign airlines, or foreign corporations operating airlines, serving the Airport file limited information only with the USDOT.

The Authority does not undertake any responsibility for or make any representation as to the accuracy or completeness of: (i) any reports and statements filed with the SEC or USDOT or (ii) any material contained on the SEC's website as described in the preceding paragraph, including, but not limited to, updated information on the SEC website or links to other Internet sites accessed through the SEC's website.

Forward-Looking Statements

This Appendix A contains forecasts, projections and estimates that are based on current expectations. In light of the important factors that may materially affect the financial condition of the Authority and the aviation industry generally and other economic and financial matters, the inclusion in this Appendix A of such forecasts, projections and estimates should not be regarded as a representation by the Authority that such forecasts, projections and estimates will occur. Such forecasts, projections and estimates are not intended as representations of fact or guarantees of results.

As discussed in the Airport Market Analysis attached as APPENDIX C, the factors affecting aviation activity at the Airport include: the growth of population and of the economy in the Boston Secondary Market Service Area, airline service and route networks, the financial health and viability of the airline industry, national and international economic and political conditions, the availability and price of aviation fuel, levels of air fares, the capacity of the national air traffic control system and capacity at the Airport and elsewhere. See APPENDIX C – Boston Logan International Airport Market Analysis. The Airport Market Analysis should be read in its entirety for an understanding of all of the assumptions used to prepare the forecasts made therein. No assurances can be given that these or any of the other assumptions contained in the Airport Market Analysis will materialize.

In addition, the Review of Airport Properties Net Revenues Forecasts relating to the 2015 Bonds attached as APPENDIX D to the Official Statement contains a review of certain forecasts of the Authority. APPENDIX D to the Official Statement should be read in its entirety for an understanding of the forecasts and the key underlying assumptions therein. Inevitably, some assumptions used to develop the forecasts will not be realized and unanticipated events and circumstances may occur. Therefore, the actual results achieved during the forecast period will vary, and the variations may be material. See "MARKET ANALYSIS AND REVIEW OF AIRPORT NET REVENUES" and "MANAGEMENT'S DISCUSSION OF FORECAST ASSUMPTIONS" herein and APPENDIX C – Boston Logan International Airport Market Analysis hereto and APPENDIX D – Review of Airport Properties Net Revenues Forecasts to the Official Statement relating to the 2015 Bonds. See also "Aviation Security and Health Safety Concerns" above.

Federal Law Affecting Airport Rates and Charges

Federal aviation law requires, in general, that airport fees be reasonable and that, subject to the "grandfather provisions" discussed below (see "Considerations Regarding Other Sources of Revenue – Federal Grants-in-Aid"), in order to receive federal grant funding, all airport generated revenues must be expended for the capital or operating costs of the airport, the local airport system, or other local facilities owned or operated by the airport owner that are directly and substantially related to air transportation of passengers or property. Pursuant to the requirements of the Federal Aviation Administration Authorization Act of 1994 (the "1994 Aviation Act"), the USDOT and FAA have promulgated regulations setting forth an expedited hearing process to be followed in determining the reasonableness of airport rates and charges, and have also promulgated a policy statement (the "Rates and Charges Policy"), which sets forth the standards that the USDOT uses in determining the reasonableness of the fees charged to airlines and other aeronautical users.

In 1997, the United States Court of Appeals for the District of Columbia Circuit vacated the Rates and Charges Policy in part, determined that a portion of the Rates and Charges Policy was arbitrary and capricious and vacated portions of the policy and remanded it to the USDOT. In 2008, USDOT amended the Rates and Charges Policy to permit "congested airports," as defined therein, to charge a two part landing fee that includes a per operation charge intended to help reduce congestion and operating delays. Congested airports are also permitted to include certain other costs in their rate base, including the cost of certain construction in progress and costs associated with reliever airports, if owned by the same airport operator. The Airport does not currently qualify as a "congested airport." The USDOT has not yet proposed any other revisions to the Rates and Charges Policy. If new guidelines are published, the costs that will be permitted to be included in determining an airport's rate base and the extent to which such future guidelines may limit the Authority's flexibility in negotiating new airline agreements or in setting rates and charges for use of the Airport's airfield and non-airfield facilities cannot be determined at this time. Any new FAA guidelines or any standards promulgated by a court in connection with a dispute could limit the amounts and allocation of costs payable by airlines serving the Airport. Until the USDOT promulgates a new policy regarding rates and charges, the guiding principle for determining whether rates and charges established for use of airport assets is the requirement of federal law that such charges be "reasonable."

The Authority is not aware of any formal dispute involving the Airport over any existing rates and charges, including the rates and charges for fiscal year 2015. The Authority believes that the rates and charges methodology utilized by the Authority and the rates and charges imposed by it upon air carriers, foreign air carriers and other aeronautical users operating at the Airport Properties are reasonable and consistent with applicable law. However, there can be no assurance that a complaint will not be brought against the Authority in the near-term with respect to the fiscal year 2015 rates and charges, or in the future, challenging such methodology and the rates and charges established by the Authority and, if a judgment is rendered against the Authority, there can be no assurance that rates and charges paid by aeronautical users of the Airport will not be reduced. See "AUTHORITY REVENUES – Airport Properties Revenues."

Considerations Regarding Other Sources of Revenue

Passenger Facility Charges. Under the PFC Act, the FAA may authorize a public agency to impose a PFC of up to \$4.50 on each passenger of an air carrier enplaned at any commercial service airport controlled by the public agency, subject to certain limitations. PFCs are available to airports to finance certain projects that (i) preserve or enhance capacity, safety or security of the national air transportation system, (ii) reduce noise resulting from an airport, or (iii) furnish opportunities for enhanced competition among air carriers and, with respect to a PFC of \$4.00 or \$4.50, that will make a significant contribution to improving air safety and security, increasing competition among air carriers, reducing current or anticipated congestion, or reducing the impact of aviation noise on people living near the airport. Under certain circumstances, the FAA grants approval to commence collection of PFCs ("impose only" approval) before approval to spend the PFCs on approved projects ("use" approval) is granted. Approval to both collect and spend PFCs is referred to as an "impose and use" approval.

No assurance can be given that PFCs will actually be received in the amount or at the time contemplated by the Authority. The amount of actual PFC revenues will vary depending on actual levels of qualified passenger enplanements at the Airport. In addition, the FAA may terminate the Authority's ability to impose PFCs, subject to informal and formal procedural safeguards, if the Authority's PFC revenues are not being used for approved projects

in accordance with the FAA's approval, the PFC Act or the regulations promulgated thereunder or the Authority otherwise violates the PFC Act or regulations. The Authority's ability to impose a PFC may also be terminated if the Authority violates certain provisions of the Airport Noise and Capacity Act of 1990 and its implementing regulations. Furthermore, no assurance can be given that the Authority's authority to impose a PFC may not be terminated by Congress or the FAA, or that the PFC program may not be modified or restricted by Congress or the FAA so as to reduce PFC revenues available to the Authority.

Passenger facility charges from passengers enplaned at Worcester Regional Airport are not pledged under the PFC Trust Agreement.

Federal Grants-in-Aid. The Airport and Airway Improvement Act of 1982 created the Airport Improvement Program ("AIP"), which is administered by the FAA and funded by the Airport and Airway Trust Fund. This fund is financed by federal aviation user taxes. Grants are available to airport operators in the form of "entitlement" funds and "discretionary" funds. Entitlement funds are apportioned annually based upon enplaned passengers and discretionary funds are available at the discretion of the FAA based upon a national priority system. In addition, pursuant to the PFC Act, an airport's annual federal entitlement grants are reduced by 50% following the imposition of PFCs of up to \$3.00, and 75% for PFCs in excess of \$3.00.

In fiscal years 2011 through 2014, the Authority was awarded TSA Other Transaction Agreement (OTA) grant funding for the Checked Baggage Inspection System in the amount of \$121.4 million, and as of March 31, 2015, payments totaling \$32.5 million were received. No assurance can be given that federal grants-in-aid will actually be received in the amount or at the time contemplated by the Authority.

Before federal approval of any AIP grant applications can be given, eligible airports must provide written assurances that they will comply with a variety of specified requirements. One such assurance is the so-called "airport generated revenues" assurance, which provides that all airport generated revenues will be expended for the capital or operating costs of the airport, the local airport system, or other local facilities owned or operated by the applicant that are directly and substantially related to air transportation of passengers or property. The airport generated revenues assurance, however, does not apply where provisions in laws or a covenant in debt obligations predating September 2, 1982 provide that the revenues from any of the airport owner's or operator's facilities, including the airport, be used to support the general debt obligations or other facilities of the airport owner or operator (the "grandfather provisions"). The Authority falls within the group of airports for which, under the grandfather provisions, the airport generated revenues assurance does not apply. Therefore, the Authority is legally permitted to operate all of its Properties on a consolidated financial basis.

The Authority is not aware of any dispute involving the Authority concerning the use of Airport Revenues. The Authority believes that the grandfather provisions apply to its use of Airport Revenues and that the Authority's use of such Revenues is consistent with the applicable laws and regulations.

FAA Reauthorization and Level of Federal Airport Grant Funding. On February 6, 2012, Congress passed a four-year reauthorization bill for the FAA—the FAA Modernization and Reform Act of 2012—which was signed into law on February 14, 2012 by the President and will expire on September 30, 2015. The 2012 FAA reauthorization retained the federal cap on PFCs at \$4.50 and authorized \$3.35 billion per year for AIP through federal fiscal year 2015, which is \$150 million per year less than the funding level for the preceding five years. The AIP provides federal capital grants to support airport infrastructure through entitlement grants (determined by formulas based on passenger, cargo, and general aviation activity levels) and discretionary grants (allocated on the basis of specific set-asides and the national priority ranking system). The Authority is unable to predict the level of AIP funding at this time. If there is a reduction in the amount of AIP grants awarded to the Authority for the Airport, it could: (1) increase by a corresponding amount the capital expenditures that the Authority would need to fund from other sources (including operating revenues, and Bond proceeds), (2) extend the timing to complete certain projects, or (3) reduce the scope of individual proposed projects or the overall program, or both. See "CAPITAL PROGRAM – Funding Sources – Federal Grants" for more information regarding federal grant funding received by the Authority.

As mentioned above, the current FAA authorization statute will expire on September 30, 2015. Congress has held hearings on an FAA reauthorization act but, as of the date of this Official Statement, no reauthorization

legislation has been approved by either house of Congress. Prior to the last reauthorization act, Congress enacted over 20 continuing resolutions providing temporary funding for the FAA and its programs, and during this period funding for and non-essential operations of the FAA was terminated once. There can be no assurance that Congress will enact and President Obama will sign an FAA reauthorization act before the current authorization terminates. Failure to adopt such legislation could have a material, adverse impact on U.S. aeronautical operations as well as on the AIP grant program.

Environmental Regulations

The FAA has jurisdiction over certain environmental matters, including noise reduction. Airport noise is a significant federal and local issue, which may require substantial capital investments by the industry and/or airport operators, including the Authority, from time to time to meet applicable standards. See "CAPITAL PROGRAM – Authority Funded Capital Projects – Logan Airport Improvements – *Other Airport Projects*."

The EPA is responsible for regulating air quality and water quality. The potential exists for additional federal regulation that may require capital expenditures or changes in operations at the Authority's facilities. See also "GENERAL OPERATIONAL FACTORS – Environmental and Regulatory Considerations."

GENERAL OPERATIONAL FACTORS

Personnel Considerations

Labor. As of March 31, 2015, the Authority had 1,188 full-time employees. In addition, the Authority had 27 regular part-time and job share employees, none of whom are covered by collective bargaining agreements. There are nine bargaining units, each with separate collective bargaining agreements between the Authority and the eight unions representing these units, which represent a total of 641 of these full-time employees. Of these nine collective bargaining agreements, two expire on June 30, 2015 and four expire on June 30, 2016. The other collective bargaining agreements expire on October 5, 2015, January 31, 2016 and May 5, 2016. In general, upon the expiration of a collective bargaining agreement, the Authority's practice is to continue honoring the terms of such agreement until a new agreement takes effect. The Authority seeks to control its labor costs to the most prudent extent possible, and accordingly, none of its labor agreements provides for an automatic cost-of-living escalator. The Authority considers its relations with its employees and their union representatives to be good.

Massachusetts law prohibits strikes by employees of the Authority. In addition, the Massachusetts Supreme Judicial Court has declared that labor unions negotiating collective bargaining agreements with certain entities, including the Authority, do not have a statutory right to demand "interest arbitration" in the event of an impasse. Therefore, successor collective bargaining agreements cannot be imposed upon the Authority by any outside entity.

Approximately 315 members of the International Longshoremen's Association Locals 799, 800, 805 and 1066 (the "*ILA*") work at Conley Terminal and the Black Falcon Cruise Terminal on either a full time or casual basis. The Authority, along with various stevedoring companies, shipping lines and terminal operators, constitute the Boston Shipping Association ("*BSA*"), which is a multi-employer association responsible for the negotiation and administration of collective bargaining agreements with the ILA. Decisions by the BSA on matters concerning negotiations and administration of collective bargaining agreements are binding on member employers. The current collective bargaining agreements between the BSA and the ILA will expire on September 30, 2018.

Certain users of the Authority's facilities that generate a substantial portion of the Authority's Revenues, such as the air carriers, are dependent upon successful management of their own labor relations for continuation of their operations. These matters are beyond the control of the Authority, and significant labor disputes in these areas could have an adverse effect upon the Revenues of the Authority.

Non-Discrimination, Equal Opportunity and Affirmative Action. The Authority is committed to affirmative action in its hiring of minorities, women, persons with disabilities and veterans in order to attract and retain a diverse workforce.

The Authority is committed to equality of economic opportunity and encourages and supports the inclusion of minority, women and disadvantaged business enterprises ("M/W/DBEs") in its contracting and procurement opportunities including concessions, construction and design, and goods and services. The Authority's commitment to equality of economic opportunity for M/W/DBEs includes relations with concessionaires, lessees, suppliers, contractors, consultants and others with whom it does business.

The Authority also encourages and supports economic opportunities for the residents of those neighboring communities (East Boston, South Boston, Charlestown, Chelsea, Winthrop, Revere, Leicester, Worcester, Lexington, Lincoln, Concord and Bedford) most directly impacted by the operation of the Authority's facilities.

Environmental and Regulatory Considerations

Certain of the activities of the Authority are subject to review, or are otherwise affected, by a variety of environmental protection and other regulatory agencies including those set forth under this section.

Federal Aviation Administration. The FAA is responsible for the inspection and certification of various airfield facilities and procedures. In particular, federal law requires operators of air carrier airports (including the Authority) to hold a current airport certificate granted by the FAA evidencing satisfactory compliance with numerous operational and safety standards. The Authority holds valid Part 139 certificates from the FAA permitting all current operations at the Airport, Hanscom Field and Worcester Regional Airport. The FAA regulates the imposition, collection and use of PFCs and the FAA also administers federal AIP grants, and monitors compliance with numerous grant conditions. In addition, the FAA provides and maintains navigational aids at the Airport, Hanscom Field and Worcester Regional Airport and has exclusive control over airspace management and air traffic. See "AVIATION INDUSTRY CONSIDERATIONS."

Transportation Security Administration. Created in 2001 by the Aviation and Transportation Security Act, and part of the Department of Homeland Security, the TSA is responsible for transportation security nationally. In particular, TSA is required to screen all commercial airline passengers and all baggage loaded onto commercial airplanes, and has promulgated regulations regarding both aviation and maritime security applicable to the Authority's facilities.

Federal Maritime Commission. Pursuant to certain provisions of the Shipping Act of 1984, certain of the Authority's rates, charges and terms for marine terminal services must be filed with the Federal Maritime Commission.

Environmental Protection Agency. The EPA is ultimately responsible for administering air and water pollution control regulations, which directly affect operations of the Authority. Pursuant to requirements promulgated by the EPA under the Clean Air Act of 1970 and subsequent amendments thereto, the Authority is subject to certain limitations regarding parking and other activities at the Airport, including heating plant performance standards. See "AIRPORT PROPERTIES – Airport Facilities – Parking Facilities." Under the federal Water Pollution Control Act, the Authority holds permits for certain discharges into Boston Harbor. The Authority and certain of its tenants as co-permittees were issued an individual stormwater permit for the Airport in September 2007, in accordance with the relevant EPA stormwater discharge regulations. The Authority conducts regular outfall water quality monitoring in compliance with its permits and routinely makes filings with the EPA as required. The Authority has in place strategies for compliance with all EPA requirements in this regard.

Massachusetts Executive Office of Environmental Affairs. The Massachusetts Environmental Protection Act requires certain public instrumentalities such as the Authority to determine the effect of their activities on the environment and to use all practicable means to minimize environmental damage. Furthermore, environmental assessment procedures administered by the Executive Office of Environmental Affairs apply to certain of the Authority's projects as well to certain projects, leases or permits authorized by the Authority.

Other Regulatory Matters. Numerous activities of the Authority require approvals of, or are subject to oversight by, state and federal agencies with jurisdiction over historic structures, wetlands, shorelines, harbors and other areas and over contamination and hazardous waste. These agencies include the U.S. Coast Guard, the

Commonwealth's Coastal Zone Management Office, the Massachusetts Water Resources Authority, the Department of Environmental Protection, the U.S. Army Corps of Engineers and conservation and historic preservation commissions in the cities and towns in which the Authority's facilities are located. The Authority also is subject to certain statutes and regulations governing public bidding, health and safety, access for the disabled and matters relating to equal opportunity employment.

Local Impact Considerations

The location of the Airport, bounded by residential neighborhoods and mixed residential and commercial areas, as well as wetland and open water habitats, necessitates that Airport development and operations be undertaken with sensitivity to environmental factors. While new routing by the FAA has concentrated noise in a narrower band, the impact of aircraft operations at the Airport has led to the development of noise abatement programs by the Authority consistent with maintaining high quality air service for the New England area. The programs include noise abatement ground procedures, restrictions on flights by certain aircraft types during latenight hours (although the restricted aircraft types are largely no longer in use), development (with the FAA) of noise abatement preferential runway systems and institution of procedures to encourage the air carriers to provide services at the Airport with the quietest aircraft certificated in accordance with federal noise emission abatement standards. These programs have had the result of shifting some services out of the late-night hours, but are not believed by the Authority to have had, or to be likely to have, a material effect on Airport Revenues. Over the past 30 years, the Authority has also implemented an extensive soundproofing program involving 37 local schools and more than 11,500 dwelling units as of March 2014. See "CAPITAL PROGRAM – Authority Funded Capital Projects – Logan Airport Improvements – *Other Airport Projects*."

A number of noise abatement programs have been instituted at Hanscom Field in order to reduce the impact of aircraft operations on surrounding communities. These programs include a computer-based program to monitor overall noise impact, noise abatement rules and regulations and nighttime fees and operations restrictions, and a 300-foot noise berm constructed adjacent to a residential neighborhood.

Financial Considerations

Authority Pension Funding. The Massachusetts Port Authority Employees' Retirement System (the "Plan") is a single employer plan established on July 18, 1978, effective January 1, 1979, by enactment of Chapter 487 (an amendment to Chapter 32) of the General Laws of the Commonwealth to provide retirement benefits for substantially all employees of the Authority, and incidental benefits for their surviving spouses, beneficiaries and contingent annuitants. The Plan is a contributory defined benefit plan to which the Authority and its employees contribute such amounts as are necessary to provide assets sufficient to meet benefits to be paid to plan participants. Each year the Authority funds the Plan with an amount equal to the actuarially determined annual contribution using the Frozen Entry Age Actuarial Cost Method. The Plan is administered by the Massachusetts Port Authority Employees' Retirement System Board (the "Board"). As of January 1, 2014, the Authority's actuarial accrued liability totaled approximately \$ 503.5 million, and the actuarial value of Plan assets available for Plan benefits was approximately \$ 479.2 million. See Note 6 to the Financial Statements in APPENDIX B to the Official Statement for additional information regarding the Plan.

In June 2012, GASB issued Statement No. 68, Accounting and Financial Reporting for Pensions ("GASB 68") which sets forth new standards that will modify the accounting and financial reporting of the Authority's pension obligations. The Statement requires governments, similar to the Authority, that participate in defined benefit pension plans to report a net pension liability or asset in their statement of net position. The net pension liability or asset is the difference between the total pension liability (the present value of projected benefit payments to employees based on their past service) and the assets (mostly investments reported at fair value) set aside in a trust and restricted to paying benefits to current employees, retirees and their beneficiaries. The new standard will require immediate recognition of annual service cost and interest on the pension liability and immediate recognition of the effect on the net pension liability of changes in benefit terms. Other components of pension expense will be recognized over a closed period that is determined by the average remaining service period of the plan members (both current and former employees, including retirees). These other components include the effects on the net pension liability of (a) changes in the economic and demographic assumptions used to project benefits and (b) differences between those assumptions and actual experience. Lastly, the effects on the net pension liability of

differences between expected and actual investment returns will be recognized in pension expense over a closed five year period. The Authority has received a draft valuation as of January 1, 2015, which incorporates the new GASB 68 standard. It shows the Authority's total pension liability was approximately \$565.9 million and the market value of Plan assets available for Plan benefits was approximately \$537.2 million. The new standard is likely to result in the Authority recognizing less pension expense in fiscal year 2015 than is currently required for funding purposes and a net pension liability of approximately \$28.2 million (unaudited). The GASB 68 standard will be effective for the Authority's fiscal year 2015, and the Authority expects that its audited financial statements for fiscal year 2015 will include comparable information for fiscal year 2014.

Other Post-Retirement Employee Benefits. The Authority extends other post-retirement benefits ("OPEB") to its employees as provided under the Enabling Act and Chapter 32A of the Massachusetts General Laws. In June 2008, the Authority established an irrevocable trust (an "OPEB Trust") to partially fund the projected accrued liability for other post-retirement benefits. Prior to the establishment of the OPEB Trust, the Authority funded other post-retirement benefits exclusively on a pay-as-you-go basis. As of January 1, 2015, based upon a draft bi-annual valuation, the Authority's Actuarial Accrued Liability ("AAL") for OPEB was approximately \$237.1 million, and the actuarial value of assets held by the OPEB Trust was \$148.5 million or 62.6% of this AAL. See Note 7 to the Financial Statements in APPENDIX B to the Official Statement for additional information regarding the Authority's OPEB obligations.

Payments in Lieu of Taxes. The Enabling Act authorizes and directs the Authority, subject to certain standards and limitations, to enter into agreements to make annual payments in lieu of taxes to the Cities of Boston and Chelsea and the Town of Winthrop. In accordance with the Transportation Reform Act, as of January 1, 2010, the portion of the Authority's in-lieu-of-tax payment obligations to the City of Chelsea attributable to the Tobin Bridge was assumed by MassDOT. The Enabling Act, the 1978 Trust Agreement and the payment in lieu of tax agreements provide that the payments under these agreements for any fiscal year may not exceed the balance of revenues remaining for such fiscal year after payment of debt service and required reserve account deposits on outstanding Bonds, payment of operating expenses and payment of required deposits to the Maintenance Reserve Fund. See Note 10 to the Financial Statements in APPENDIX B to the Official Statement.

Pursuant to the terms of the amended payment in-lieu-of-taxes agreement between the Authority and the City of Boston (the "Boston PILOT Agreement"), the Boston PILOT Agreement terminates on June 30, 2020; provided, however, that absent an annual election by either party to terminate the Boston PILOT Agreement, the term is subject to automatic one-year extensions of the term on each July 1. The Boston PILOT Agreement provides for the Authority to pay: (i) an annual base amount (the "Base Amount") of \$14.0 million, which, commencing in fiscal year 2007, increases annually by the annual percentage change in the consumer price index, provided that such increase shall be no less than 2.0%, nor greater than 8.0%, per year, and (ii) for ten years, an amount of \$700,000, which shall not be increased or adjusted. In accordance with the Transportation Reform Act, the portion of the Authority's PILOT obligations to the City of Boston attributable to the Tobin Bridge was assumed by MassDOT as of January 1, 2010.

In fiscal year 2006, the Authority and the Town of Winthrop entered into an Amended and Restated Payment-In-Lieu-Of-Taxes Agreement (the "Winthrop PILOT Agreement"), which extended the base in-lieu-of-tax payments through fiscal year 2025. The Winthrop PILOT Agreement provides for the Authority to make an annual payment of \$900,000, which will be adjusted in fiscal years 2016 through 2025 if the average annual percentage change in the consumer price index in fiscal year 2006 through 2015 is less than 2.0% or more than 8.0%.

Risk Management

Under the 1978 Trust Agreement the Authority is required to maintain insurance substantially in compliance with the recommendations of the Risk Management Consultant. See APPENDIX E to the Official Statement – Summary of Certain Provisions of the 1978 Trust Agreement – Insurance. The Authority maintains a program of risk management designed to afford insurance protection meeting the requirements of the 1978 Trust Agreement and of sound business practice at the best available cost. The Authority's insurance program includes coverages from domestic and international insurance markets. The program also includes a reserve held in the Self-Insurance Account designed to fund deductibles and self-insurance of certain risks. The Authority is a legislatively mandated self-insurer for its workers' compensation risk. The self-insurance program is administered with

assistance from a third party administrator and losses are funded through a dedicated Self-Insurance Account within the Operating Fund under the 1978 Trust Agreement (the "Self-Insurance Account").

The Authority's risk management program is designed to provide an appropriate level of protection against catastrophic loss, including direct damage to its Projects, loss of revenue and third party legal liability obligations. The program utilizes a combination of purchased insurance and the Self-Insurance Account to provide this level of protection. The principal areas of risk exposure covered by self-insurance are: insurance policy deductibles, workers' compensation self-insured retention, uninsurable risks (e.g., earthquake above \$250.0 million and certain environmental pollution), directors' and officers' liability and excess liability.

Prior to September 11, 2001, the Authority's liability insurance and property insurance policies provided coverage for acts of war and terrorism. On November 26, 2002, President Bush signed into law the Terrorism Risk Insurance Act of 2002 ("TRIA"). TRIA effectively nullified all existing exclusions for acts of terrorism carried out by foreign terrorists. All insured entities covered by TRIA were given the opportunity to continue this coverage upon payment of an additional premium quoted by underwriters. Following the recommendations of the Authority's Risk Management Consultant, the Authority has obtained terrorism insurance under either TRIA, where available and not cost prohibitive, or by purchasing coverage under a War Risk buy back option.

The Authority maintains a Self-Insurance Account to cover all areas of self- insurance. See APPENDIX E to the Official Statement – Summary of Certain Provisions of the 1978 Trust Agreement – Insurance. As of March 31, 2015, the fund balance in the Self-Insurance Account was \$29.4 million. Annual contributions, consistent with the recommendations of the Authority's Risk Management Consultant, are made to this account as part of the Authority's annual budget process. Losses within the self-insurance area are administered by Authority personnel, use of outside adjusters on a case specific basis and a third-party administrator for certain workers' compensation losses. The Authority's most recent annual Risk Management Assessment Report states that the extent of the Authority's funding of future liabilities within the Self Insurance Account represents what the Authority's Insurance Consultant considers to be a "best practice" among complex public agencies. For workers' compensation, observed losses within the working (retained) layer are predictable and level over time which makes this an appropriate area for risk retention. The report also notes that the combination of internal administration and third-party administration of self-insured claims is sound and cites a demonstrated reduction in loss adjustment expenses, particularly, in the general liability and workers' compensation areas.

Insurance markets are cyclical. The Authority believes that its proactive risk management program is critical in its effort to contain cost and will continue to yield better results than alternative approaches.

Debt Issuance and Debt Management Policy

In February 2010, the Authority initially adopted a Debt Issuance and Debt Management Policy ("Debt Policy"). The Debt Policy covers the types of debt that the Authority may issue; the legal, policy and financial limits that govern the issuance of debt; the use of derivatives; debt structuring practices; debt issuance practices; and debt management practices including tax law requirements, arbitrage regulations, investment of bond proceeds, disclosure and records retention. The policy requires the Members of the Authority to review and consider revisions to the policy every two years. Pursuant to the Debt Policy, projects that are funded with Bond proceeds should be central to the Authority's core mission; debt issuance practices should support the maintenance of the Authority's long term credit ratings; and projects must be included in the Authority's five-year capital program. Specific financial metrics, including those listed below, were established for the five-year capital program in support of these objectives.

Debt Policy Goal

Annual Debt Service Coverage	1.75x
Contribution Margin ¹	> or = 30%
Contribution Margin (Logan Airport)	> or = 30%
Operating Ratio ²	< or = 70%

¹ Contribution Margin: (operating revenues minus operating expenses and PILOT payments³)/total operating revenues.

The Members of the Authority most recently reviewed and re-adopted the Debt Policy in March 2014. Currently, the Authority has no outstanding Financial Hedges (defined below).

Investment Policy

All investments of Authority funds are made in accordance with the provisions of the 1978 Trust Agreement, the PFC Trust Agreement or the CFC Trust Agreement and the investment policy adopted in 2000 (and most recently updated in March 2014) by the Authority (the "Investment Policy"). The goals of the Investment Policy, in order of importance, are: (1) to preserve capital, (2) to provide liquidity to meet payment obligations, and (3) to generate investment income. As authorized by the Investment Policy, the Investment Oversight Committee, chaired by the Director of Administration and Finance of the Authority, oversees the Authority's investments. The Investment Oversight Committee has established diversification requirements for its investments. The Investment Oversight Committee meets quarterly and determines the general strategies for investment activities and monitors investment results against external benchmarks.

Financial Hedge Policy

In October 2004, the Members of the Authority approved a formal Financial Hedging Policy, which provides general guidelines regarding the use, procurement and execution of all interest rate swaps, options, caps, collars and related financial transactions ("Financial Hedges") by the Authority. No Financial Hedge may be executed without the approval of the Members of the Authority and review by the State Finance and Governance Board. Prior to seeking the approval of the Authority of any proposed Financial Hedge, the Investment Oversight Committee must undertake an identification and evaluation of the financial benefits and risks involved in the Financial Hedge transaction, including certain enumerated risks, and summarize them for the Members of the Authority. Financial Hedges may not be entered into for speculative purposes, where the Authority does not have sufficient liquidity to terminate an existing Financial Hedge at current market values, or where there is insufficient price transparency to permit reasonable valuation of the Financial Hedge. Counterparty exposure may not exceed prudent limits, and only entities rated "A" or better (or guarantors of such entities) may be counterparties. Financial Hedges are to be used only to lower the cost of the Authority's borrowing; to reduce exposure to changes in interest rates; or to manage the Authority's credit exposure to existing Financial Hedge counterparties. Currently, the Authority has no outstanding Financial Hedges.

OTHER OBLIGATIONS

The following describes the indebtedness and obligations of the Authority that are not secured under the 1978 Trust Agreement or that are secured on a subordinated basis. See APPENDIX B to the Official Statement – Financial Statements of the Authority for further information.

PFC Revenue Bonds

In June 2007, the Authority issued its PFC Revenue Bonds, Series 2007B and PFC Revenue Refunding Bonds, Series 2007D (the "2007 PFC Revenue Bonds"), pursuant to the PFC Trust Agreement by and between the Authority and The Bank of New York Mellon Trust Company, N.A., as trustee (the "PFC Trustee"), dated as of

Operating Ratio: operating expense plus PILOT payments/operating revenues.

³ Annual PILOT payments for fiscal years 2015 through 2019 are forecast to be \$19,282,000, \$19,782,000, \$20,326,000, \$20,887,000 and \$21,464,000, respectively.

May 6, 1999 (the "PFC Trust Agreement"), as amended, and the Second Supplemental Agreement dated as of May 17, 2007 (the "Second Supplemental PFC Trust Agreement") between the Authority and the PFC Trustee. In August 2010, the Authority issued its PFC Revenue Refunding Bonds, Series 2010-E (the "2010 PFC Revenue Bonds"), pursuant to the PFC Trust Agreement, as amended, and the Third Supplemental PFC Trust Agreement dated as of July 15, 2010 (the "Third Supplemental PFC Trust Agreement") between the Authority and the PFC Trustee.

The 2007 PFC Revenue Bonds, the 2010 PFC Revenue Bonds and any additional bonds that may be issued under the PFC Trust Agreement on a parity therewith (collectively, the "PFC Revenue Bonds") are secured by the PFCs imposed by the Authority at the Airport. The PFC Revenue Bonds are not secured by the Revenues that secure the Bonds or the CFC Pledged Receipts (as defined in the CFC Trust Agreement described below) that secure the CFC Revenue Bonds, and PFCs are not included in such Revenues or CFC Pledged Receipts.

As of July 2, 2015, PFC Revenue Bonds in an aggregate principal amount of \$75.2 million will be the only PFC Revenue Bonds outstanding under the PFC Trust Agreement with final maturity of July 1, 2017.

CFC Revenue Bonds

In June 2011, the Authority issued its Special Facilities Revenue Bonds (ConRAC Project), Series 2011A and 2011B (collectively, the "2011 CFC Revenue Bonds") pursuant to the CFC Trust Agreement dated as of May 18, 2011 (the "CFC Trust Agreement"), by and between the Authority and U.S. Bank National Association, as trustee (the "CFC Trustee"). The proceeds of the 2011 CFC Revenue Bonds were used to finance the construction of the RCC.

The 2011 CFC Revenue Bonds and any additional bonds that may be issued under the CFC Trust Agreement on a parity with the 2011 CFC Revenue Bonds (collectively, the "CFC Revenue Bonds") are secured by the CFC Pledged Receipts (as defined in the CFC Trust Agreement). The CFC Revenue Bonds are not secured by the Revenues that secure the Bonds or the PFC revenues that secure the PFC Revenue Bonds, and CFCs are not included in such Revenues or PFC revenues.

As of July 2, 2015, the 2011 CFC Revenue Bonds in an aggregate principal amount of \$201.7 million will be the only CFC Revenue Bonds outstanding under the CFC Trust Agreement.

Special Facilities Revenue Bonds

The Authority has issued, and may in the future issue, additional special facilities revenue bonds to finance various capital projects on a non-recourse basis. The principal of and interest on the special facilities revenue bonds issued by the Authority are special obligations of the Authority, payable solely from the sources provided; none of such special facilities bonds are secured by the Revenues of the Authority. Each special facility bond issue is secured differently and under a separate trust agreement.

As of July 2, 2015, the Authority will have approximately \$599.1 million of special facilities revenue bonds outstanding, as follows:

- 1. Special Facilities Revenue Bonds (BOSFUEL Project), Series 2007 (the "BOSFUEL Bonds")
- 2. Special Facilities Revenue Bonds (Delta Air Lines, Inc. Project), Series 2001A, 2001B and 2001C
- 3. Special Facilities Revenue Refunding Bonds (Harborside Hyatt Conference Center and Hotel Project), Series 2001-A (Tax-Exempt) and 2001-B (Taxable)

Subordinated Revenue Bonds

On December 29, 2000 and January 2, 2001, the Authority issued its Subordinated Revenue Bonds, Series 2000-A, 2000-B and 2000-C, and Series 2001-A, 2001-B and 2001-C, respectively (collectively, the "Subordinated Bonds") to finance acquisition of the ParkEX facility. The Subordinated Bonds, which as of July 2, 2015 will be outstanding in the aggregate principal amount of \$74.0 million, are payable solely from funds on deposit in the Improvement and Extension Fund in a separate account not subject to the pledge of the 1978 Trust Agreement, the

PFC Trust Agreement or the CFC Trust Agreement. At the issuances of the Subordinated Bonds, \$12.0 million was invested pursuant to two guaranteed investment contracts, which at their maturity are expected to provide for the \$74.0 million principal payments of the Subordinated Bonds at their respective maturities. The Subordinated Bonds are subordinate to the 2015 Bonds and all other outstanding Bonds issued under the 1978 Trust Agreement.

Commercial Paper

On May 15, 2012, the Authority renewed its commercial paper program in an aggregate principal amount not to exceed \$100.0 million and entered into a three-year Letter of Credit and Reimbursement Agreement with TD Bank, N.A., to provide security for the commercial paper program. On March 4, 2014, the Authority amended the commercial paper program increasing the aggregate principal amount not to exceed \$150.0 million and extending the expiration of the Letter of Credit and Reimbursement Agreement with TD to June 1, 2017. As of July 2, 2015, the Authority will have outstanding \$150.0 million of commercial paper notes. The obligations of the Authority with respect to its commercial paper notes are secured by the Improvement and Extension Fund and the proceeds of Bonds subsequently issued for that purpose. While PFCs are not pledged to secure the Authority's commercial paper, the Authority currently expects to repay a significant portion of the notes from the PFC Capital Fund.

The Authority expects to repay and redeem \$50.0 million of the existing commercial paper with the proceeds of the 2015-A Bonds; shortly thereafter the Authority expects to issue new commercial paper that will serve as bond anticipation notes to be refinanced with proceeds of the 2018 Bonds.

LEGISLATIVE DEVELOPMENTS

From time to time legislation has been introduced in the Massachusetts Legislature for the purpose of altering the responsibilities of the Authority, reducing its independence, limiting its planning and operations, taxing its commercial tenants directly, or requiring it to make payments to other governmental entities in the Commonwealth. On June 23, 2015, the Joint Committee on Transportation voted out favorably legislation that would authorize the Authority to enter into agreements with the MBTA (i) to take over ownership, operation and maintenance of commuter boat ferry service currently operated by or on behalf of the MBTA or (ii) to pay funds to the MBTA for operating assistance and/or capital projects related to this ferry service. The Authority cannot currently predict the potential cost of operating the ferry service. It is not possible to predict whether legislation concerning this or any other transportation initiatives will be enacted.

In addition, the Authority is subject to state and federal laws of general application, changes to which could have a material effect on the operations or financial position of the Authority. See "AVIATION INDUSTRY CONSIDERATIONS" and "GENERAL OPERATIONAL FACTORS."

LITIGATION

No litigation is pending or, to the knowledge of the Authority, threatened against or affecting the Authority seeking to restrain or enjoin the issuance, sale or delivery of the 2015 Bonds or in any way contesting or affecting the validity of the 2015 Bonds.

On September 11, 2001, terrorists hijacked American Airlines Flight 11 and United Airlines Flight 175 and flew them into the World Trade Center in New York, New York. The terrorist acts caused the deaths of approximately 3,000 persons, unknown numbers of personal injuries, and massive property damage. Both flights originated at Logan Airport.

In September 2001, Congress passed the Air Transportation Safety and System Stabilization Act ("ATSSSA"), which provides, among other things, a limitation on liability of various entities, including airport sponsors such as the Authority, for the events of September 11, 2001. Specifically, the liability of an airport sponsor for those events "shall not be in an amount greater than the limits of liability insurance coverage maintained by that ... airport sponsor." The Authority has insurance in effect to cover these incidents in the amount of \$500,000,000 per occurrence, and consequently, under ATSSSA, the Authority's liability, if any, would be limited to such amounts. To the Authority's knowledge, the Authority's insurer has received copies of all complaints and Notices

of Claim and/or any other form of notification to the Authority by an individual or entity claiming to have suffered a loss. Furthermore, to the Authority's knowledge, its insurer has agreed to defend any such claims and has not reserved its rights to deny coverage with respect to any of those claims, although the insurer has reserved its rights with respect to: (i) the number of occurrences, (ii) indemnification of the Authority against any award of punitive damages, and (iii) the Authority's rights as a named additional insured under other policies of insurance, including policies of the Authority's tenants and licensees.

On July 18, 2013, the Authority was dismissed from the remaining property damage lawsuits, both brought by World Trade Center Properties, LLC ("WTC Properties"). WTC Properties appealed this ruling and oral arguments occurred on January 14, 2015. While the Authority cannot predict the outcome of this appeal, it believes it has meritorious defenses to these actions and will continue to review and assess the various claims asserted. All other wrongful death and property damage lawsuits against the Authority and other defendants have been settled or dismissed. These settlements have been achieved without any financial contribution from the Authority or its insurer, though the settling plaintiffs have provided the Authority with a release of all claims.

The Authority also is engaged in other litigation. These routine matters include personal injury and property damage claims for which the Authority's liability is covered in whole or in part by insurance. Others include such matters as disputes with employees; disputes with contractors, subcontractors, engineers and others arising out of construction and maintenance of its properties; disputes over leases and concessions; eminent domain disputes; and property, theft and damage claims arising from the Authority's parking operations, as to which the Authority is self-insured. The Authority does not expect that these matters will require any amounts to be paid that, singly or in the aggregate, will have a material effect on the operations or financial position of the Authority.

[End of Information Statement of the Authority.]

MASSACHUSETTS PORT AUTHORITY

Financial Statements, Required Supplementary Information, and Supplementary Schedules

Years Ended June 30, 2014 and 2013

(With Report of Independent Auditors)

MASSACHUSETTS PORT AUTHORITY

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Report of Independent Auditors

To the Members of the Massachusetts Port Authority

We have audited the accompanying financial statements of the Massachusetts Port Authority (the Authority) as of and for the years ended June 30, 2014 and 2013, and the related notes to the financial statements, which collectively comprise the basic financial statements listed in the table of contents.

Management's Responsibility for the Financial Statements

Management is responsible for the preparation and fair presentation of these financial statements in conformity with U.S. generally accepted accounting principles; this includes the design, implementation, and maintenance of internal control relevant to the preparation and fair presentation of financial statements that are free of material misstatement, whether due to fraud or error.

Auditor's Responsibility

Our responsibility is to express an opinion on these financial statements based on our audits. We conducted our audits in accordance with auditing standards generally accepted in the United States. Those standards require that we plan and perform the audit to obtain reasonable assurance about whether the financial statements are free of material misstatement.

An audit involves performing procedures to obtain audit evidence about the amounts and disclosures in the financial statements. The procedures selected depend on the auditor's judgment, including the assessment of the risks of material misstatement of the financial statements, whether due to fraud or error. In making those risk assessments, the auditor considers internal control relevant to the entity's preparation and fair presentation of the financial statements in order to design audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of the entity's internal control. Accordingly, we express no such opinion. An audit also includes evaluating the appropriateness of accounting policies used and the reasonableness of significant accounting estimates made by management, as well as evaluating the overall presentation of the financial statements.

We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our audit opinion.



Opinion

In our opinion, the financial statements referred to above present fairly, in all material respects, the financial position of the Massachusetts Port Authority at June 30, 2014 and 2013, and the changes in its financial position and its cash flows for the years then ended in conformity with U.S. generally accepted accounting principles.

Required Supplementary Information

Accounting principles generally accepted in the United States require that management's discussion and analysis, the schedule of pension funding progress and the schedule of OPEB funding progress as listed in the table of contents be presented to supplement the basic financial statements. Such information, although not a part of the basic financial statements, is required by the Governmental Auditing Standards Board which considers it to be an essential part of financial reporting for placing the basic financial statements in an appropriate operational, economic, or historical context. We have applied certain limited procedures to the required supplementary information in accordance with auditing standards generally accepted in the United States, which consisted of inquiries of management about the methods of preparing the information and comparing the information for consistency with management's responses to our inquiries, the basic financial statements, and other knowledge we obtained during our audits of the basic financial statements. We do not express an opinion or provide any assurance on the information because the limited procedures do not provide us with sufficient evidence to express an opinion or provide any assurance.

Supplementary Information

Our audits were conducted for the purpose of forming an opinion on the financial statements as a whole. The supplementary schedules, as listed in the table of contents, are presented for purposes of additional analysis and are not a required part of the financial statements. Such information is the responsibility of management and was derived from and relates directly to the underlying accounting and other records used to prepare the financial statements. The information has been subjected to the auditing procedures applied in the audits of the financial statements and certain additional procedures, including comparing and reconciling such information directly to the underlying accounting and other records used to prepare the financial statements or to the financial statements themselves, and other additional procedures in accordance with auditing standards generally accepted in the United States. In our opinion, the information is fairly stated, in all material respects, in relation to the financial statements as a whole.

Boston, Massachusetts September 24, 2014 Ernst + Young LLP

MANAGEMENT'S DISCUSSION AND ANALYSIS

Introduction

The following discussion and analysis of the financial performance and activity of the Massachusetts Port Authority (the "Authority") is intended to provide an introduction and an overview of the financial statements of the Authority as of and for the fiscal years ended June 30, 2014, 2013 and 2012, respectively. This discussion should be read in conjunction with the audited financial statements attached hereto. Management has established and maintains certain internal controls and procedures designed to ensure that the annual financial statements are free from material misstatement and that all required disclosures are made in its annual financial statements. Management has reviewed the Authority's current internal controls and procedures and believes that such controls and procedures are adequate in order to record, process, summarize and report to management material information required to be disclosed by the Authority in its annual financial statements.

The Authority owns Logan International Airport ("Logan Airport"), Hanscom Field, Worcester Regional Airport ("Worcester Airport"), Conley Terminal and various other maritime properties (the "Port"). The Authority has no taxing power and is not taxpayer funded. It uses revenues from landing fees, parking fees, fees from terminal and other rentals, revenues from concessions, tolls, ground rents, and other charges to fund operating expenses. The Authority's revenues also fund its capital expenditures and include other sources such as federal grants, passenger facility charges ("PFCs"), and customer facility charges ("CFCs"). The Authority issues revenue bonds which are secured solely by the Authority's Revenues, as defined by the 1978 Trust Agreement, the PFC Trust Agreement and the CFC Trust Agreement, respectively. The Authority's bonds do not constitute a debt or a pledge of the full faith and credit of the Commonwealth of Massachusetts or of any other political subdivision thereof.

The Financial Statements

The Authority's financial statements include three comparative statements: the Statements of Net Position; the Statements of Revenues, Expenses and Changes in Net Position; and the Statements of Cash Flows. These financial statements have been prepared in accordance with U.S. generally accepted accounting principles as promulgated by the Governmental Accounting Standards Board ("GASB").

The comparative Statements of Net Position depict the Authority's financial position as of a point in time, specifically June 30, 2014, and 2013, and include all assets, deferred outflows and liabilities of the Authority. The net position represents the residual interest in the Authority's assets and deferred outflows after liabilities are deducted. The Authority's net position is divided into three components: 1) invested in capital assets, 2) restricted, and 3) unrestricted. Please see Note 1 in the financial statements attached hereto for a discussion on the Authority's net position.

The Statements of Revenues, Expenses and Changes in Net Position report operating revenues, operating expenses, non-operating revenue and expenses, and other changes in net position for the fiscal years ending June 30, 2014 and 2013. Revenues and expenses are categorized as either operating or non-operating based upon management's policies as established in accordance with definitions set forth by the GASB. Certain sources of the Authority's revenues, including PFCs, CFCs, investment income and capital grants are reported as non-operating revenues and their uses are restricted and generally are not available for operating purposes.

The Statements of Cash Flows present information showing how the Authority's cash and cash equivalents position changed during the fiscal year. The Statements of Cash Flows classify cash receipts

and cash payments resulting from operating activities, capital and related financing activities, and investing activities.

Financial Highlights

- Logan Airport serviced a record 30.9 million passengers in fiscal year 2014. This represents an increase of passenger use of 1.4 million passengers or 4.9% when compared to fiscal year 2013. New international service was added at Logan Airport with the arrival of COPA Airlines and the announcement and arrival of service to Turkey, China, and the United Arab Emirates.
- Maritime serviced 116,800 containers at Conley Terminal in fiscal year 2014, a 6.0% increase over fiscal year 2013. Cruiseport Boston finished the fiscal year having serviced 338,442 cruise passengers, and approximately 109 cruise ships having visited the Port of Boston.
- The \$300 million Rental Car Center ("RCC") opened in the first quarter of fiscal year 2014 and began rental car and bus operations in the centralized facility thus reducing bus traffic at Logan by 60% and increasing curbside access.
- The \$125 million Terminal B renovation and improvement project was completed in the fourth quarter of fiscal year 2014 which includes the addition of jet bridges facilitating the use of larger aircraft, 24 new ticket counter positions, a relocated and modified passenger checkpoint, eight reconfigured departure lounges, and a secure passenger connection to Pier B that serves US Airways.
- Worcester Regional Airport welcomed 71,600 passengers in fiscal year 2014 with the start of jetBlue service to Orlando and Fort Lauderdale beginning in November 2013.
- The Authority's operating revenues in fiscal year 2014 grew 8.9% to \$622.5 million, an increase of \$50.7 million over fiscal year 2013. Operating expenses (excluding depreciation and amortization) were \$404.5 million, an increase of 9.2% or \$34.1 million over last year as new facilities came on line, environmental remediation expenses were recognized, and added costs were incurred to accommodate business growth at Logan Airport, Worcester Regional Airport, and Conley Terminal. Depreciation and amortization expense increased \$18.8 million to \$217.8 million in fiscal year 2014 primarily the result of the RCC and the renovated Terminal B becoming operational in fiscal year 2014. These new facilities account for approximately \$17.0 million in additional annual depreciation.
- The Authority's net position grew to \$1.92 billion, a \$91.8 million or 5.0% increase over the prior year. This 5.0% increase in net position was generated by operating revenues exceeding operating expenses by \$0.2 million, net non-operating revenues contributing \$35.5 million and recognizing capital grant revenues totaling \$56.1 million which are used for facility improvements.

The Authority's Condensed Statements of Revenues, Expenses and Changes in Net Position

		(in mi	llion	is)		2014 v	vs. 2013	
	2014		2013		\$ Change		% Change	
On anotin a navana	¢	622.5	ø	571.8	\$	50.7	8.9%	
Operating revenues	\$		\$	- / - / -	Þ			
Operating expenses		404.5		370.4		34.1	9.2%	
Depreciation and amortization		217.8		199.0		18.8	9.4%	
Operating income		0.2		2.4		(2.2)	-91.7%	
Total nonoperating revenues (expenses), net		35.5		21.2		14.3	67.5%	
Capital grant revenue		56.1		20.2		35.9	177.7%	
Increase in net position		91.8		43.8		48.0	109.6%	
Net position, beginning of year		1,828.5		1,784.7		43.8	2.5%	
Net position, end of year	\$	1,920.3	\$	1,828.5	\$	91.8	5.0%	

The Authority's net position increased \$91.8 million or 5.0%, \$43.8 million or 2.5% and \$89.3 million or 5.3% during fiscal years 2014, 2013 and 2012, respectively. The increase in net position is the result of operating revenues exceeding operating expenses by \$0.2 million, \$2.4 million and \$17.3 million in fiscal years 2014, 2013 and 2012, respectively. Net non-operating revenues of \$35.5 million, \$21.2 million and \$31.2 million generated during fiscal years 2014, 2013 and 2012, respectively, primarily the result of PFCs and CFCs collections which are offset by interest expense. The Authority also recognized \$56.1 million, \$20.2 million and \$40.8 million in capital grants in fiscal years 2014, 2013 and 2012, respectively, which were used primarily to finance various airport airfield and security projects.

The Authority's Condensed Statements of Revenues, Expenses and Changes in Net Position

	(in millions)				2013 vs. 2012			
	2013		2012		\$ Change		% Change	
Operating revenues Operating expenses	\$	571.8 370.4	\$	558.4 359.9	\$	13.4 10.5	2.4% 2.9%	
Depreciation and amortization		199.0		181.2		17.8	9.8%	
Operating income		2.4		17.3		(14.9)	-86.1%	
Total nonoperating revenues (expenses), net		21.2		31.2		(10.0)	-32.1%	
Capital grant revenue		20.2		40.8		(20.6)	-50.5%	
Increase in net position		43.8		89.3		(45.5)	-51.0%	
Net position, beginning of year		1,784.7		1,695.4		89.3	5.3%	
Net position, end of year	\$	1,828.5	\$	1,784.7	\$	43.8	2.5%	

Operating Revenues

Operating revenues of the Authority consist primarily of fees, rentals, concessions and operating grants. Fees and other services ("Fee Revenue") are comprised essentially of parking fees, landing fees, and container handling fees. Rental revenues are earned through lease agreements for building and ground rents across the Authority's asset base, including Logan Airport, Hanscom Field, Worcester Airport and Port properties. Concession revenues consist primarily of fees earned from ground services for airport passengers, including car rentals, taxis, bus services, limousine services, and retail operations. The following table is a discussion of the Authority's major operating revenues as shown on the Authority's Condensed Statements of Revenues, Expenses and Changes in Net Position.

The Authority's Operating Revenues

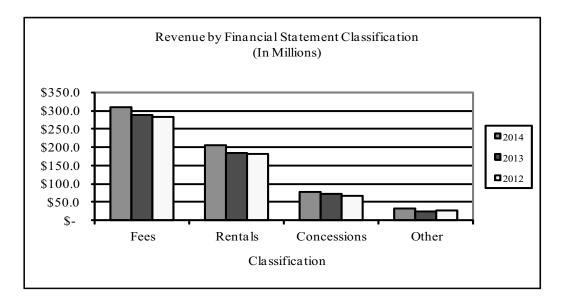
	(in millions)				2014 vs. 2013			
		2014		2013	\$ C	hange	% Change	
Operating revenues:								
Fees and other services	\$	308.5	\$	289.4	\$	19.1	6.6%	
Rentals		204.4		184.7		19.7	10.7%	
Concessions		77.9		72.5		5.4	7.4%	
Other, including operating grants		31.7		25.2		6.5	25.8%	
Total operating revenues	\$	622.5	\$	571.8	\$	50.7	8.9%	

The Authority's operating revenues for fiscal year 2014 were \$622.5 million, an increase of \$50.7 million or 8.9% from fiscal year 2013. The increase in operating revenue is mainly attributable to the record 30.9 million total passengers serviced at Logan Airport in fiscal year 2014. Revenues from fees and other services increased by \$19.1 million, or 6.6% in fiscal year 2014 due to higher parking revenues generated from the 4.9% increase in passenger volumes at Logan Airport, 4.1% growth in landed weights at Logan Airport related to the increase in international and domestic carriers and an average 3.4% increase in the rate per thousand pound. Also, the 6.0% growth in container volume at Conley Terminal contributed to higher fee revenues. Rental revenue increased \$19.7 million, or 10.7% over fiscal year 2013. This increase is due to higher Logan Airport terminal rents assessed the airlines for the recovery of operating expenses and capital improvements, increased terminal space usage, and higher commercial real estate rental revenues generated on South Boston properties and other Maritime facilities. Concession revenues increased \$5.4 million, or 7.4% in fiscal year 2014 due to increased rental car concession revenues, terminal advertising, and terminal concession sales within Logan Airport. Other income increased by \$6.5 million, or 25.8% in fiscal year 2014, as a result of opening the RCC and consolidating the Rental Car Shuttle Bus services. In addition, the Authority instituted a new shuttle bus service from Logan Airport to Boston's Back Bay train station and increased revenues from overnight aircraft parking fees resulting from increased international flights.

	 (in mi	llion	is)		2013 v	s. 2012
	 2013		2012	\$ C	hange	% Change
Operating revenues:						
Fees and other services	\$ 289.4	\$	283.4	\$	6.0	2.1%
Rentals	184.7		180.6		4.1	2.3%
Concessions	72.5		68.2		4.3	6.3%
Other, including operating grants	25.2		26.2		(1.0)	-3.8%
Total operating revenues	\$ 571.8	\$	558.4	\$	13.4	2.4%
				_		

The Authority's operating revenues for fiscal year 2013 were \$571.8 million, an increase of \$13.4 million or 2.4% from fiscal year 2012. The increase in operating revenue is mainly attributable to the record 29.4 million total passengers serviced at Logan Airport in fiscal year 2013. Revenues from fees and other services increased by \$6.0 million, or 2.1% in fiscal year 2013 due mainly to higher parking revenues generated from increased parking activity and an increase in commercial parking rates at Logan Airport that took effect in March 2012. Rental revenue increased \$4.1 million, or 2.3% over fiscal year 2012. This increase is due to higher Logan Airport terminal rents, and an increase in commercial real estate rental revenues generated on South Boston properties and other Maritime facilities. Concession revenues increased \$4.3 million, or 6.3% in fiscal year 2013 due to increased rental car concession revenues, terminal advertising, and terminal concession sales within Logan Airport's terminals. Other income decreased by \$1.0 million, or 3.8% in fiscal year 2013, from Logan instituting free outbound Silver Line bus service and reduced overnight aircraft parking fees.

The Authority's operating revenues for fiscal year 2012 were \$558.4 million, an increase of \$20.8 million or 3.9% from fiscal year 2011. The increase in operating revenue is mainly attributable to the record 29.3 million total passengers serviced at Logan Airport in fiscal year 2012. Revenues from fees and other services totaled \$283.4 million during fiscal year 2012, an increase of \$8.9 million or 3.2% when compared to \$274.5 million generated during fiscal year 2011. Parking revenues increased \$9.7 million or 8.3% due to increased passengers and a 12.5% increase in the daily commercial parking rate that took effect in March 2012 at Logan Airport. Landing fees were 3.5% lower than the previous year as an increase in landed weights was offset by a lower landing fee charged the airlines. Revenues from container activity were slightly higher as the Port serviced 107,477 containers in fiscal year 2012 as compared to 106,857 containers serviced in fiscal year 2011. Overall utility revenues were lower by about 4.5% as low natural gas prices and the warm winter season helped keep utility costs low. These savings were in part passed onto Airline tenants.



Fees and Other Services

Parking Fees: During fiscal year 2014, the Authority collected \$136.3 million in parking revenue at Logan Airport, an increase of \$4.4 million or 3.4% compared to fiscal year 2013. This increase in parking revenues is attributable to a 4.9% increase in passenger volume at Logan Airport. Parking exits

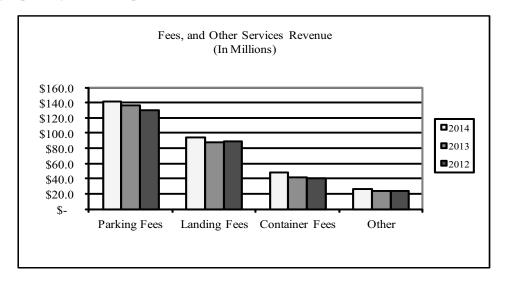
at Logan Airport for fiscal year 2014 were 2.61 million, a 1.3% increase from the prior fiscal year and revenue per exit was \$48.62, a 1.7% increase over the prior fiscal year.

During fiscal year 2014, the Maritime collected \$4.7 million in parking revenues, an increase of \$0.9 million or 23.7% compared to fiscal year 2013. This increase in parking revenues is attributable to increased activities in the waterfront area of the City and continued adjustments to daily and monthly rates to reflect market conditions in the area.

During fiscal year 2013, the Authority collected \$131.9 million in parking revenue at Logan Airport, an increase of \$6.1 million or 4.9% compared to fiscal year 2012. This increase in parking revenues is attributable to a full year effect of the 12.5% increase in the daily commercial parking rate that took effect in March 2012 and a 0.4% increase in passenger volume at Logan Airport. Parking exits at Logan Airport for fiscal year 2013 were 2.57 million, a 2.5% decrease from the prior fiscal year, although revenue per exit was \$47.80, a 7.9% increase over the prior fiscal year.

During fiscal year 2012, the Authority collected \$125.8 million in parking revenue, an increase of \$9.7 million or 8.3% compared to fiscal year 2011. This increase in parking revenues is attributable to a 12.5% increase in the daily commercial parking rate that took effect in March 2012 and a 3.1% increase in passenger volume at Logan Airport. Parking exits at Logan Airport for fiscal year 2012 were 2.64 million, a 0.05% increase over fiscal year 2011 and revenue per exit was \$44.31, an 8.3% increase from fiscal year 2011.

The following table is a presentation of the revenue components included in Fee Revenue by the Authority's primary business operations:

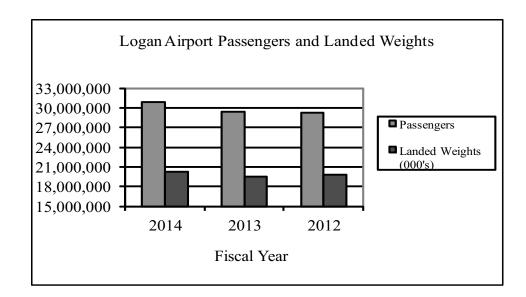


Landing Fees: Landing fees are principally generated from scheduled airlines and non-scheduled commercial aviation and are based on the landed weight of the aircraft at Logan Airport. The Logan Airport landing fee is determined annually based on full cost recovery to maintain the landing field. Landing fees earned from airline activity were \$92.9 million during fiscal year 2014, an increase of \$6.4 million or 7.4% compared to the \$86.5 million earned during fiscal year 2013. Logan Airport handled 20.29 billion pounds of landed weights during fiscal year 2014, which was a 4.1% increase from the 19.49 billion pounds handled in fiscal year 2013. Logan Airport serviced 363,900 aircraft operations at its runways (takeoffs and landings). This was an increase of 3.5% from the 351,500 aircraft operations serviced in fiscal year 2013. The increase in landed weight and operations are primarily attributable to the increase in domestic airline flights and new long haul international services at Logan Airport.

Hanscom Field and Worcester Airport landing fees totaled \$1.0 million in fiscal year 2014 and \$0.9 million in fiscal year 2013.

In fiscal year 2013, landing fees earned from airline activity was \$86.5 million, a 2.0% decrease compared to \$88.3 million earned during fiscal year 2012. Logan Airport handled 19.49 billion pounds of landed weights during fiscal year 2013, which was a 1.8% decrease from the 19.85 billion pounds handled in fiscal year 2012. Logan Airport serviced 351,500 aircraft operations at its runways (takeoffs and landings). This was a decrease of 3.8% from the 365,000 aircraft operations serviced in fiscal year 2012. The decrease in landed weight and operations is partly attributable to the consolidation of certain airline routes. Hanscom Field and Worcester Airport landing fees totaled \$0.9 million in fiscal year 2013 and \$1.0 million in fiscal year 2012

In fiscal year 2012, Logan Airport landing fee revenue was \$88.3 million, a 3.5% decrease over fiscal year 2011 landing fee revenue of \$91.5 million. The reduction in revenues can be attributed to lower capital financing costs and reduced operating expenses from favorable winter conditions. During fiscal year 2012, Logan Airport handled 19.85 billion pounds, an increase from the 19.71 billion pounds of landed weights handled in fiscal year 2011. Logan Airport runways serviced 365,000 aircraft operations in fiscal year 2012, an increase of 3,000 aircraft operations over the 362,000 aircraft operations serviced in fiscal year 2011. The increase is mainly attributable to the growth of low cost carrier service at Logan Airport. Hanscom Field and Worcester Airport landing fees totaled \$1.0 million in fiscal year 2012 and \$0.9 million in fiscal year 2011.



Container Fees: Container fees generated at Conley Terminal are fees charged to the shipping lines for the loading and unloading of containers from their vessels. During fiscal year 2014 container fees generated \$47.4 million in revenues. This is an increase of \$5.4 million or 12.9% over the \$42.0 million generated in fiscal year 2013. Conley Terminal handled 116,800 containers in fiscal year 2014, an increase of approximately 6,600 containers over the 110,200 containers handled in fiscal year 2013. This increase in container volume coupled with carrier rate adjustments contributed to this increase in container fees for Conley Terminal.

During fiscal year 2013 container fees generated \$42.0 million in revenues. This is an increase of \$1.6 million over the \$40.4 million generated in fiscal year 2012. Conley Terminal handled 110,200 containers in fiscal year 2013, an increase of approximately 2,700 containers over the 107,500 containers handled in fiscal year 2012. This increase in container volume contributed to an increase in container fees for Conley Terminal.

During fiscal year 2012 container fees generated \$40.4 million in revenue from shipping lines. This was an increase of \$0.3 million over the \$40.1 million in container fees generated in fiscal year 2011. Conley Terminal handled 107,500 containers at the Port in fiscal year 2012. This was a 0.6% increase over the 106,900 containers serviced in fiscal year 2011.

Rentals

The Authority's rental revenues for fiscal year 2014 totaled \$204.4 million, a \$19.7 million or 10.7% increase over fiscal year 2013. Logan Airport accounts for \$175.7 million or 85.9% of the \$204.4 million in total rental revenue recorded in the Authority's financial statements. Maritime accounts for \$23.4 million and Hanscom for \$5.1 million. Airport rental revenue is earned from airlines and other tenants for the terminal buildings, cargo, and hangar space they occupy on airport property.

Rental revenues at Logan Airport were \$175.7 million, an increase of \$15.7 million or 9.8% in fiscal year 2014, when compared to the \$160.0 million in fiscal year 2013. The largest revenue component is related to terminal rents which generated \$129.5 million during fiscal year 2014, an increase of \$11.6 million or 9.8% from fiscal year 2013. This increase is the result of increased international passengers, jetBlue's expansion into Terminal C, and the expansion and renovation to Terminal B. Nonterminal rents were \$26.9 million for fiscal year 2014, an increase of \$3.0 million or 12.5% from the prior year. This increase is the result of the new RCC being placed into service in the first quarter of fiscal year 2014. The increase in rental revenues generated at Logan Airport reflects the recovery of operating and capital costs on various terminal improvements made throughout Logan Airport and the new RCC service area and garage which began operating in September 2013. In addition, the Authority collects rental revenue on Port properties and other land that it owns. During fiscal year 2014, the Authority earned approximately \$19.6 million in rental revenue on Port properties, an increase of approximately \$3.1 million or 18.8% over fiscal year 2013. This increase is primarily attributed to the receipt of transaction rent revenue on property ground leased in South Boston. Other rental revenues from Maritime properties, Hanscom Field and Worcester Airport total \$9.1 million, an increase of \$0.8 million or 9.6% over the amount collected in fiscal year 2013.

The Authority's rental revenues for fiscal year 2013 totaled \$184.7 million, a \$4.1 million or 2.3% increase over fiscal year 2012. Rental revenues at Logan Airport were \$160.0 million, an increase of \$4.4 million or 2.8% in fiscal year 2013, when compared to the \$155.6 million in fiscal year 2012. The \$4.4 million increase in rental revenues generated at Logan Airport reflects the recovery of operating costs and capital on various terminal improvements made throughout Logan Airport's terminals and the new hanger agreement with jetBlue airlines. In addition, the Authority collects rental revenue on Port properties and other land that it owns. During fiscal year 2013, the Authority earned approximately \$16.5 million in rental revenue on Port properties, an increase of approximately \$0.4 million or 2.5% over fiscal year 2012. Other rental revenues from Maritime properties, Hanscom Field and Worcester Airport total \$8.3 million, a decrease of \$0.6 million or 6.7% from the amount collected in fiscal year 2012. This decrease is due mainly to a new lease agreement at the Autoport where the lessor assumed additional operating and capital cost commitments.

The Authority's rental revenues for fiscal year 2012 totaled \$180.6 million, a \$6.2 million or 3.6% increase over fiscal year 2011. During fiscal year 2012, Logan Airport rental revenues were \$155.6

million, an increase of \$5.7 million or 3.8% when compared to fiscal year 2011. The Port properties rental revenues of \$16.1 million were \$1.3 million or 8.8% higher when compared to fiscal year 2011. Other rental revenues from Maritime properties, Hanscom Field and Worcester Airport total \$8.9 million, a decrease of \$0.8 million or 8.7% from the amount collected in fiscal year 2011.

Concessions

During fiscal year 2014, the Authority earned \$77.9 million in concessions revenue compared to \$72.5 million in fiscal year 2013, an increase of \$5.4 million or 7.4%. Concessions revenue consists of fees earned from ground services for airport passengers such as car rentals, taxis, bus and limousine services, as well as retail operations within the Airport's terminals. During fiscal year 2014, the Authority earned approximately \$40.8 million in ground service fees, an increase of \$2.4 million or 6.3% primarily from an increase in rental car activity at Logan Airport. During fiscal year 2014, other concession revenues generated from food and beverage, news and gifts, foreign exchange, duty free shops, specialty shops and other concessions totaled \$37.1 million, an 8.8% increase over fiscal year 2013. The increase can be attributed to the 4.9% growth in Logan Airport passengers and the increase in product offerings at the expanded Terminal B.

During fiscal year 2013, the Authority earned \$72.5 million in concessions revenue compared to \$68.2 million in fiscal year 2012, an increase of \$4.3 million or 6.3%. Concessions revenue consists of fees earned from ground services for airport passengers such as car rentals, taxis, bus and limousine services, as well as retail operations within the Airport's terminals. During fiscal year 2013, the Authority earned approximately \$38.4 million in ground service fees compared to \$36.3 million in fiscal year 2012. This represented an increase of \$2.1 million or 5.8% in ground service fees, primarily from an increase in rental car activity at Logan Airport. During fiscal year 2013, other concession revenues generated from food and beverage, news and gifts, foreign exchange, duty free shops, specialty shops and other concessions totaled \$34.1 million or 6.9% more than the \$31.9 million generated in fiscal year 2012. Higher passenger volumes at Logan Airport increased terminal sales and a new contract from a duty free vendor generated more revenue for the Authority.

During fiscal year 2012, the Authority's concessions revenue totaled \$68.2 million, an increase of \$4.2 million or 6.6% when compared to fiscal year 2011. During fiscal year 2012, the Authority's ground service fees increased \$1.3 million or 3.7% over fiscal year 2011. In fiscal year 2012, other concession revenues also increased by \$2.9 million or 10.0% over fiscal year 2011. The concessions revenue increase during fiscal year 2012 was primarily the result of higher passenger volumes at Logan Airport which increased terminal sales, and a new foreign currency exchange service contract.

Operating Expenses (including depreciation and amortization)

Fiscal year 2014 total operating expenses were \$622.3 million and are comprised of \$296.3 million in operations and maintenance expenses, \$54.2 million in general and administrative expenses, \$54.0 million in other operating expenses, and \$217.8 million in depreciation and amortization expenses. This is a \$52.9 million increase or 9.3% over fiscal year 2013. Total operating expenses exclusive of depreciation and amortization were \$404.5 million, a 9.2% or \$34.1 million increase over the \$370.4 million in total operating expenses (excluding depreciation and amortization) incurred in fiscal year 2013.

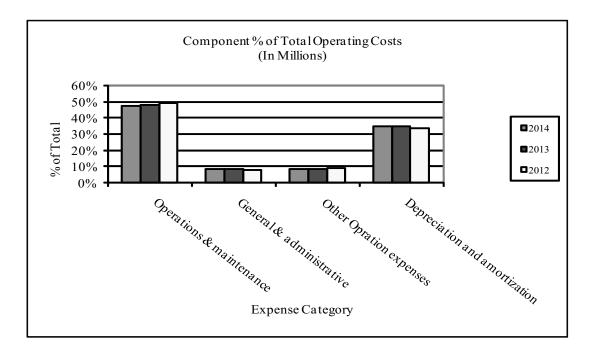
The Authority's Condensed Operating Expenses

		(in millions)			2014 vs. 2013			
	201	.4	2013		hange	% Change		
Operating expenses:								
Operations and maintenance	\$ 2	96.3 \$	272.6	\$	23.7	8.7%		
General and administrative		54.2	49.0		5.2	10.6%		
Other operating expenses		54.0	48.8		5.2	10.7%		
Depreciation and amortization	2	17.8	199.0		18.8	9.4%		
Total operating expenses	\$ 6	22.3	569.4	\$	52.9	9.3%		
		(in million	illions)		2013 v	vs. 2012		
	201	.3	2012	\$ C	hange	% Change		
Operating expenses:								
Operations and maintenance	\$ 2	72.6 \$	265.6	\$	7.0	2.6%		
General and administrative		49.0	44.0		5.0	11.4%		
Other operating expenses		48.8	50.3		(1.5)	-3.0%		
Depreciation and amortization	1	99.0	181.2		17.8	9.8%		
Total operating expenses	¢ 5	69.4 \$	541.1	\$	28.3	5.2%		

Fiscal year 2013 total operating expenses were \$569.4 million and are comprised of \$272.6 million in operations and maintenance expenses, \$49.0 million in general and administrative expenses, \$48.8 million in other operating expenses, and \$199.0 million in depreciation and amortization expenses. This is a \$28.3 million increase or 5.2% over fiscal year 2012. Total operating expenses exclusive of depreciation and amortization were \$370.4 million, a 2.9% or \$10.5 million increase over the \$359.9 million in total operating expenses (excluding depreciation and amortization) incurred in fiscal year 2012.

Fiscal year 2012 total operating expenses were \$541.1 million and are comprised of \$265.6 million in operations and maintenance expenses, \$44.0 million in general and administrative expenses, \$50.3 million in other operating expenses, and \$181.2 million in depreciation and amortization expenses. This is a \$16.9 million increase or 3.2% over fiscal year 2011. Total operating expenses exclusive of depreciation and amortization were \$359.9 million, a 1.4% or \$5.1 million increase over the \$354.8 million in total operating expenses (excluding depreciation and amortization) incurred in fiscal year 2011.

The following depicts the Authority's significant operating cost components by Condensed Operating Expenses:



Operations and Maintenance

During fiscal year 2014, the Authority incurred \$296.3 million in operations and maintenance costs, an increase of \$23.7 million or 8.7% from fiscal year 2013. Approximately \$10.0 million of the increase is associated with business expansion related to the opening of the Rental Car Center and new shuttle bus system at Logan Airport, the expansion and rehabilitation of terminal B, the 6% increase in container volume at Conley terminal, jetBlue's new service out of Worcester Regional Airport, and increased overtime to accommodate higher parking demand, snow removal operations, added public safety overtime attributed to the BosFuel jet fuel fire at Logan Airport. The Authority also recognized \$5.0 million in non-capitalized environmental cleanup expenses on the demolition of hanger building 16 and the Conley Freight Road contracts as required by GASB Statement No. 49. Employee collectively bargained wage adjustments and health care premium increases account for an additional \$5.0 million in added expense. Utility expenses increased \$2.7 million over last year due to increased usage and higher transmission costs. The balance of \$1.0 million is comprised of various miscellaneous departmental operational and maintenance expenses. Operations and maintenance expenses represent 47.6% of the Authority's total operating expenses. These expenses relate to the operations and maintenance of each of the Authority's facilities which includes Logan Airport, Hanscom Field, Worcester Airport, and the Port of Boston.

During fiscal year 2013, the Authority incurred \$272.6 million in operations and maintenance costs, which represents an increase of \$7.0 million or 2.6% from fiscal year 2012. Employee wages and fringe benefits costs increased \$4.3 million during fiscal year 2013. This increase is primarily attributable to the hiring of additional State Police and Fire Rescue personnel to fill vacancies, and annual collective bargaining wage increases for represented employees and merit increases for non-represented personnel. The Authority also made a onetime lease termination of tenancy payment in the amount of \$1.4 million. Increased container volumes added stevedoring expenses of \$0.4 million and snow removal costs were \$2.7 million higher than last year due to severe winter weather in the Northeast. Lastly, utility costs increased \$1.7 million from increased tenant usage and slightly higher per unit costs. The Authority

generated \$2.8 million in cost reductions by restructuring Logan's new low emission airport shuttle bus program, and other miscellaneous savings from lower structural and runway repairs. Operations and maintenance expenses represent 47.9% of the Authority's total operating expenses

During fiscal year 2012, the Authority incurred \$265.6 million in operations and maintenance costs, which represent an increase of \$3.2 million or 1.2% from fiscal year 2011. The increase is primarily the result of an increase in service costs for busing, maintenance, terminal cleaning, and repairs to runways and facilities due to an increase in use mainly attributable to the 3.1% increase in passenger activity at Logan Airport. Operations and maintenance expenses represent 49.1% of the Authority's total operating expenses.

General and Administrative

During fiscal year 2014, the Authority incurred \$54.2 million in general and administrative expenses, an increase of \$5.2 million or 10.6% compared to fiscal year 2013. The Authority invested \$1.2 million in strategic planning consulting work that will be used to help guide the Authority's future Aviation, Maritime, and Real Estate business needs, community outreach focus, and workforce preparedness in the coming decade and beyond. The Authority's investment in technology added \$1.2 million in one-time costs for badge credentialing, network connectivity, uninterrupted power source upgrade, as well as new software programming for life cycle management systems and new website development. Marketing expenses increased by \$0.5 million to support new international service at Logan Airport and the addition of jetBlue service out of Worcester Regional Airport. Employee wages and benefits for general and administrative employees increased \$2.3 million due to merit increases for non-represented personnel, and an increase in healthcare insurance premium rates. General and administrative expenses represent 8.7% of the Authority's operating expenses.

During fiscal year 2013, the Authority incurred \$49.0 million in general and administrative expenses, an increase of \$5.0 million or 11.4% compared to fiscal year 2012. Employee wages and benefits for general and administrative employees increased \$1.6 million due to merit increases for non-represented personnel, and an increase in healthcare insurance premium rates. Professional services increased \$1.7 million for engineering, financial, and strategic planning consultants. The Authority's International Incentive Program added \$0.5 million in new expenses to account for the addition of Japan Airlines to Logan Airport. Other miscellaneous services such as fire boat dock repairs and maintenance contracts increased \$1.2 million. General and administrative expenses represent 8.6% of the Authority's operating expenses.

During fiscal year 2012, the Authority incurred \$44.0 million in general and administrative expenses, a decrease of \$2.0 million or 4.3% compared to fiscal year 2011. The decrease in expenses is primarily attributable to lower employee wages, and benefits for general and administrative employees due to vacancies, and the reductions in payments to professional consultants. These expense reductions were offset by higher maintenance and support service agreements. General and administrative expenses as a percent of the Authority's total expense declined slightly to 8.1% of total expenses in fiscal year 2012, as compared to 8.8% in fiscal year 2011.

Other Operating Expenses

Other operating expenses consist of insurance, pension and other post employment benefit payments, payment in lieu of taxes (PILOT), and recoveries or provisions for uncollectible accounts. For fiscal year 2014 other operating expenses totaled \$54.0 million, a \$5.2 million or 10.7% increase over the \$48.8 million in total other operating expenses incurred by the Authority in fiscal year 2013. Insurance expense totaled \$9.0 million in fiscal year 2014 which was a \$1.0 million or 12.5% increase from the \$8.0 million

paid in insurance premiums in fiscal year 2013 as a result of higher property insurance premiums. Pension and OPEB payments were \$26.1 million, a \$3.1 million or a 13.3% increase over the \$23.1 million paid in fiscal year 2013 as a result of increases in the actuarial determined contributions of both Plans. The Authority's PILOT payments were \$18.4 million in fiscal year 2014. This is an increase of 2.0% or \$0.4 million over the amount paid in fiscal year 2013, and reflects the CPI adjustment incorporated in the agreements with the surrounding communities. The provision for uncollectible accounts was \$0.5 million; a \$0.8 million increase over the \$0.4 million recovery recognized in fiscal year 2013 and is consistent with prior year's activity.

For fiscal year 2013, other operating expenses totaled \$48.8 million, a \$1.5 million or 3.0% decrease from the \$50.3 million in total other operating expenses incurred by the Authority in fiscal year 2012. Insurance expense totaled \$8.0 million in fiscal year 2013 which was equal to the \$8.0 million paid in insurance premiums in fiscal year 2012. Pension and OPEB payments were \$23.1 million, a \$0.5 million or a 2.1% decrease over the \$23.6 million paid in fiscal year 2012. The Authority's PILOT payments were \$18.1 million in fiscal year 2013. This is an increase of 2.8% or \$0.5 million over the amounts paid in fiscal year 2012, and reflects the CPI adjustment incorporated in the agreements with the surrounding communities. The Authority also recognized a recovery of previously determined uncollectible accounts of \$0.4 million in fiscal year 2013. This recovery reflects management's expected receipt of payments from customer's accounts that had been previously been determined uncollectible in fiscal year 2012.

During fiscal year 2012, the Authority incurred \$50.3 million in other operating expenses. This was an increase of \$3.9 million or 8.4% over the \$46.4 million incurred in total other operating expenses in fiscal year 2011. Insurance premiums paid in fiscal year 2012 were \$8.0 million, an increase of \$0.7 million or 9.6% over the \$7.3 million in insurance premiums paid in fiscal year 2011. The increase reflects a higher cost of premiums for property insurance coverage. Pension and OPEB payments of \$23.6 million were \$2.2 million or 10.3% higher than the \$21.4 million paid in fiscal year 2011. The increase reflects the higher pension assessments resulting from the investment losses from the 2008 market decline. The Authority made PILOT payments totaling \$17.6 million in fiscal year 2012, a \$0.3 million or 1.7% increase over the \$17.3 million paid to surrounding communities in fiscal year 2011. This increase reflects the CPI contractual increase in the contract. The provision for uncollectible accounts was \$1.1 million, a \$0.7 million increase over the \$0.4 million recognized in fiscal year 2011. This increase is related to higher reserves required for pending bankruptcies.

Depreciation and Amortization

The Authority recognized \$217.8 million in depreciation and amortization expense in fiscal year 2014, an increase of \$18.8 million or 9.4% compared to fiscal year 2013. This increase is the result of \$536.1 million in new assets being placed into service during fiscal year 2014, which generated in excess of \$25.4 million in current year depreciation expense which was offset by approximately \$6.6 million of depreciation expenses related to assets that became fully depreciated at the beginning of fiscal year 2014. Major projects placed into service in fiscal year 2014 include the Rental Car Center which costs \$273.4 million to date, the renovation and improvement of Terminal B to serve United Airlines which costs \$125.6 million, the rehabilitation of the Taxiway North Alpha and Bravo at a cost of \$7.9 million, and \$5.6 million in Logan terminal Curb Enhancements to better serve High Occupancy Vehicles and the MBTA Silver Line service.

In comparison, during fiscal year 2013 and 2012, the Authority placed into service new assets totaling \$232.4 million and \$131.0 million, and recognized depreciation and amortization expenses of \$199.0 million and \$189.2 million, respectively. Additionally, during fiscal year 2013, the Authority changed the estimated useful life of runway repaving which added approximately \$14.3 million to the current year expense during that fiscal year.

Non-operating Revenues (Expenses) and Capital Grant Revenue

The Authority recognized a net \$35.5 million in non-operating revenues in fiscal year 2014, an increase of \$14.3 million or 67.5% over the \$21.2 million recognized in fiscal year 2013. Non-operating revenues in fiscal year 2013 were \$21.2 million, a decrease of \$10.0 million or 32.1% from the \$31.2 million recognized in fiscal year 2012. The following provides a brief explanation of the account changes by category for the last three fiscal years.

	(in millions)			s)	2014 vs. 2013			
	2	2014	2	2013	\$ Change		% Change	
Passenger facility charges	\$	62.7	\$	60.1	\$	2.6	4.3%	
Customer facility charges		30.0		29.4		0.6	2.0%	
Investment income		6.6		8.3		(1.7)	-20.5%	
Other income (expense), net		13.0		(3.4)		16.4	-482.4%	
Termial A debt service contributions		(11.8)		(12.1)		0.3	-2.5%	
Interest expense		(65.0)		(61.1)		(3.9)	6.4%	
Total nonoperating revenues (expenses)	\$	35.5	\$	21.2	\$	14.3	67.5%	
Capital grant revenue	\$	56.1	\$	20.2	\$	35.9	177.7%	
		(in mil	lion	s)		2013 v	s. 2012	
	2	(in mil		s) 2012	\$ C	2013 v Change	% Change	
Passenger facility charges	\$				\$ C			
Passenger facility charges Customer facility charges		2013	2	2012		hange	% Change	
•		60.1	2	59.2		Change 0.9	% Change 1.5%	
Customer facility charges		60.1 29.4	2	59.2 28.7		0.9 0.7	% Change 1.5% 2.4%	
Customer facility charges Investment income		60.1 29.4 8.3	2	59.2 28.7 10.2		0.9 0.7 (1.9)	% Change 1.5% 2.4% -18.6%	
Customer facility charges Investment income Other income (expense), net		60.1 29.4 8.3 (3.4)	2	59.2 28.7 10.2 1.5		0.9 0.7 (1.9) (4.9)	% Change 1.5% 2.4% -18.6% -326.7%	
Customer facility charges Investment income Other income (expense), net Termial A debt service contributions		60.1 29.4 8.3 (3.4) (12.1)	2	59.2 28.7 10.2 1.5 (9.1)		0.9 0.7 (1.9) (4.9) (3.0)	% Change 1.5% 2.4% -18.6% -326.7% 33.0%	
Customer facility charges Investment income Other income (expense), net Termial A debt service contributions Interest expense	\$	60.1 29.4 8.3 (3.4) (12.1) (61.1)	\$	59.2 28.7 10.2 1.5 (9.1) (59.3)	\$	0.9 0.7 (1.9) (4.9) (3.0) (1.8)	% Change 1.5% 2.4% -18.6% -326.7% 33.0% 3.0%	

For fiscal year 2014, non-operating revenues (expenses) is comprised of PFC and CFC revenue which represented \$92.6 million, a \$3.1 million or 3.5% increase from fiscal year 2013 revenues of \$89.5 million. Investment income of \$6.6 million declined by \$1.7 million from fiscal year 2013 due to low interest rates and a reduction in the Authority's cash and investment balances that were used for increased capital investment during the year. Other income (expense), net consists of settlement of claims, gains or losses on short term investments, and any gains or losses on the sale of equipment. During fiscal year 2014, the Authority recognized \$13.0 million in other income, net, an increase of \$16.4 million from the \$3.4 million in other expense, net generated in fiscal year 2013. The Authority finalized an arbitrage agreement with the Internal Revenue Service on income the Authority received on certain terminated guaranteed investment contracts previously held by the Authority. The settlement substantially lowered the amount owed to the IRS and resulted in a \$10.4 million gain from the reversal of an accrued liability previously recorded by the Authority. Additionally, the Authority recorded an unrealized holding gain of \$1.5 million at June 30, 2014 related to the fair value of its investments compared to a \$2.8 million holding loss at June 30, 2013. Also, during fiscal year 2014, the Authority continued to make a voluntary contribution of \$11.8 million in PFCs to the Terminal A debt service fund. Interest expense on long term debt was \$65.0 million, an increase of \$3.9 million or 6.4% from fiscal year 2013. The increase in interest expense is attributed to the issuance of \$116.8 million new revenue bonds in July 2012.

For fiscal year 2013, non-operating revenues (expenses) is comprised of PFC and CFC revenue which represented \$89.5 million, a \$1.6 million or 1.8% increase from fiscal year 2012 revenues of \$87.9 million. Investment income of \$8.3 million was down \$1.9 million from fiscal year 2012 as interest rates remained low and the Authority's investment balances were lower than the prior year. Other income/expense, net consists of settlement of claims, gains or losses on short term investments, and any gains or losses on the sale of equipment. During fiscal year 2013, the Authority incurred \$3.4 million in other expense, a decrease of \$4.9 million from the \$1.5 million in other income generated in fiscal year 2012. The increase in other non-operating expense is primarily the results of realizing a \$3.1 million loss in the fair value of investments held by the Authority and a \$0.8 million RCC mitigation payment. Also, during fiscal year 2013, the Authority made a voluntary contribution of \$12.1 million in PFCs to the Terminal A debt service fund. This \$12.1 million voluntary contribution was \$3.0 million higher than the amount contributed in fiscal year 2012 which reflects a full year of principal payments on Terminal A debt service. Interest expense on long term debt was \$61.1 million, an increase of \$1.8 million or 3.0% from fiscal year 2012. The increase is attributed to the issuance of new bonds in July 2012.

For fiscal year 2012, non-operating revenues (expenses) is comprised of PFC and CFC revenue which represented \$87.9 million, a \$3.2 million or 3.8% increase from fiscal year 2011 revenues of \$84.7 million. Investment income of \$10.2 million was down \$1.5 million from fiscal year 2011 as interest rates remained low. Other non-operating income (expense), net consists of settlement of claims, gains or losses on the fair value of investments, and any gains or losses on the sale of equipment. During fiscal year 2012, the Authority realized other non-operating income, net of \$1.5 million, an increase of \$3.2 million primarily from the gain on the fair value of investments held by the Authority. Also, during fiscal year 2012, the Authority made a voluntary contribution of \$9.1 million in PFCs to the Terminal A debt service fund. This \$9.1 million voluntary contribution was \$3.0 million higher than the amount contributed in fiscal year 2011. Interest expense on long term debt was \$59.3 million, a decrease of \$1.4 million or 2.3% from fiscal year 2011. The decline in interest expense for this period is attributable to declining interest rates on the \$126.5 million in variable rate bonds outstanding and a reduction in the principal amount of debt outstanding.

Capital Grant Revenue

The majority of the Authority's capital grants are awarded by the FAA for the Airport Improvement Program to construct runways, taxiways, apron lighting, residential sound proofing projects, and other capital related projects, primarily at Logan Airport. The Authority also receives grant funds from the Department of Homeland Security, the Federal Emergency Management Administration, the Environmental Protection Agency and the Massachusetts Executive Office of Public Safety and Security related to the Port Security Grant Program which safeguards the Port of Boston.

Capital grant revenue recognized in fiscal year 2014 was \$56.1 million, an increase of \$35.9 million from the amount received in fiscal year 2013. The increase in capital grant revenue was the result of \$37.1 million in Transportation Security Administration ("TSA") reimbursements for the construction of the new checked baggage inspection system at Logan Airport. The remainders of projects eligible to be reimbursed by capital grant revenues are ongoing and are expected to be reimbursed in future years.

Capital grant revenue received in fiscal year 2013 was \$20.2 million, a decrease of \$20.6 million or 50.5% from the amount received in fiscal year 2012. The reduction in capital grant revenue was a result of construction costs for the Runway Safety End on Runway 33L that was completed in fiscal year 2012 and the corresponding grant revenue being received in fiscal year 2012. The remainder of projects eligible to be reimbursed by capital grant revenues is ongoing and is expected to be reimbursed in future years.

Capital grant revenue received in fiscal year 2012 totaled \$40.8 million, an increase of \$18.3 million or 81.3% from the \$22.5 million received in fiscal year 2011. The majority of the Authority's capital grants were awarded by the FAA for the Airport Improvement Program to construct runways, taxiways, apron lighting, residential sound proofing projects and other capital related projects primarily at Logan Airport.

The Authority's Statements of Net Position

The Statements of Net Position present the financial position of the Authority at the end of the fiscal years. The Statements include all assets and liabilities of the Authority. Net Position is the difference between total assets and total liabilities and is an indicator of the current fiscal health of the Authority. A summarized comparison of the Authority's assets, liabilities and net position at June 30, 2014, 2013 and 2012 is as follows:

The Authority's Condensed Statements of Net Position

	(in mi	llions)	2014 vs. 2013		
	2014	2013	\$ Change	% Change	
Assets					
Current assets	\$ 522.9	\$ 503.6	\$ 19.3	3.8%	
Capital assets, net	2,900.6	2,769.6	131.0	4.7%	
Other non-current assets	418.1	499.5	(81.4)	-16.3%	
Total Assets	3,841.6	3,772.7	68.9	1.8%	
Deferred outflows of resources					
Deferred loss on refunding of bonds	20.0	21.8	(1.8)	-8.3%	
Total deferred outflows of resources	20.0	21.8	(1.8)	-8.3%	
Liabilities					
Current liabilities	\$ 307.2	\$ 255.0	\$ 52.2	20.5%	
Bonds and notes payable, including current portion	1,586.5	1,656.6	(70.1)	-4.2%	
Other non-current liabilities	47.6	54.4	(6.8)	-12.5%	
Total Liabilities	\$ 1,941.3	\$ 1,966.0	\$ (24.7)	-1.3%	
Total Net Position	\$ 1,920.3	\$ 1,828.5	\$ 91.8	5.0%	

The Authority ended fiscal year 2014 with total assets and deferred outflows of resources of \$3.86 billion, total liabilities of \$1.94 billion and total net position of \$1.92 billion. This is an increase of 5.0% or \$91.8 million and is comprised of net operating income of \$0.2 million, net non-operating income of \$35.5 million and capital grant revenue of \$56.1 million. The Authority's assets consist primarily of capital assets, which represent approximately \$2.90 billion or 75.1% of the Authority's total assets and deferred outflows of resources as of June 30, 2014.

(in mi	llions)	2013 v	s. 2012	
2013	2012	\$ Change	% Change	
\$ 503.6	\$ 603.2	\$ (99.6)	-16.5%	
2,769.6	2,653.3	116.3	4.4%	
499.5	439.2	60.3	13.7%	
3,772.7	3,695.7	77.0	2.1%	
21.8	22.1	(0.3)	-1.4%	
21.8	22.1	(0.3)	-1.4%	
-				
\$ 255.0	\$ 257.8	\$ (2.8)	-1.1%	
1,656.6	1,612.8	43.8	2.7%	
54.4	62.5	(8.1)	-13.0%	
\$ 1,966.0	\$ 1,933.1	\$ 32.9	1.7%	
\$ 1,828.5	\$ 1,784.7	\$ 43.8	2.5%	
	2013 \$ 503.6 2,769.6 499.5 3,772.7 21.8 21.8 \$ 255.0 1,656.6 54.4 \$ 1,966.0	\$ 503.6 \$ 603.2 2,769.6 2,653.3 499.5 439.2 3,772.7 3,695.7 21.8 22.1 21.8 22.1 \$ 255.0 \$ 257.8 1,656.6 1,612.8 54.4 62.5 \$ 1,966.0 \$ 1,933.1	2013 2012 \$ Change \$ 503.6 \$ 603.2 \$ (99.6) 2,769.6 2,653.3 116.3 499.5 439.2 60.3 3,772.7 3,695.7 77.0 21.8 22.1 (0.3) 21.8 22.1 (0.3) \$ 255.0 \$ 257.8 \$ (2.8) 1,656.6 1,612.8 43.8 54.4 62.5 (8.1) \$ 1,966.0 \$ 1,933.1 \$ 32.9	

The Authority ended fiscal year 2013 with total assets and deferred outflows of resources of \$3.79 billion, total liabilities of \$1.97 billion and total net position of \$1.83 billion. This is an increase of 2.5% or \$43.8 million and is comprised of net operating income of \$2.4 million, net non-operating income of \$21.2 million and capital grant revenue of \$20.2 million. The Authority's assets consist primarily of capital

assets, which represent approximately \$2.77 billion or 73.0% of the Authority's total assets and deferred outflows of resources as of June 30, 2013.

The Authority ended fiscal year 2012 with total assets and deferred outflows of resources of \$3.72 billion, total liabilities of \$1.93 billion, and total net position of \$1.78 billion. This is an increase of 5.3% or \$89.3 million and is comprised of net operating income of \$17.3 million, net non-operating income of \$31.2 million and capital grant revenue of \$40.8 million. The Authority's assets consist primarily of capital assets, which represent approximately \$2.65 billion or 71.4% of the Authority's total assets and deferred outflows of resources as of June 30, 2012.

The Authority's liabilities consists primarily of bonds payable (including current portion), which account for 81.7%, 84.3% and 83.4% of total liabilities at June 30, 2014, 2013 and 2012, respectively. Notes payable and accrued interest payable are included in current liabilities and represented approximately 9.5%, 6.9% and 7.0% of total liabilities at June 30, 2014, 2013 and 2012, respectively.

Capital Assets and Debt Administration

Capital Assets

As of June 30, 2014 and 2013, the Authority had approximately \$2.90 billion and \$2.77 billion of capital assets (net of depreciation), respectively. These include land, construction in process, buildings, runways, roadways, machinery and equipment, air rights and parking rights. The Authority's net capital assets increased approximately \$131.0 million, or 4.7% in fiscal year 2014.

The Authority placed into service over \$536.1 million in completed capital projects during fiscal year 2014. Major construction projects completed at Logan Airport included the Rental Car Center which opened in September 2013, the renovation and improvement of Terminal B to serve United Airlines, the acquisition of the Braintree Logan Express facility, the rehabilitation of the Taxiway North Alpha and Bravo, and Curb Enhancement upgrades to better serve High Occupancy Vehicle and the Silver Line. These projects were placed into service and contributed to the increase in the Authority's capital assets. Projects under construction during fiscal year were the optimization of the Checked Baggage Inspection System, Conley Haul Road to reduce truck traffic on neighborhood streets, construction of the Logan Express Framingham Garage and electrical substation upgrades.

Capital assets comprised approximately 75.1% of the Authority's total assets and deferred outflows of resources at June 30, 2014 and 73.0% and 71.4% of the Authority's total assets and deferred outflows of resources at June 30, 2013 and 2012, respectively. During fiscal years 2014, 2013 and, 2012, the Authority spent approximately \$329.3 million, \$308.7 million, and \$225.7 million, respectively, constructing new assets and improving existing assets already in service, inclusive of construction in process.

Major construction projects completed during fiscal year 2013 at Logan Airport included Runway 33L, safety end improvements that installed a larger safety area and utilizes a larger Emergency Material Arrest Systems ("EMAS"), the rehabilitation of Runway 15R/33L, and the Chelsea Airport By-pass Road, a dedicated truck and bus traffic route to and from the Airport to Chelsea. These projects were placed into service and contributed to the increase in the Authority's capital assets. Projects under construction during fiscal year 2013 were the RCC, the renovation and improvement of Terminal B to serve United Airlines and the optimization of the Checked Baggage Inspection System.

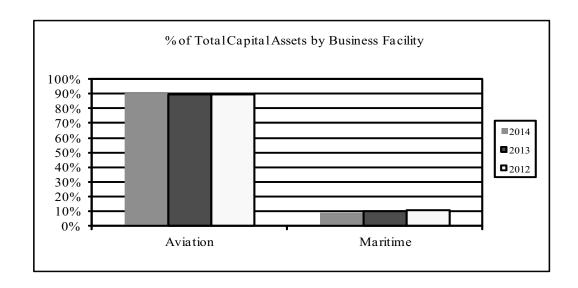
Major construction projects completed or in process during fiscal year 2012 at Logan Airport included the Rental Car Center, the Green Bus Depot which will be the onsite maintenance facility for all Authority

owned buses, runway safety end improvements that will reinstall the use of EMAS for Runway 33L, the Terminal C Central Checkpoint reconfiguration and rehabilitation, the Terminal B garage renovation project and roadway improvement program, and the Chelsea Airport By-pass Road. During fiscal year 2012, construction began on Rehabilitation of Run/Way 15R/33L.

The Authority's capital assets are principally funded by the proceeds of revenue bonds, Authority generated revenues, PFCs, CFCs, and from federal and state grant revenues.

Following is a breakdown of capital assets at June 30:

	2014	 2013	 2012	Percentage Change 2014-2013	Percentage Change 2013-2012
Land	\$ 202,699	\$ 174,754	\$ 173,036	15.99%	0.99%
Construction in progress	155,071	341,977	257,828	-54.65%	32.64%
Buildings	1,517,800	1,240,570	1,271,832	22.35%	-2.46%
Runway and other paving	393,339	426,889	375,997	-7.86%	13.54%
Roadway	386,666	362,085	362,968	6.79%	-0.24%
Machinery and equipment	143,249	113,078	94,745	26.68%	19.35%
Air rights	75,605	82,555	87,578	-8.42%	-5.74%
Parking rights	26,215	27,757	29,299	-5.56%	-5.26%
Capital assets, net	\$ 2,900,644	\$ 2,769,665	\$ 2,653,283	4.73%	4.39%



Debt Administration

The Authority's bond sales must be approved by its Members and must comply with the rules and regulations of the United States Treasury Department. The Authority, through its 1978 Trust Agreement, has covenanted to maintain a debt service coverage ratio of not less than 1.25. Debt service coverage is calculated based on a formula set forth in the 1978 Trust Agreement. Historically, the Authority has maintained a debt service coverage ratio higher than its Trust Agreement requirement to maintain its investment grade bond ratings. As of June 30, 2014, 2013, and 2012, the Authority's debt service coverage under the 1978 Trust Agreement was 2.65, 2.47, and 2.21, respectively.

The 1999 PFC Trust Agreement requires a First Lien Sufficiency covenant ratio in excess of 1.05. As of June 30, 2014, 2013, and 2012, the Authority's PFC First Lien Sufficiency covenant under the PFC Trust Agreement was 4.75, 4.37, and 3.73, respectively.

The CFC Trust Agreement requires that the Authority maintain debt service coverage of at least 1.3. As of June 30, 2014, 2013 and 2012, the CFC debt service coverage was 2.69, 2.87, and 2.78, respectively.

The Authority had net bonds payable outstanding as of June 30, 2014 in the amount of approximately \$1.51 billion, a net decrease of approximately \$64.4 million compared to fiscal year 2013. The decrease was the result of principal paid during fiscal year 2014.

The Authority had net bonds payable outstanding as of June 30, 2013 in the amount of approximately \$1.58 billion, a net increase of approximately \$19.8 million compared to fiscal year 2012. During fiscal year 2013, the Authority issued \$275.6 million of the Massachusetts Port Authority Revenue Bonds in two series. The Series 2012 A Revenue Bonds, in the principal amount of \$116.8 million were issued to finance capital improvements to Terminals B and C, hangar upgrades, and replace substations from Terminals B and E. Due to the "private activity" nature of the construction projects, they were sold as AMT bonds. The Series 2012 B Bonds were refunding bonds issued in the amount of \$158.8 million and were used to refund a portion of the 2003 A and 2003 C Bonds. Additionally, during fiscal year 2013, the Authority made principal payments of \$75.7 million.

The Authority had net bonds payable outstanding as of June 30, 2012 in the amount of approximately \$1.56 billion, a net decrease of approximately \$69.8 million compared to fiscal year 2011. The decrease was the result of principal paid during fiscal year 2012.

On July 17, 2014, the Authority issued \$249.8 million of Massachusetts Port Authority Revenue Bonds in three series. The Series 2014 A Revenue Bonds were issued in the principal amount of \$45.5 million with an original issue premium of approximately \$5.6 million and coupon rates ranging from 2.0% to 5.0%. The projects financed with Series A bond proceeds include a structured garage at the Framingham Logan Express site and roadways that provide access from the terminals to the Airport MBTA Station and the Rental Car Facility. The Series 2014 B Revenue Bonds were issued in the principal amount of \$48.2 million with an original issue premium of approximately \$4.8 million and coupon rates ranging from 4.0% to 5.0%. The projects financed with Series B bond proceeds include electrical substation replacement for Terminals B and E, a post-security corridor between Terminals C and E, and the demolition of an obsolete hangar to create remain overnight aircraft parking spaces. The Authority also issued Revenue Refunding Bonds, Series 2014 C, in the principal amount of \$156.1 million with an original issue premium of approximately \$32.2 million and coupons ranging from 2.0% to 5.0%. The aggregate difference in debt services between the refunded 2003 A, 2003 C and the 2005 A bonds and the refunding bonds was \$23.6 million. This refunding had an economic gain and achieved a net present value savings of \$17.1 million or 10.04%. The average annual savings for fiscal year 2015 through fiscal year 2035 was approximately \$1.126 million.

The Official Statements relating to the Authority's Bond issuances are available from the Authority or by accessing the Authority's website.

Net Position

The Authority's net position, which represents the residual interest in the Authority's assets after liabilities are deducted, is \$1.92 billion as of June 30, 2014, an increase of \$91.8 million, or 5.0% from fiscal year 2013. Of this amount, \$1.23 billion is invested in capital assets net of debt, an increase of \$95.8 million compared to fiscal year 2013 amount of \$1.13 billion. The Authority's restricted net position of \$509.5 million as of June 30, 2014 is subject to the pledge of the 1978 Trust Agreement, the PFC Trust Agreement, the CFC Trust Agreement or custodial agreements in the Authority's name. The Authority's restricted net position decreased \$5.9 million as of June 30, 2014. The decrease is primarily attributable to the use of PFCs to reimburse the Authority for projects previously funded by the Authority, CFC cash balances used to complete the construction of the Authority's new Rental Car Center that opened in the fall of 2013, offset by a settlement with the Internal Revenue Service related to arbitrage that generated \$10.4 million in non-operating revenue. The Authority's unrestricted net position for fiscal year ending June 30, 2014 was \$183.5 million, an increase of \$2.0 million when compared to the \$181.5 million of unrestricted net position reported in fiscal year ending June 30, 2013.

Net position at June 30, 2013 was \$1.83 billion, an increase of \$43.8 million as compared to the \$1.78 billion reported in fiscal year 2012. The net position invested in capital assets, net of related debt was \$1.13 billion for the fiscal year ending June 30, 2013, an increase of \$72.5 million compared to the fiscal year 2012 amount of \$1.06 million. The Authority's restricted net position totaled \$515.5 million as of June 30, 2013 and was subject to the pledge of the 1978 Trust Agreement, the PFC Trust Agreement, the CFC Trust Agreement or custodial agreements in the Authority's name. Restricted net position as of June 30, 2013 decreased by \$67.8 million compared to the \$583.2 million reported in fiscal year 2012. The decrease is primarily attributable to use of CFC cash balances for the construction of the Authority's new Rental Car Facility to be opened in the fall of 2013. The Authority's unrestricted net position of \$181.5 million in fiscal year 2013 increased by \$39.1 million or 27.5% when compared to the \$142.4 million of unrestricted net position reported in fiscal year ending June 30, 2012. This increase is attributable to net operating revenues exceeding expenses for the year, lower debt service costs and the use of bond proceeds to fund certain capital projects resulting in an increase in a higher cash balance retained in the Authority's unrestricted fund account.

The Authority's Condensed Cash Flows

The following summary shows the major sources and uses of cash during the following fiscal years:

	(in millions)				2013 vs. 2012			
	2014		2013		\$ Change		% Change	
Net cash provided by operating activities	\$	205.1	\$	189.4	\$	15.7	8.3%	
Net cash used in capital and related financing activities		(301.0)		(238.0)		(63.0)	26.5%	
Net cash (used in) provided by investing activities		74.3		101.4		(27.1)	-26.7%	
Net (decrease) increase in cash and cash equivalents		(21.6)		52.8		(74.4)	-140.9%	
Cash and cash equivalents, beginning of year		243.3		190.5		52.8	27.7%	
Cash and cash equivalents, end of year	\$	221.7	\$	243.3	\$	(21.6)	-8.9%	

	(in millions)				2013 vs. 2012			
	2013		2013 2		\$ Change		% Change	
Net cash provided by operating activities	\$	189.4	\$	210.7	\$	(21.3)	-10.1%	
Net cash (used in) provided by capital								
and related financing activities		(238.0)		(235.5)		(2.5)	1.1%	
Net cash used in investing activities		101.4		(15.6)		117.0	-750.0%	
Net (decrease) increase in cash and cash equivalents		52.8		(40.4)		93.2	-230.7%	
Cash and cash equivalents, beginning of year		190.5		230.9		(40.4)	-17.5%	
Cash and cash equivalents, end of year	\$	243.3	\$	190.5	\$	52.8	27.7%	

The Authority's cash and cash equivalents at June 30, 2014 was \$221.7 million. This is a decrease of \$21.6 million, or 8.9% from the \$243.3 million in cash and cash equivalents reported in fiscal year 2013. The Authority generated \$205.1 million in cash from operations during fiscal year 2014. This was \$15.7 million or 8.3% higher than the previous fiscal year's cash provided by operating activities totaling \$189.4 million. The Authority used \$301.0 million in cash for capital and related financing activities to finance the Authority's capital program and to pay debt service expenses during the year. This is a \$63.0 million increase in the use of cash over the \$238.0 million in cash used for capital and related financing activities in fiscal year 2013. The Authority utilized \$74.3 million in cash from investments towards its capital and operating needs, an increase of \$27.1 million over the amount of cash used for investing activities in fiscal year 2013.

The Authority's cash and cash equivalents at June 30, 2013 was \$243.3 million. This was an increase of \$52.8 million, or 27.7% from the \$190.5 million in cash and cash equivalents reported in fiscal year 2012. The Authority generated \$189.4 million in cash from operations during fiscal year 2013. This was \$21.3 million or 10.1% lower than the previous fiscal year's cash provided by operating activities totaling \$210.7 million. This decrease in cash from operating activities was the result of an increase in payments to vendors, the Authority contributing an additional \$7.0 million to the OPEB Trust in fiscal year 2013, and payments made to employees. The Authority used \$238.0 million in cash for capital and related financing activities to finance the Authority's capital program and to pay debt service expenses during the year. This is a \$2.5 million increase in the use of cash over the \$235.5 million in cash generated for capital and related financing activities in fiscal year 2012. The Authority provided \$101.4 million in cash

from investing purposes to be used for future capital and operating needs, a decrease of \$117.0 million over the amount of cash provided for investing activities in fiscal year 2012.

Contacting the Authority's Financial Management

For additional information concerning the Authority, please see the Authority's website, www.massport.com. Financial information can be found in the Investor Relations section of the website by clicking on "About Massport", and then clicking on "Investor Relations". The Authority's executive offices are located at One Harborside Drive, Suite 200S, East Boston, Massachusetts 02128, and the main telephone number is (617) 568-5000. Questions may be directed to John P. Pranckevicius, CPA, Director of Administration and Finance and Secretary-Treasurer for the Massachusetts Port Authority.

Statements of Net Position

June 30, 2014 and 2013

(In thousands)

(2014		2013
Assets and Deferred Outflows			_	
Current assets:				
Cash and cash equivalents	\$	41,696	\$	45,651
Investments		35,020		27,976
Restricted cash and cash equivalents		180,043		197,649
Restricted investments		169,594		160,783
Accounts receivable		ŕ		•
Trade, net		59,836		54,320
Grants receivable		29,573		7,114
Total receivables (net)		89,409		61,434
Prepaid expenses and other assets		7,150		10,078
Total current assets		522,912		503,571
Noncurrent assets:				
Investments		66,587		91,827
Restricted investments		286,489		342,856
Prepaid expenses and other assets		7,318		9,464
Investment in joint venture		2,263		2,137
Net OPEB asset		55,418		53,188
Capital assets, net		2,900,644		2,769,665
Total noncurrent assets		3,318,719	_	3,269,137
Total assets		3,841,631	_	3,772,708
Deferred outflows of resources Deferred loss on refunding of bonds		20,017		21,847
Total deferred outflows of resources		20,017	_	21,847
Liabilities		20,017	_	21,047
Current liabilities:				
Accounts payable and accrued expenses		102,714		102,743
Compensated absences		1,483		1,550
Contract retainage		12,561		8,092
Current portion of long term debt		84,665		81,770
Commercial notes payable		150,000		100,000
Accrued interest on bonds payable		35,304		36,587
Unearned revenues		5,219		6,054
Total current liabilities		391,946	_	336,796
Noncurrent liabilities:		2,21,5.0		220,750
Accrued expenses		19,604		18,143
Compensated absences		18,974		19,873
Contract retainage		_		5,485
Long-term debt, net		1,501,803		1,574,869
Unearned revenues		8,982		10,828
Total noncurrent liabilities		1,549,363	_	1,629,198
Total liabilities		1,941,309		1,965,994
Net Position	-		_	
Invested in capital assets		1,227,358		1,131,577
Restricted				
Bond funds		201,754		185,018
Project funds		214,772		208,948
Passenger facility charges		65,951		72,501
Customer facility charges		1,571		23,849
Other purposes		25,472		25,142
Total restricted		509,520	_	515,458
Unrestricted		183,461		181,526
Total net position	\$	1,920,339	\$	1,828,561

The accompanying notes are an integral part of these financial statements.

Statements of Revenues, Expenses, and Changes in Net Position

Years ended June 30, 2014 and 2013

(In thousands)

		2014	 2013
Operating revenues:			
Fees, tolls and other services	\$	308,468	\$ 289,384
Rentals		204,380	184,744
Concessions		77,873	72,542
Other		27,874	22,515
Operating grants		3,876	 2,638
Total operating revenues	_	622,471	571,823
Operating expenses:			
Operations and maintenance		296,344	272,611
Administration		54,151	48,950
Insurance		9,001	8,020
Pension		11,990	9,614
Other post-employment benefits		14,140	13,450
Payments in lieu of taxes		18,444	18,090
Provision for uncollectible accounts		453	(353)
Depreciation and amortization		217,767	 199,046
Total operating expenses		622,290	569,428
Operating income	_	181	 2,395
Nonoperating revenues and (expenses):	_		
Passenger facility charges		62,682	60,105
Customer facility charges		29,963	29,354
Investment income		6,642	8,336
Net increase (decrease) in the fair value of investments		1,976	(2,821)
Other revenues		10,547	187
Settlement of claims		1,792	567
Terminal A debt service contribution		(11,839)	(12,114)
Other expenses		(1,407)	(1,279)
Gain (loss) on sale of equipment		90	(64)
Interest expense		(64,973)	 (61,071)
Total nonoperating revenues (expenses), net	_	35,473	21,200
Increase in net position before capital grant revenue		35,654	23,595
Capital grant revenue		56,124	 20,234
Increase in net position		91,778	43,829
Net position, beginning of year		1,828,561	1,784,732
	_		
Net position, end of year	\$ =	1,920,339	\$ 1,828,561

The accompanying notes are an integral part of these financial statements.

Statements of Cash Flows Years ended June 30, 2014 and 2013 (In thousands)

(III diodedida)		2014		2013
Cash flows from operating activities:	_		-	
Cash received from customers and operating grants	\$	605,183	\$	571,716
Payments to vendors		(234,742)		(218,147)
Payments to employees		(132,927)		(125,256)
Payments in lieu of taxes		(18,444)		(18,090)
Other post-employment benefits	_	(14,000)		(20,851)
Net cash provided by operating activities	_	205,070	_	189,372
Cash flows from capital and related financing activities:				
Acquisition and construction of capital assets		(329,305)		(308,693)
Proceeds from the issuance of bonds, net		_		313,408
Principal payments on refunded debt		_		(180,100)
Interest paid on bonds and notes		(73,647)		(84,102)
Principal payments on long-term debt		(64,435)		(75,745)
Proceeds from commercial paper financing		76,000		15,000
Principal payments on commercial paper		(26,000)		(15,000)
Terminal A debt service contribution		(11,839)		(12,114)
Proceeds from passenger facility charges		62,464		60,270
Proceeds from customer facility charges		29,156		27,650
Proceeds from capital grants		34,699		20,768
Settlement of claims		1,792		567
Proceeds from sale of equipment	_	90		93
Net cash (used in) capital and related financing activities	_	(301,025)		(237,998)
Cash flows from investing activities:				
Purchases of investments, net		(488,950)		(689,234)
Sales of investments, net		555,930		781,139
Realized gain on sale of investments		428		_
Interest received on investments	_	6,987		9,471
Net cash provided by investing activities	_	74,395		101,376
Net (decrease) increase in cash and cash equivalents		(21,560)		52,750
Cash and cash equivalents, beginning of year	_	243,300		190,550
Cash and cash equivalents, end of year	\$ _	221,740	\$	243,300
Reconciliation of operating income to net cash provided by operating activities:				
Cash flows from operating activities:				
Operating income	\$	181	\$	2,395
Adjustments to reconcile operating income to net cash provided by				
operating activities:				
Depreciation and amortization		217,767		199,045
Provision (recovery) for uncollectible accounts		453		(353)
Changes in operating assets and liabilities:				
Trade receivables		(6,297)		(2,539)
Prepaid expenses and other assets		2,398		1,019
Prepaid expenses and other assets – long-term		(1,339)		(10,546)
Accounts payable and accrued expenses		(4,445)		3,256
Compensated absences		(965)		(778)
Deferred revenue	_	(2,683)		(2,127)
Net cash provided by operating activities	\$ _	205,070	\$	189,372
Noncash investing activities:				
Net increase in the fair value of investments	\$ _	720	\$	(828)
	· <u></u>		_	

The accompanying notes are an integral part of these financial statements.

Notes to Financial Statements June 30, 2014 and 2013

1. Summary of Significant Accounting Policies and Practices

Reporting Entity

The Massachusetts Port Authority (the "Authority") is a body politic and corporate and a public instrumentality of The Commonwealth of Massachusetts (the "Commonwealth") created and existing pursuant to Chapter 465 of the Acts of 1956, as amended, (the "Enabling Act"). The Authority controls, operates and manages Boston-Logan International Airport ("Logan Airport"), Laurence G. Hanscom Field, Worcester Regional Airport, the Port of Boston and other facilities in the Port of Boston.

The Authority has no stockholders or equity holders, and the Authority's financial statements are not a component unit of the Commonwealth's financial statements. The provisions of the Enabling Act and the Trust Agreement, dated as of August 1, 1978 as amended and supplemented (the "1978 Trust Agreement"), between the Authority and U.S. Bank National Association (as successor in interest to State Street Bank and Trust Company), as trustee (the "Trustee"), the Passenger Facility Charges ("PFC") Revenue Bond Trust Agreement dated May 6, 1999, as amended and supplemented (the "PFC Trust Agreement"), between the Authority and The Bank of New York Mellon, as trustee (the "PFC Trustee") and the Customer Facility Charges ("CFC") Revenue Bond Trust Agreement dated May 18, 2011, as amended and supplemented (the "CFC Trust Agreement"), between the Authority and U.S. Bank National Association as trustee (the "CFC Trustee"), govern all funds, with limited exceptions, received by the Authority pursuant to the Enabling Act.

In April 1981, the Authority adopted a retiree benefit plan whereby the Authority assumed the full cost of group health insurance including basic life insurance, dental insurance and catastrophic illness coverage to those retirees and surviving spouses (and qualifying dependents) who have retired under the Authority's retirement system (collectively referred to as the "OPEB Plan"). In June 2009, the Board made changes to the plan benefits to be paid by the Authority for certain existing and future retirees. For additional details see Note 7.

In June 2008, the Authority created the Retiree Benefits Trust (the "RBT" or the "Trust") to fund its OPEB Plan obligations. It was established as an irrevocable governmental trust under Section 115 of the Internal Revenue Code. The Trust is legally separate from the Authority and is reported as a Fiduciary Trust Fund of the Authority under accounting principles promulgated by the Governmental Accounting Standards Board ("GASB"). In no event shall any part of the principal or income of the RBT be paid or revert back to the Authority or be used for any purpose whatsoever other than for the exclusive benefit of retirees and their beneficiaries.

Basis of Accounting

The Authority's activities are accounted in a manner similar to that often utilized in the private sector. The Authority's financial statements are prepared using the accrual basis of accounting and the economic resources measurement focus in accordance with U.S. generally accepted accounting principles ("GAAP").

Revenues from airlines, rentals, parking fees, tolls and concessions are reported as operating revenues. Capital grants, financing or investing related transactions are reported as non-operating revenues and expenses. All expenses related to operating the Authority's facilities are reported as operating expenses.

Notes to Financial Statements June 30, 2014 and 2013

Accounting per Applicable Trust Agreements

Under the 1978 Trust Agreement, cash of the Authority is deposited daily into the Revenue Fund established pursuant to the 1978 Trust Agreement and is transferred to the cash concentration account. All such revenues are then transferred to the various funds established pursuant to the 1978 Trust Agreement. After providing for operating expenses, including pension expense and transfers to the self insurance account, cash revenues are then transferred to the Interest and Sinking Fund, which are applied to debt service on any outstanding revenue bonds, the Maintenance Reserve Fund, the Payment In Lieu of Taxes Fund, the Capital Budget Fund, if applicable, and finally, the Improvement and Extension Fund.

PFC revenue is deposited in the PFC Pledged Revenue Fund established pursuant to the PFC Revenue Bond Trust Agreement and is utilized to pay debt service on PFC Revenue Bonds as required in the PFC Trust Agreement. Any remaining funds are transferred to the PFC Capital Fund.

CFC revenue is deposited in the CFC Revenue Fund established pursuant to the CFC Trust Agreement and are utilized to pay debt service on CFC Special Facilities Bonds as required in the CFC Trust Agreement. Any remaining funds are transferred to the CFC Stabilization Fund.

See Note 2 for a reconciliation between the increase in net position as calculated per GAAP and net revenues as calculated per accounting practices prescribed by the 1978 Trust Agreement.

Net Position

The Authority follows the "business type" activity requirements of GASB Statement No. 34, *Basic Financial Statements and Management's Discussion and Analysis for State and Local Governments*, which requires that resources be classified for accounting and reporting purposes into the following three net position components:

- Net investment in capital assets: Capital assets, net of accumulated depreciation and outstanding principal balances of debt and the deferred outflows / inflows attributable to the acquisition, construction or improvement of those assets.
- Restricted: Net position of assets whose use by the Authority is subject to externally imposed stipulations that can be fulfilled by actions of the Authority pursuant to those stipulations or that expire by the passage of time. Such assets include the construction funds held pursuant to the 1978 Trust Agreement, the PFC Trust Agreement, the CFC Trust Agreement and the self insurance fund.
- Unrestricted: Net position of assets that are not subject to externally imposed stipulations. Net
 amounts of assets, deferred outflows of resources, liabilities and deferred inflows of resources not
 included in the determination of net invested in capital assets or restricted components of net
 position. Unrestricted net position may be designated for specific purposes by action of management
 or the Members of the Authority (the "Board") or may otherwise be limited by contractual
 agreements with outside parties.
- When both restricted and unrestricted resources are available for a particular restricted use, it is the Authority's policy to use restricted resources first, and then unrestricted resources as needed.

Notes to Financial Statements June 30, 2014 and 2013

Deferred outflows/inflows of resources

In addition to assets, the statement of financial position will sometimes report a separate section for deferred outflows of resources. This separate financial statement element, deferred outflows of resources, represents a consumption of net position that applies to a future period(s) and so will not be recognized as an outflow of resources (expense/expenditure) until then. The Authority only has one item that qualifies for reporting in this category. A deferred charge on refunding results from the difference in the carrying value of refunded debt and its reacquisition price. This amount is deferred and amortized over the shorter of the life of the refunded or refunding debt.

In addition to liabilities, the statement of financial position will sometimes report a separate section for deferred inflows of resources. This separate financial statement element, deferred inflows of resources, represents an acquisition of net position that applies to a future period(s) and so will not be recognized as an inflow of resources (revenue) until that time. The Authority does not have any deferred inflows of resources for the years ended June 30, 2014 and 2013.

Net position flow assumption

Sometimes the Authority will fund outlays for a particular purpose from both restricted (e.g., restricted bond or grant proceeds) and unrestricted resources. In order to calculate the amounts to report as restricted net position and unrestricted net position, a flow assumption must be made about the order in which resources are considered to be applied.

(a) Cash and Cash Equivalents

For purposes of the statements of cash flows, the Authority considers all highly liquid investments, including restricted assets, with an original maturity date of thirty days or less to be cash equivalents.

(b) Investments

Investments with a maturity greater than one year are recorded at their fair value with all investment income, including changes in the fair value of investments, reported as investment income in the financial statements. Investments with a maturity date of less than one year are carried at amortized cost, which approximates fair value. Fair value equals quoted market prices. The Authority recorded an unrealized holding gain of \$1.5 million and a realized gain of \$0.4 million at June 30, 2014 and an unrealized holding loss of \$2.8 million at June 30, 2013.

(c) Restricted Cash and Investments

Certain cash, cash equivalents and investments are restricted for use by the 1978 Trust Agreement, the PFC Trust Agreement, and other external requirements. These amounts have been designated primarily for expenditures related to future construction or asset acquisitions, debt service and debt service reserves.

Notes to Financial Statements June 30, 2014 and 2013

(d) Capital Assets

Capital assets are recorded at historical cost. Such costs include, where appropriate, capitalized interest and related legal costs. The costs of normal upkeep, maintenance, and repairs are not capitalized.

The capitalization threshold is noted below:

	Dollar
Asset Category	 Threshold
Buildings	\$ 10,000
Machinery & Equipment	5,000
Equipment Repair/Overhaul (Major)	25,000
Runway, Roadways & Other Paving	50,000
Land	NA
Land Improvements	50,000

The Authority capitalizes certain interest costs associated with taxable and tax exempt borrowing, less any interest earned on the proceeds of those borrowings, during the period of construction. Interest expense of \$4.1 million and \$12.0 million, reduced by interest income of \$13.0 thousand and \$17.0 thousand resulted in capitalized interest of \$4.1 million and \$12.0 million for the years ended June 30, 2014 and 2013, respectively.

(e) Depreciation

The Authority provides for depreciation using the straight-line method. During fiscal year 2013 the Authority changed the estimated useful life of runway repaving which added approximately \$14.3 million to the current year expense. Depreciation is intended to distribute the cost of depreciable properties over the following estimated useful lives:

Asset Category	Years
Buildings	25
Runways (original construction)	25
Other airfield paving	12
Roadway	25
Machinery and equipment	5 to 10
Land use rights	30

(f) Other Assets and Prepaid Items

Other assets consist of certain payments to vendors reflecting costs applicable to future accounting periods and are recorded as prepaid items in the financial statements.

Notes to Financial Statements June 30, 2014 and 2013

(g) Amortization

Revenue bond discounts and premiums are deferred and amortized on a straight line basis over the term of the bonds, as this approximates the effective interest method. Unamortized amounts are presented as a (reduction) addition of the face amount of bonds payable.

The difference between the reacquisition price and net carrying amount of defeased bonds is amortized on the straight-line method over the shorter of the maturity of the new debt or the defeased debt and is recorded as deferred outflows of resources on the statement of net position.

(h) Revenue Recognition

Fees and other services consist of parking fees, landing fees, and container handling fees. Revenues from parking fees and container handling fees are recognized at the time the service is provided. Landing fees are recognized as part of operating revenue when airline related facilities are utilized and are principally based on the landed weight of the aircraft. The scheduled airline fee structure is determined and approved annually by the Board and is based on full cost recovery pursuant to an arrangement between the Authority and the respective airlines.

Rental and concession fees are generated from airlines, rental car companies, and other commercial tenants. Rental revenue on leases is recognized over the term of the associated lease. Concession revenue is recognized partially based on self reported concession revenue by the tenants and partially based on minimum rental. Unearned revenue consists primarily of amounts received in advance for future rents or other services. These amounts are recognized as revenue as they are earned over the applicable period.

Rates and charges are set annually based on the budgeted operating costs and actual capital costs. A true-up calculation is performed for landing fees, terminal rents, and baggage fees at year-end based on the actual results. In the event the actual costs are more than the budgeted amounts for the year, the Authority will recover additional rates and charges. In the event the actual costs are less than the budgeted amounts, the Authority will issue credits to the respective airlines.

The Authority presents its accounts receivable at the expected net realizable value. Accordingly, the Authority recorded an allowance for doubtful accounts against its accounts receivable of \$1.1 million and \$1.5 million at June 30, 2014 and 2013, respectively.

Revenue related to grants is recognized when the grant agreement is approved and eligible expenditures are incurred.

Notes to Financial Statements June 30, 2014 and 2013

(i) Passenger Facility Charges

In 1993, the Authority received initial approval from the Federal Aviation Administration ("FAA") to impose a \$3.00 PFC at Logan Airport. PFCs collected by the Authority can be used for capital projects determined by the FAA to be eligible in accordance with the Aviation Safety and Capacity Expansion Act of 1990. Effective October 1, 2005, the Authority received approval from the FAA to increase the PFC collection to \$4.50. All PFC's collected by the Authority are presently pledged under the PFC Trust Agreement with the Bank of New York Mellon.

Through June 30, 2014, the Authority had cumulative cash collections of \$911.9 million in PFCs, including interest thereon.

As part of the Final Agency Decision issued by the FAA in 2011, the Authority was authorized, but not required, to use up to \$14.4 million per year in PFCs to pay approximately one-third of the debt service on the Terminal A Special Facility bonds. The Authority chose to make this use of PFC revenue in order to offset the increase in Terminal A rates and charges that would have resulted from the scheduled increase in Terminal A debt service associated with the beginning of principal payments on January 1, 2012 for the Terminal A bonds. This use of PFCs will maintain the rate consistency across all terminals and facilitate the Authority's ability to assign carriers to Terminal A.

At June 30, 2014, the Authority's collection authorization and total use approval is \$1.35 billion.

As of June 30, 2014 and 2013, \$110.4 million and \$127.4 million of PFC bonds were outstanding, respectively.

Revenues derived from the collection of PFCs are recognized on the accrual basis, based on the month the charges were levied and collected by the airlines. Due to their restricted use, PFCs are categorized as non-operating revenues. The Authority recognized \$62.7 million and \$60.1 million in PFC revenue for the fiscal years ended June 30, 2014 and 2013, respectively.

Notes to Financial Statements June 30, 2014 and 2013

(j) Customer Facility Charges

Effective December 1, 2008, the Board established a CFC of \$4.00 per day for rental cars which originated out of Logan Airport. Effective December 1, 2009, this charge was increased to \$6.00 per day. The proceeds of the CFC are being used to finance the Rental Car Center (the "RCC") and associated bus purchases. Revenues derived from the collection of CFCs are recognized on the accrual basis, based on the month the charges were levied and collected by the rental car companies. Due to their restricted use, CFCs are categorized as non-operating revenues. Pursuant to the CFC Trust Agreement dated May 18, 2011 between the Authority and U.S. Bank National Association, as trustee, the Authority issued two series of Special Facilities Revenue Bonds (the "Series 2011 Bonds"). The Series 2011 Bonds were issued for the purpose of providing funds sufficient, together with other available funds of the Authority, to finance the development and construction of a RCC and related improvements at Logan Airport, fund certain deposits to the Debt Service Reserve Fund and the Supplemental Reserve Fund, and pay certain costs of issuance of the Series 2011 Bonds. The Series 2011 Bonds and any additional bonds that may be issued under the CFC Trust Agreement on parity with the Series 2011 Bonds are secured by CFC Pledged Revenues and by Contingent Rent from the rental car companies if any, and other funds. The Series 2011 Bonds are not secured by any other revenues of the Authority. The Authority recognized \$30.0 million and \$29.4 million in CFC revenue for the fiscal years ended June 30, 2014 and 2013, respectively. As of June 30, 2014 and 2013, \$208.3 million and \$211.5 million of CFC bonds were outstanding, respectively.

(k) Compensated Absences

The Authority accrues for vacation and sick pay liabilities when they are earned by the employee. The liability for vested vacation and sick pay is reflected in the accompanying statements of net position as compensated absences. The table below presents the Authority's compensated absences activity at June 30, 2014 and 2013 and for the years then ended (in thousands):

2014

	 2014	_	2013
Liability balance, beginning of year	\$ 21,423	\$	22,201
Vacation and sick pay earned during the year	12,290		12,066
Vacation and sick pay used during the year	 (13,256)	_	(12,844)
Liability balance, end of year	\$ 20,457	\$	21,423

Notes to Financial Statements June 30, 2014 and 2013

(1) Use of Estimates

The preparation of financial statements in conformity with GAAP requires management to make estimates and assumptions that affect the reported amounts of assets and liabilities and disclosure of contingent assets and liabilities at the date of the financial statements and the reported amounts of revenues and expenditures during the reporting period. Actual results could differ from those estimates.

(m) Interfund Transactions

During fiscal year 2014, the Authority loaned the CFC Trust \$10.0 million at 6.167% interest to complete the construction of the RCC. This transaction generated \$0.5 million in interest income and expense that has been eliminated in the combining schedules. Additionally, all interfund amounts have been eliminated in the combining statements.

(n) Financial Statement Reclassification

Certain amounts in the fiscal year 2013 financial statements have been reclassified to conform to fiscal year 2014 presentation.

(o) New Accounting Pronouncements

In June 2012, GASB issued Statement No. 68, Accounting and Financial Reporting for Pensions ("GASB No. 68"). The objective of this Statement is to improve the information provided in government financial reports about pension related financial support provided benefits to the employees of other entities. The provisions of this Statement are effective for financial periods beginning after June 15, 2014.

The Authority is currently evaluating the impact the adoption of this Statement will have on its financial statements as a result of the implementation of GASB No. 68.

In January 2013, GASB issued Statement No. 69, Government Combinations and Disposals of Government Operations ("GASB No. 69"). This Statement establishes accounting and financial reporting standards related to government combinations and disposals of government operations. As used in this Statement, the term government combinations include a variety of transactions referred to as mergers, acquisitions, and transfers of operations. The distinction between a government merger and a government acquisition is based upon whether an exchange of significant consideration is present within the combination transaction. Government mergers include combinations of legally separate entities without the exchange of significant consideration. This Statement requires the use of carrying values to measure the assets and liabilities in a government merger. Conversely, government acquisitions are transactions in which a government acquires another entity, or its operations, in exchange for significant consideration. This Statement requires measurements of assets acquired and liabilities assumed generally to be based on their acquisition values. This Statement also provides guidance for transfers of operations that do not constitute entire legally separate entities and in which no significant consideration is exchanged. This Statement defines the term operations for purposes of determining the applicability of this Statement and requires the use of carrying values to measure the assets and liabilities in a transfer of operations.

Notes to Financial Statements June 30, 2014 and 2013

A disposal of a government's operations results in the removal of specific activities of a government. This Statement provides accounting and financial reporting guidance for disposals of government operations that have been transferred or sold.

This Statement requires disclosures to be made about government combinations and disposals of government operations to enable financial statement users to evaluate the nature and financial effects of those transactions.

The requirements of this Statement are effective for government combinations and disposals of government operations occurring in financial reporting periods beginning after December 15, 2013, and should be applied on a prospective basis.

The Authority is currently evaluating the impact of the implementation of GASB No. 69 on its financial statements.

In April 2013, GASB issued Statement No. 70, Accounting and Financial Reporting for Nonexchange Financial Guarantees ("GASB No. 70"). Some governments extend financial guarantees for the obligations of another government, a not-for-profit organization, a private entity, or individual without directly receiving equal or approximately equal value in exchange (a nonexchange transaction). As a part of this nonexchange financial guarantee, a government commits to indemnify the holder of the obligation if the entity or individual that issued the obligation does not fulfill its payment requirements.

Also, some governments issue obligations that are guaranteed by other entities in a nonexchange transaction. The objective of this Statement is to improve accounting and financial reporting by state and local governments that extend and receive nonexchange financial guarantees.

The provisions of this Statement are effective for reporting periods beginning after June 15, 2013. Earlier application is encouraged. Except for disclosures related to cumulative amounts paid or received in relation to a nonexchange financial guarantee, the provisions of this Statement are required to be applied retroactively. Disclosures related to cumulative amounts paid or received in relation to a nonexchange financial guarantee may be applied prospectively.

The Authority adopted this Statement and there was no impact on its financial statements.

In November 2013, GASB issued Statement No. 71, Pension Transition for Contributions Made Subsequent to the Measurement Date – an amendment of GASB Statement No. 68. ("GASB No. 71") which resolves transition issues in GASB Statement No. 68, Accounting and Financial Reporting for Pensions. The objective of this Statement is to eliminate a potential source of understatement of restated beginning net position and expense in a government's first year of implementing GASB No. 68. The issue relates to amounts associated with contributions, if any, made by a state or local government employer or nonemployer contributing entity to a defined benefit pension plan after the measurement date of the government's beginning net pension liability. The provisions of this Statement are required to be applied simultaneously with the provisions of GASB No. 68 which is effective for financial periods beginning after June 15, 2014.

Notes to Financial Statements June 30, 2014 and 2013

The Authority is currently evaluating the impact the adoption of this Statement will have on its financial statements as a result of the implementation of GASB No. 71.

Notes to Financial Statements June 30, 2014 and 2013

2. Reconciliation between increase in net position as calculated under GAAP and net revenues as calculated under accounting practices prescribed by the 1978 Trust Agreement

Presented below are the calculations of the net revenues of the Authority under the 1978 Trust Agreement. Net revenue calculated based on the 1978 Trust Agreement is used in determining the Authority's compliance with the debt service coverage ratio.

	2014	2013
Increase in Net Position per GAAP \$	91,778	43,829
Additions (1):		
Depreciation and amortization	217,767	199,046
Interest expense	64,973	61,071
Payments in lieu of taxes	18,444	18,090
Other operating expenses	4,201	3,129
Terminal A bonds - debt service contribution by PFC fund	11,839	12,114
OPEB expenses, net	140	450
Less (2):		
Passenger facility charges	(62,682)	(60,105)
Customer facility charges	(29,963)	(29,354)
Self insurance expenses	95	(678)
Capital grant revenue	(56,124)	(20,234)
Net decrease (increase) in the fair value of investments	(1,976)	2,821
Loss (gain) on sale of equipment	(90)	64
Other (revenues) expenses	(3,928)	(4,156)
Other non-operating revenues	(9,140)	1,092
Settlement of claims	(1,792)	(567)
Investment income	(3,434)	(4,168)
Net Revenue per the 1978 Trust Agreement \$	240,108	222,444

- 1. Expenses recognized under GAAP which are excluded under the 1978 Trust Agreement
- 2. Revenues recognized under GAAP which are excluded under the 1978 Trust Agreement

Total net revenues, as defined by the 1978 Trust Agreement, pledged for the repayment of bonds issued under the 1978 Trust Agreement were \$240.1 million and \$222.4 million for the years ended June 30, 2014 and 2013, respectively.

Notes to Financial Statements June 30, 2014 and 2013

3. Deposits and Investments

The Authority has adopted GASB No. 40, *Deposit and Investment Risk Disclosure*. The standard requires that entities disclose essential risk information about deposits and investments.

The Authority's investments are made in accordance with the provisions of the 1978 Trust Agreement, the PFC Trust Agreement and the CFC Trust Agreement along with the investment policy adopted by the Board (the "Investment Policy"). The goals of the Investment Policy are, in order of importance, to preserve capital, to provide liquidity and to generate interest income.

As of June 30, 2014 and 2013, all investments were held on behalf of the Authority by the Trustee, the PFC Trustee, the CFC Trustee or custodians in the Authority's name. The 1978 Trust Agreement, the PFC Trust Agreement and the CFC Trust Agreement require that securities collateralizing repurchase agreements must continuously have a fair value at least equal to the cost of the agreement plus accrued interest.

The Authority's investments in forward delivery agreements are in the form of a guaranteed investment contract ("GIC") which provides for, among other things, the sequential delivery of securities to be sold to the Trustee, PFC Trustee, or CFC Trustee, as applicable, periodically at a discount from maturity value such that the aggregate discount equals the interest rate previously agreed to between the Authority and the provider of the guaranteed investment contract.

The total accumulated unrealized gain (loss) due to the changes in fair value of investments related to investments with maturities in excess of one year was a gain of approximately \$0.7 million as of June 30, 2014 and a loss of approximately \$0.8 million as of June 30, 2013.

Notes to Financial Statements June 30, 2014 and 2013

The following summarizes the Authority's cash and cash equivalents and investments by type held at June 30, 2014 and 2013 (in thousands):

	Credit		Fair	Effective
2014	Rating (1)	Cost	Value	
MMDT	Unrated \$		\$ 175,0	
Federal Home Loan Bank	AA+/Aaa	47,701	47,7	
Federally Insured Cash Account	Unrated (2)	15,003	15,0	
Forward Delivery Agreements	AA+ / Aaa	17,278	17,2	
Federal Home Loan Mortgage Corp.	AA+ / Aaa	57,959	58,0	1.719
Federal National Mortgage Association	AA+ / Aaa	86,799	86,5	
Federal Farm Credit	AA+ / Aaa	13,036	13,1	13 1.780
Guaranteed Investment Contracts (ParkEx)	AA+ / Aa3 (4)	38,159	38,1	59 11.847
Cash Deposit	Unrated	17,599	17,5	99 0.003
Certificates of Deposit	AAA / Aaa (3)	13,037	13,0	37 0.350
Commercial Paper	A-1/P-1 (5)	164,628	164,6	0.312
Morgan Stanley Government Fund	AAA / Aaa (5)	1,072	1,0	72 0.003
Municipal Bond	AA+ / Aa1	115,793	116,5	85 2.399
Money Market Funds	Unrated	3,001	3,0	0.003
Insured Cash Sweep	Unrated (2)	10,001	10,0	0.003
Treasury Note	AAA / Aaa	2,579	2,5	30 4.988
	\$	778,709	\$ 779,4	29
	Credit		Fair	Effective
2013	Rating (1)	Cost	Value	Duration
MMDT	Unrated \$	5 152,182	\$ 152,1	82 0.003
Federal Home Loan Bank	AA+/Aaa	67,025	67,2	00 1.683
Federally Insured Cash Account		,	07,2	1.005
1 cacially insulca cash i localli	Unrated (2)	15,003	15,0	
Forward Delivery Agreements	Unrated (2) AA+ / Aaa	15,003 19,500	· · · · · · · · · · · · · · · · · · ·	0.003
•	()		15,0	03 0.003 00 3.121
Forward Delivery Agreements	AA+ / Aaa	19,500	15,0 19,5	03 0.003 00 3.121 97 1.163
Forward Delivery Agreements Federal Home Loan Mortgage Corp.	AA+ / Aaa AA+ / Aaa	19,500 91,052	15,0 19,5 91,0	03 0.003 00 3.121 97 1.163 60 1.362
Forward Delivery Agreements Federal Home Loan Mortgage Corp. Federal National Mortgage Association	AA+ / Aaa AA+ / Aaa AA+ / Aaa	19,500 91,052 143,283	15,0 19,5 91,0 142,4	03 0.003 00 3.121 97 1.163 60 1.362 38 1.815
Forward Delivery Agreements Federal Home Loan Mortgage Corp. Federal National Mortgage Association Federal Farm Credit	AA+ / Aaa AA+ / Aaa AA+ / Aaa AA+ / Aaa	19,500 91,052 143,283 22,752	15,0 19,5 91,0 142,4 22,8	03 0.003 00 3.121 97 1.163 60 1.362 38 1.815 61 12.195
Forward Delivery Agreements Federal Home Loan Mortgage Corp. Federal National Mortgage Association Federal Farm Credit Guaranteed Investment Contracts (ParkEx)	AA+ / Aaa AA+ / Aaa AA+ / Aaa AA+ / Aaa AA+ / Aa3 (4)	19,500 91,052 143,283 22,752 36,661	15,0 19,5 91,0 142,4 22,8 36,6	03 0.003 00 3.121 97 1.163 60 1.362 38 1.815 61 12.195 65 0.003
Forward Delivery Agreements Federal Home Loan Mortgage Corp. Federal National Mortgage Association Federal Farm Credit Guaranteed Investment Contracts (ParkEx) Cash Deposit	AA+ / Aaa AA+ / Aaa AA+ / Aaa AA+ / Aaa AA+ / Aa3 (4) Unrated	19,500 91,052 143,283 22,752 36,661 18,965	15,0 19,5 91,0 142,4 22,8 36,6 18,9	03 0.003 00 3.121 97 1.163 60 1.362 38 1.815 61 12.195 65 0.003 50 0.250
Forward Delivery Agreements Federal Home Loan Mortgage Corp. Federal National Mortgage Association Federal Farm Credit Guaranteed Investment Contracts (ParkEx) Cash Deposit Certificates of Deposit	AA+ / Aaa AA+ / Aaa AA+ / Aaa AA+ / Aaa AA+ / Aa3 (4) Unrated AAA / Aaa (3)	19,500 91,052 143,283 22,752 36,661 18,965 10,050	15,0 19,5 91,0 142,4 22,8 36,6 18,9	03 0.003 00 3.121 97 1.163 60 1.362 38 1.815 61 12.195 65 0.003 50 0.250 80 0.303
Forward Delivery Agreements Federal Home Loan Mortgage Corp. Federal National Mortgage Association Federal Farm Credit Guaranteed Investment Contracts (ParkEx) Cash Deposit Certificates of Deposit Commercial Paper	AA+ / Aaa AA+ / Aaa AA+ / Aaa AA+ / Aaa AA+ / Aa3 (4) Unrated AAA / Aaa (3) A-1/ P-1 (5)	19,500 91,052 143,283 22,752 36,661 18,965 10,050 199,345	15,0 19,5 91,0 142,4 22,8 36,6 18,9 10,0	03 0.003 00 3.121 97 1.163 60 1.362 38 1.815 61 12.195 65 0.003 50 0.250 80 0.303 72 0.003
Forward Delivery Agreements Federal Home Loan Mortgage Corp. Federal National Mortgage Association Federal Farm Credit Guaranteed Investment Contracts (ParkEx) Cash Deposit Certificates of Deposit Commercial Paper Morgan Stanley Government Fund	AA+ / Aaa AA+ / Aaa AA+ / Aaa AA+ / Aaa AA+ / Aaa (4) Unrated AAA / Aaa (3) A-1/ P-1 (5) AAA / Aaa (5)	19,500 91,052 143,283 22,752 36,661 18,965 10,050 199,345 1,072	15,0 19,5 91,0 142,4 22,8 36,6 18,9 10,0 199,4	03 0.003 00 3.121 97 1.163 60 1.362 38 1.815 61 12.195 65 0.003 50 0.250 80 0.303 72 0.003 32 2.185

^{1.} The ratings shown are from S&P or Moody's as of the fiscal year shown.

^{2.} FDIC Insured Deposits Accounts

^{3.} Collateralized by Federal Agency Notes or Letter of Credit backed by each reserve.

^{4.}Underlying rating of security held.

^{5.} Credit quality of fund holdings.

Notes to Financial Statements June 30, 2014 and 2013

The table below presents the Authority's cash and cash equivalents and investments based on maturity date (in thousands):

		2014	4	2013			
	_	Cost	Fair Value	Cost	Fair Value		
Securities maturing in 1 year or more Securities maturing in less than 1 year Cash and cash equivalents	\$	352,566 \$ 204,404 221,739	353,076 \$ 204,614 221,739	435,650 \$ 188,620 243,300	434,683 188,759 243,300		
	\$	778,709 \$	779,429 \$	867,570 \$	866,742		

Credit Risk

Credit risk is the risk that the Authority will be negatively impacted due to the default of the security issuer or investment counterparty.

The Authority's 1978 Trust Agreement, PFC Trust Agreement and CFC Trust Agreement each stipulate that, in addition to U.S. Treasury and government agency obligations, only certain highly rated securities are eligible investments, including bonds or obligations of any state or political subdivision thereof, rated in the two highest rating categories without regard to gradations within rating categories, by both Moody's (AAA, Aa1, Aa2 and Aa3) and S&P (AAA, AA+, AA, and AA-); commercial paper of a U.S. corporation, finance company or money market funds rated in the highest rating category, without regard to gradations within categories, by both Moody's and S&P; and investment contracts with banks whose long-term unsecured debt rating is in one of the two highest rating categories by both Moody's and S&P.

(a) Custodial Credit Risk – Deposits

The custodial credit risk for deposits is the risk that in the event of a bank failure, the Authority's deposits may not be recovered. The deposits in the bank in excess of the insured amount are uninsured and uncollateralized.

The Authority maintains depository accounts with Bank of America, N.A., Wells Fargo Bank, N.A., TD Bank and the Bank of New York Mellon, the PFC Trustee. The Authority maintains a payroll disbursement, lockbox and collection accounts (for other than PFCs) with the Bank of America, N.A. None of these accounts are collateralized.

The Authority's cash on deposits in the banks noted above at June 30, 2014 and 2013 were \$22.4 million and \$19.9 million, respectively. Of these amounts, \$1.0 million was insured, and no amount was collateralized at June 30, 2014 or 2013.

Notes to Financial Statements June 30, 2014 and 2013

(b) Custodial Credit Risk – Investments

Custodial credit risk is the risk that, in the event of a failure of the counterparty, the Authority would not be able to recover the value of its investments or collateral securities that were in the possession of an outside party. Investment securities are exposed to custodial credit risk if they are uninsured or not registered in the name of the Authority and are held by either the counterparty or, the counterparty's trust department or agent, but not in the Authority's name.

The Authority is authorized by the 1978 Trust Agreement, the PFC Trust Agreement, the CFC Trust Agreement and the Investment Policy to invest in obligations of the U.S. Treasury, including obligations of its agencies and instrumentalities, bonds and notes of public agencies or municipalities, bank time deposits, guaranteed investment contracts, money market accounts and commercial paper of a U.S. corporation or finance company. All investments are held by a third party in the Authority's name. These investments are recorded at fair value.

Additionally, the Authority is authorized to invest in the Massachusetts Municipal Depository Trust (MMDT), a pooled money market like investment fund managed by the Commonwealth of Massachusetts, established under the General Laws, Chapter 29, Section 38A. MMDT investments are carried at amortized cost, which approximates fair value which is the same as the value of the pool.

The following guaranteed investment contracts were in force as of June 30, 2014 and 2013, respectively; they are uncollateralized and recorded at cost:

Investment Agreement

Provider	Rate	Maturity		2014	_	2013
Trinity Plus Funding Company	4.360%	January 2, 2031	\$	16,691	\$	15,987
GE Funding Capital Markets	3.808%	December 31, 2030	_	21,468	_	20,673
Т	otal		\$_	38,159	\$_	36,660

(c) Concentration of Credit Risk – Investments

Concentration of credit risk is assumed to arise when the amount of investments that the Authority has with any one issuer exceeds 5% of the total value of the Authority's investments. The Authority consults with its Investment Advisor to select Commercial Paper Issuers with strong credit ratings. The book values of portions of the Authority-wide portfolio, excluding investments issued by MMDT, the FDIC, or U.S. Government guaranteed obligations and the underlying securities held under forward delivery agreements at cost, that exceed 5% of the portfolio are as follows:

Notes to Financial Statements June 30, 2014 and 2013

Commercial Paper Issuer	2014	 2013
Bank of Tokyo Mitsu	\$ 14,986	\$ 39,971
BNP Paribas Finance	23,747	24,921
Deutsche Bank	11,993	-
HSBC	-	27,492
JP Morgan Chase	23,988	-
Societe Generale	36,957	-
Credit Agricole	36,971	-
Rabobank	-	19,046
Toyota Motor Corporation	15,986	43,962
UBS	 -	 43,953
Total	\$ 164,628	\$ 199,345
% of Portfolio	 21.12%	 22.98%

(d) Credit Ratings

As a result of the S&P's credit rating downgrade of several U.S. Treasury supported federal agencies in August 2011, certain investments owned and purchased by the Authority since that date were lowered and their ratings are reflected herein. Prior to the August 2011 downgrade it was management's practice to purchase debt securities that had an implied credit rating of AAA, or that were collateralized to AAA. Investments in bank certificates of deposits were fully collateralized. Also, the Authority invested in the Massachusetts Municipal Depository Trust (MMDT), managed by the State Treasury, which is not rated.

The 1978 Trust Agreement, the PFC Trust Agreement, the CFC Trust Agreement and the Board approved Investment Policy limit the Authority in the types of investments it can purchase to the two highest rating categories without regard to gradations within the rating categories by both S&P (AAA, AA+, AA, and AA-) and Moody's (Aaa, Aa1, Aa2, and Aa3).

(e) Interest Rate Risk – Investments

Interest rate risk is the risk that changes in interest rates will adversely affect the fair market value of an investment. The Authority has set targets for the preferred maturity structure of the investments held in each fund and account, and also sets targets each quarter for the effective duration for each fund that reflect the need for liquidity and the expected tradeoffs between yield and term for each different fund and account. It is the Authority's practice to hold investments until maturity in order to insulate the Authority's investment earnings from interest rate risk. The Authority mitigates interest rate risk by managing the weighted average maturity of each portfolio type to best meet its liquidity needs.

Notes to Financial Statements June 30, 2014 and 2013

(f) Cash, Cash Equivalents and Investments by Fund

The following summarizes cash and investments, at cost and fair value, as of June 30, by the various funds and accounts established by the Authority for debt covenant requirements and other purposes (in thousands):

	201	4	2013			
		Fair		Fair		
	Cost	Value	Cost	Value		
1978 Trust			_			
Improvement and Extension Fund	\$ 93,482 \$	93,730 \$	117,670 \$	117,717		
Capital Budget Account	140,511	140,511	153,130	153,356		
Debt Service Reserve Funds	102,664	102,573	102,659	101,547		
Debt Service Funds	71,417	71,417	69,351	69,351		
Maintenance Reserve Fund	104,434	104,608	88,280	88,259		
Operating/Revenue Fund	49,573	49,573	47,733	47,736		
Subordinated Debt Funds	40,556	40,556	39,056	39,056		
Self-Insurance Account	28,314	28,583	27,352	27,396		
2010 A Construction Fund	-	-	226	226		
2012 A Project Fund	5,366	5,366	53,936	53,902		
Other Funds	23,123	23,079	15,817	15,817		
1999 PFC Trust						
Debt Service Reserve Funds	27,866	27,993	28,147	28,342		
Debt Service Funds	20,457	20,457	19,558	19,558		
Other PFC Funds	11,587	11,587	19,169	19,176		
2011 CFC Trust						
2011-A & B CFC Project Funds	12,753	12,753	24,699	24,714		
Debt Service Reserve Funds	27,994	28,021	28,040	27,828		
Debt Service Funds	9,191	9,191	7,613	7,613		
Other CFC Funds	9,421	9,431	25,134	25,148		
Total	\$ 778,709 \$	779,429 \$	867,570 \$	866,742		

Notes to Financial Statements June 30, 2014 and 2013

4. Capital Assets

Capital assets consisted of the following at June 30, 2014 and 2013 (in thousands):

				dditions and		Deletions and	
	_	June 30, 2013	_1	Transfers In	_	Fransfers Out	June 30, 2014
Capital assets not being depreciated							
Land	\$	174,754 \$	\$,	\$	— \$,
Construction in progress	_	341,977	_	349,186	_	536,092	155,071
Total capital assets not being							
depreciated	_	516,731	_	377,131	_	536,092	357,770
Capital assets being depreciated							
Buildings		2,527,365		382,731		_	2,910,096
Runway and other paving		773,180		10,534		_	783,714
Roadway		639,332		52,272		_	691,604
Machinery and equipment		336,392		61,474		(50)	397,916
Air rights		179,851		1,136		50	180,937
Parking rights	_	46,261			_		46,261
Total capital assets being							
depreciated	_	4,502,381		508,147	_		5,010,528
Less accumulated depreciation:							
Buildings		1,286,795		105,501		_	1,392,296
Runway and other paving		346,291		44,084		_	390,375
Roadway		277,247		27,691		_	304,938
Machinery and equipment		223,314		31,348		(5)	254,667
Air rights		97,296		8,041		5	105,332
Parking rights	_	18,504	_	1,542	_		20,046
Total accumulated							
depreciation	_	2,249,447		218,207	_		2,467,654
Total capital assets being							
depreciated, net	_	2,252,934	_	289,940	_		2,542,874
Capital assets, net	\$_	2,769,665 \$	\$	667,071	\$	536,092 \$	2,900,644

Depreciation and amortization for fiscal year 2014 and 2013 was \$217.8 million and \$199.0 million, respectively.

Notes to Financial Statements June 30, 2014 and 2013

	_	June 30, 2012		Additions and Transfers In	Deletions and Transfers Out	June 30, 2013
Capital assets not being depreciated Land	\$	173,036	\$	1,718	S — S	S 174,754
Construction in progress	_	257,828	_	318,288	234,139	341,977
Total capital assets not being depreciated	_	430,864		320,006	234,139	516,731
Capital assets being depreciated	_	130,001		320,000	25 1,137	310,731
Buildings		2,485,423		42,005	63	2,527,365
Runway and other paving		677,138		99,654	3,612	773,180
Roadway		615,045		24,287	_	639,332
Machinery and equipment		273,509		63,426	543	336,392
Air rights		176,802		3,049	_	179,851
Parking rights	_	46,261	_			46,261
Total capital assets being						
depreciated	_	4,274,178		232,421	4,218	4,502,381
Less accumulated depreciation for:						
Buildings		1,213,591		73,267	63	1,286,795
Runway and other paving		301,141		46,477	1,327	346,291
Roadway		252,077		25,170	_	277,247
Machinery and equipment		178,764		44,935	385	223,314
Air rights		89,224		8,072	_	97,296
Parking rights	_	16,962	_	1,542		18,504
Total accumulated depreciation	_	2,051,759		199,463	1,775	2,249,447
Total capital assets being		2 222 410		22.050	2.442	2 252 024
depreciated, net	_	2,222,419		32,958	2,443	2,252,934
Capital assets, net	\$_	2,653,283	_\$	352,964	236,582	2,769,665

Notes to Financial Statements June 30, 2014 and 2013

Capital assets (excluding construction in progress) at June 30 comprised of the following (in thousands):

	2014	2013
Facilities completed by operation:		
Airports	\$ 4,721,894	\$ 4,193,108
Port	491,333	484,027
Capital assets (excluding construction in progress)	\$ 5,213,227	\$ 4,677,135

Notes to Financial Statements June 30, 2014 and 2013

5. Bonds and Notes Payable

Long-term debt at June 30, 2014 consisted of the following and represents maturities on the Authority's fiscal year basis (in thousands):

	Beginning balance		Additions	Reductions	Ending balance	Due within one year
Revenue Bonds:		_				
Senior Debt-1978 Trust Agreement:						
2003, Series A, 3.00% to 5.00%, issued						
May 22, 2003 due 2013 to 2034	\$ 7,845	\$	— \$	5,190	\$ 2,655	\$ 1,465
2003, Series C, 5.00%, issued						
May 22, 2003 due 2013 to 2019	26,710			7,885	18,825	5,620
2005, Series A, 3.50% to 5.00%, issued						
May 5, 2005 due 2015 to 2036	168,690			4,090	164,600	4,285
2005, Series C, 3.50% to 5.00%, issued						
May 5, 2005 due 2014 to 2030	202,265			10,105	192,160	10,570
2007, Series A, 3.75% to 4.50%, issued						
May 31, 2007 due 2014 to 2038	46,710		_	1,090	45,620	1,135
2007, Series C, 4.00% to 5.00%, issued						
May 31, 2007 due 2014 to 2028	29,515			1,370	28,145	1,435
2008, Series A Multi-Modal, variable, issued						
June 19, 2008 due 2014 to 2039	22,700			330	22,370	2,649
2008, Series C, 4.00% to 5.00%,						
issued July 9, 2008 due 2014 to 2021	33,860			3,545	30,315	6,250
2010, Series A, 3.25% to 5.00%, issued						
August 5, 2010 due 2014 to 2041	97,905		_	1,825	96,080	1,895
2010, Series B, 3.00% to 5.00%, issued	125.060			1.625	100 105	1 600
August 5, 2010 due 2014 to 2040	135,060			1,625	133,435	1,690
2010, Series C, 5.00%, issued	10 100			2 (20	16 470	2.015
August 5, 2010 due 2014 to 2019	19,100			2,630	16,470	2,815
2010, Series D, Multi-Modal variable, issued	00.000			4.640	04.250	12.040
August 5, 2010 due 2014 to 2030	98,890		_	4,640	94,250	13,840
2012, Series A, 3.00% to 5.00%, issued July 11, 2012 due 2014 to 2041	116,785				116,785	4.200
• /	110,783		_	_	110,783	4,300
2012, Series B, 3.00% to 5.00%, issued July 11, 2012 due 2017 to 2032	158,830				158,830	
July 11, 2012 due 2017 to 2032	130,030	_			 130,030	
Subtotal Senior Debt	1,164,865		_	44,325	1,120,540	57,949

Notes to Financial Statements June 30, 2014 and 2013

		Beginning balance	A	Additions	Reductions		Ending balance	Due within one year
Subordinated debt- 1978 Trust Agreement: 2000, Series A,B & C, 6.45%, issued December 29, 2000 due 2031 2001, Series A,B & C, 6.45%, issued	\$	40,000	_		_	-	40,000	
January 2, 2001 due 2032		34,000			_		34,000	
Subtotal Subordinate Debt		74,000		_	_		74,000	_
	_	Beginning balance		Additions	Reductions		Ending balance	 Due within one year
Senior Debt - PFC Trust Agreement: 2007, Series B, 4.00% to 5.00%, issued May 31, 2007 due 2014 to 2018 2007, Series D, 3.80% to 5.50%, issued	\$	28,765	\$	- \$	4,460	\$	24,305	\$ 4,635
May 31, 2007 due 2014 to 2018 2010, Series E, 5.00%, issued August 5, 2010 due 2014 to 2018		64,730		_	100		64,630	100
	-	33,860			12,365		21,495	 12,985
Subtotal PFC Senior Debt		127,355		_	16,925		110,430	17,720
Senior Debt - CFC Trust Agreement: 2011, Series A, 5.125%, issued								
June 8, 2011 due 2038 to 2042		58,030		_	_		58,030	_
2011, Series B, 0.900% to 6.352%, issued June 8, 2011 due 2014 to 2038		153,455			3,185		150,270	 3,260
Subtotal CFC Senior Debt	_	211,485			3,185		208,300	 3,260
Total Bonds Payable		1,577,705		_	64,435		1,513,270	78,929
Less unamortized amounts: Bond premium (discount), net		78,935		_	5,737		73,198	5,736
Total Bonds Payable, net	\$	1,656,640	\$	\$	70,172	\$	1,586,468	\$ 84,665

Included in the Authority's bonds payable are \$116.6 million and \$121.6 million of variable rate demand bonds ("VRDB") as of June 30, 2014 and 2013, respectively. The VRDBs have remarketing features which allow bondholders the right to return, or put, the bonds to the Authority. The Authority had previously entered into a three year irrevocable letter of credit agreement with Bank of America that expired on August 12, 2013. On August 7, 2013, the Authority entered into a five year irrevocable letter of credit agreement with State Street Bank, in support of the Authority's variable rate demand bonds, Series 2008 A and Series 2010 D. This agreement requires repayment of the tendered, unremarketed VRDBs and any associated obligations on the bonds tendered. Should the VRDBs be tendered and the letter of credit exercised, the tendered bonds would be converted to bank bonds, possibly requiring one tenth of the tendered bonds to become due within 270 days. As such, the Authority would look to identify an alternative financing arrangement in advance of the bank bonds debt service payment becoming due to satisfy this obligation.

Notes to Financial Statements June 30, 2014 and 2013

The subject debt was issued as multi-modal bonds, thus allowing the Authority to reissue and refund through one of several modes. As a result, the Authority has classified \$11.1 million and \$11.7 million to its current portion of long term debt, in addition to the amounts identified in the schedules of the Authority's bonds payable at June 30th due within one year, for the fiscal years ending June 30, 2014 and 2013, respectively.

The following summarizes the Authority's revenue bonds activity at June 30 (in thousands):

	2013 Beginning balance		Additions		Reductions	2014 Ending balance		Due within one year
Senior Debt-1978 Trust Agreement: Subordinated Debt- 1978 Trust Agreement	\$ 1,164,865 74,000	\$	_ _	\$	44,325	\$ 1,120,540 74,000	\$	57,949 —
Senior Debt - PFC Trust Agreement:	127,355		_		16,925	110,430		17,720
Senior Debt - CFC Trust Agreement:	211,485			_	3,185	 208,300		3,260
	\$ 1,577,705	\$		\$	64,435	\$ 1,513,270	\$	78,929
	2012 Beginning balance		Additions	-	Reductions	 2013 Ending balance	•	Due within one year
Senior Debt-1978 Trust Agreement:	\$ Beginning	- \$	Additions 275,615	\$	Reductions 237,110	\$ Ending	\$	
Senior Debt-1978 Trust Agreement: Subordinated Debt- 1978 Trust Agreement	\$ Beginning balance	\$		\$		\$ Ending balance	\$	one year
-	\$ Beginning balance	\$		\$		\$ Ending balance	\$	one year
Subordinated Debt- 1978 Trust Agreement	\$ 1,126,360 74,000	\$		\$	237,110	\$ Ending balance 1,164,865 74,000	\$	55,987

Notes to Financial Statements June 30, 2014 and 2013

Debt service requirements on revenue bonds (1978 Trust, PFC Trust and CFC Trust) outstanding at June 30, 2014 are as follows (in thousands):

	Principal		Interest		Total
Year ending June 30:					
2015	\$ 67,790	0 \$	70,666	\$	138,456
2016	72,070	0	67,839		139,909
2017	73,200	0	64,683		137,883
2018	106,440	0	61,414		167,854
2019	56,060	0	56,699		112,759
2020 - 2024	270,620	0	250,614		521,234
2025 - 2029	296,900	0	189,297		486,197
2030 - 2034	305,465	5	114,209		419,674
2035 - 2039	173,49	5	47,972		221,467
2040 - 2043	91,230	0	9,492	_	100,722
Total	\$1,513,270	0\$_	932,885	\$_	2,446,155

a) Senior Debt - 1978 Trust Agreement

On July 11, 2012, the Authority issued \$275.6 million of Massachusetts Port Authority Revenue Bonds in two series. The Series 2012 A Revenue Bonds, in the principal amount of \$116.8 million were issued with an original issue premium of approximately \$11.5 million and interest rates ranging from 3.0% to 5.0%. The projects financed with Series A bond proceeds include capital improvements to Terminals B and C, hanger upgrades, and replacement substations for Terminals B and E. Due to the "private activity" nature of the construction projects, these bonds were sold as AMT bonds.

The Authority also issued \$158.8 million in Revenue Refunding Bonds, Series 2012 B. The Series 2012 B Bonds had an original issue premium of approximately \$27.4 million and refunded a portion of the 2003 A bonds and 2003 C bonds. The current refunding resulted in the recognition of an accounting gain of \$1.6 million, which will be amortized over the life of the defeased bonds. The aggregate difference in debt service between the refunded 2003 A and 2003 C bonds and the refunding debt service was \$19.0 million. This refunding had an economic gain and achieved a net present value savings of \$14.7 million or 8.2%. The annual savings for fiscal year 2013 through fiscal year 2033 are approximately \$0.817 million.

The Authority, through its 1978 Trust Agreement, has covenanted to maintain a debt service coverage ratio of not less than 1.25. Debt service coverage is calculated based on a formula set forth in the 1978 Trust Agreement. Historically, the Authority has maintained a debt service coverage ratio higher than its Trust Agreement requirement to maintain its investment grade bond ratings. As of June 30, 2014 and 2013, the Authority's debt service coverage under the 1978 Trust Agreement was 2.65 and 2.47, respectively.

Notes to Financial Statements June 30, 2014 and 2013

b) Subordinate Debt - 1978 Trust Agreement

Subordinate debt is payable solely from funds on deposit in the Improvement and Extension Fund and is not subject to the pledge of the 1978 Trust Agreement, the PFC Trust Agreement or the CFC Trust Agreement. The Authority invested \$12.0 million in January 2001 which at maturity will provide for the \$74.0 million principal payments of the subordinate debt at their respective maturities on December 31, 2030 and January 1, 2031. As of June 30, 2014, the value of the two GICs was approximately \$38.2 million as compared to \$36.7 million as of June 30, 2013.

c) Senior Debt - PFC Trust Agreement

The Authority's outstanding PFC debt continues to be backed by a pledge of the \$4.50 PFC collections. The Authority earned PFC Revenues, as defined by the PFC Trust Agreement, of approximately \$62.8 million and \$60.2 million during fiscal years 2014 and 2013, respectively. These amounts include approximately \$0.1 million of investment income on PFC receipts during each of the fiscal years 2014 and 2013, respectively.

The PFC Trust Agreement requires a First Lien Sufficiency covenant ratio in excess of 1.05. As of June 30, 2014 and 2013, the Authority's PFC First Lien Sufficiency covenant under the PFC Trust Agreement was 4.75 and 4.37, respectively.

d) Senior Debt - CFC Trust Agreement

On June 8, 2011, the Authority issued its Special Facilities Revenue Bonds (RCC Project), Series 2011 A in the amount of \$58.0 million with an original issue discount of approximately \$1.5 million, and its Special Facilities Revenue Bonds (RCC Project), Series 2011 B (Federally Taxable) in the amount of \$156.0 million at par, pursuant to the CFC Trust Agreement (collectively, the "Series 2011 Bonds"). The Series 2011 Bonds were issued for the purpose of providing funds sufficient, together with other available funds, to finance the development and construction of a new RCC facility and related improvements at Logan Airport, fund certain deposits to the Debt Service Reserve Fund and the Supplemental Reserve Fund, and pay certain costs of issuance of the Series 2011 Bonds. The Series 2011 Bonds and any additional bonds that may be issued under the CFC Trust Agreement on parity with the Series 2011 Bonds are secured by CFC Pledged Revenues and by Contingent Rent from the rental car companies, if any, and other funds. The Series 2011 Bonds are not secured by any other revenues of the Authority. The Series 2011 Bonds are payable solely from the CFC Pledged Receipts pledged under the CFC Trust Agreement and from certain funds and accounts held by the Trustee.

All of the Authority's outstanding RCC debt is backed by a pledge of the \$6.00 CFC collections. The Authority earned CFC Revenues, as defined by the CFC Trust Agreement, of approximately \$30.4 million and \$30.1 million during fiscal years 2014 and 2013, respectively. These amounts include approximately \$0.4 million and \$0.8 million of investment income on CFC receipts during each of the fiscal years 2014 and 2013, respectively.

The CFC Trust Agreement requires that the Authority maintain debt service coverage of at least 1.3. As of June 30, 2014 and 2013, the CFC debt service coverage was 2.69 and 2.87, respectively.

Notes to Financial Statements June 30, 2014 and 2013

e) Special Facility Bonds

To provide for the construction and improvement of various facilities at Logan Airport, the Authority has issued eight series of special facilities revenue bonds. The Authority's special facilities revenue bonds are all special limited obligations of the Authority, and are payable and secured solely from and by certain revenues of a separate trustee. The Authority's special facilities revenue bonds do not constitute a debt or pledge of the full faith and credit of the Authority, or the Commonwealth of Massachusetts or any subdivision thereof and, accordingly, have not been reflected in the accompanying financial statements. As of June 30, 2014 and 2013, the aggregate principal amount of the Authority's special facilities revenue bonds outstanding was approximately \$640.0 million and \$662.2 million, respectively. The Authority has no obligation for \$188.2 million of Special Facility Bonds and only limited obligation for the \$451.9 million of special facility bonds related to Terminal A described below. In July 2014, American Airlines defeased the remaining balance of approximately \$50.0 million in outstanding US Airways bonds.

Approximately \$451.9 million of the Authority's special facility bonds relate to the Delta Airlines Series 2001 A, B, and C bonds issued in connection with Delta Airlines construction of Terminal A. During September 2005, Delta Airlines entered into bankruptcy and as of April 2007 re-emerged out of bankruptcy. The Authority is under no obligation to assume any liability for the Terminal A Special Facility bonds or to direct revenue, other than an obligation to remit to the trustee of the Terminal A bonds a portion of the Terminal A airline revenue, to service the debt. The Authority and Delta Airlines negotiated a restated and amended lease (the "Amended Lease") for Terminal A pursuant to which Delta Airlines reduced the number of gates that it occupied in Terminal A. The Amended Lease was approved by the bankruptcy court and was effective as of July 1, 2006.

f) Commercial Notes Payable

The Authority's commercial notes payable as of June 30, 2014 and 2013 were as follows (in thousands):

	_	2014	2013
Commercial paper notes	\$	100,000 \$	100,000
Commercial paper notes issued		76,000	15,000
Principal paid on commercial paper notes		(26,000)	(15,000)
Commercial paper notes	\$	150,000 \$	100,000

In March 2014, the Authority expanded its commercial paper program to \$150 million. Commercial notes payable have been issued under the terms of the 1978 Trust Agreement and are backed by the proceeds of the Improvement and Extension Fund or anticipated bond funds. The allowable maximum principal amount outstanding at any time, in the aggregate principal amount, cannot exceed the lesser of 10% of the Authority's outstanding long-term debt or \$150.0 million, and is backed by a Letter of Credit Agreement with the TD Bank expiring in June 2017.

Notes to Financial Statements June 30, 2014 and 2013

The \$100 million of the commercial notes payable have been used to fund PFC eligible projects; therefore the Authority anticipates that PFC revenues will be the source to pay such redemptions. The \$50.0 million of the commercial paper notes payable represent general airline revenue bond anticipation notes. The blended interest rate on Series 2012 A Notes was 0.685% and 0.731% during fiscal years 2014 and 2013, respectively. The blended interest rate on the Series 2012 B Notes was 0.690% and 0.736% during fiscal years 2014 and 2013, respectively.

During fiscal year 2014 and fiscal year 2013, the Authority did not participate in any interest rate swaps.

g) Arbitrage – Rebate Liability

The United States Treasury has issued regulations on calculating the rebate due to the United States Government on arbitrage liability and determining compliance with the arbitrage rebate provisions of the Tax Reform Act of 1986. Arbitrage liability arises when the Authority temporarily invests the proceeds of tax exempt debt in securities with higher yields. The Authority has an estimated liability on June 30, 2014 and 2013 of \$429 thousand and \$12.1 million, respectively. The liability at June 30, 2013 in the amount of \$11.3 million was associated with the Authority's Subordinate Bond Series 2000 A & B, and Series 2001A, B & E. During fiscal year 2014, the Authority executed an agreement with the Internal Revenue Service in the amount of \$895.5 thousand as payment in full on this liability and recognized \$10.4 million as other non-operating income.

6. Employee Benefit Plans

a) Plan Description – Pension Plan

The Massachusetts Port Authority Employees' Retirement System plan (the "Plan") is a single employer contributory defined benefit pension plan administered by the Massachusetts Port Authority Employees' Retirement System (the "System"). The Plan provides retirement, disability, and death benefits to plan members and beneficiaries.

Massachusetts General Laws ("MGL"), principally Chapter 32, establishes and amends benefit provisions. The System issues publicly available audited financial statements for the Plan. The report may be obtained by writing to the Massachusetts Port Authority Employees' Retirement System, One Harborside Drive, Suite 200S, East Boston, MA 02128-2909. These statements are prepared on the accrual basis of accounting. Employer contributions are recognized when the employer has made formal commitments to provide the contributions. Member contributions are recognized by the Plan as compensation is earned by the Authority's employees. Retirement benefits and refunds are recorded when due and payable in accordance with the terms of the Plan.

Investments are reported at fair value. Securities traded on a national or international securities exchange are valued at the last reported sales price on the last business day of the plan year; investments traded on a national securities exchange for which no sale was reported on that date and investments in common and preferred stocks traded in over-the-counter markets are valued at the mean of the last reported bid and asked prices, or the last reported bid price. The Plan has no investments, at fair value, that exceed 5% of the Plan's total investments as of December 31, 2013 and 2012 other than investments in mutual funds, external investment pools and other pooled

Notes to Financial Statements June 30, 2014 and 2013

investments. No long term contracts for contributions to the Plan existed at December 31, 2013 and 2012.

b) Funding Policy

The contribution requirements of plan members and the Authority are defined by MGL Chapter 32 and may be amended through the legislative process. Depending upon their employment date, active plan members are required to contribute 5% to 9% of their annual covered compensation. Members hired after December 31, 1978 must contribute an additional 2% of regular compensation in excess of \$30.0 thousand. The Authority is required to contribute amounts pursuant to Section 22(6A) of MGL Chapter 32.

c) Annual Pension Cost

The annual required contribution ("ARC") for the year ended June 30, 2014 was determined as part of the January 1, 2013 actuarial valuation. The actuarial cost method required by the Plan under its charter is the Frozen-Entry-Age Actuarial Cost Method which uses a closed amortization period in level amounts over a twenty year period. The Asset Valuation Method is the market value of assets adjusted to phase in investment gains or losses above or below the expected rate of return using a five year rolling period.

The actuarial assumptions included a 7.625% investment rate of return, and projected salary increases of 4.50%. Both include an inflation component of 3.0%. Liabilities for cost of living increases have been approximated, assuming an annual cost of 3.0% on the first \$13.0 thousand annual pension. The ARC equaled the annual pension cost ("APC") and the employer contributions for the last three years. Those amounts are as follows (in thousands):

	Annual	Percentage of
Year ended December 31,	pension cost (APC)	APC contributed
2013	 11,960	100%
2012	9,594	100
2011	5,710	100

The Authority funds 100% of the ARC each year and therefore the Net Pension Obligation is zero.

Notes to Financial Statements June 30, 2014 and 2013

d) Funded Status and Funding Progress

The funded status of the plan, based on an actuarial valuation as of January 1, 2013, was as follows (in thousands):

Actuarially accrued liability ("AAL") Actuarial value of plan assets	\$ 457,937 433,408
Unfunded actuarial accrued liability ("UAAL")	\$ 24,529
Funded ratio (actuarial value of plan assets/AAL)	94.6%
Covered payroll (active plan members)	\$ 86,730
UAAL as a percentage of covered payroll	28.3%

7. Other Postemployment Benefits

During the year ended June 30, 2008, the Authority established the Retiree Benefits Trust (the "Trust") and implemented GASB Statement No. 45, Accounting and Financial Reporting by Employers for Postemployment Benefits Other Than Pensions. Statement No. 45 requires governments to account for other postemployment benefits, primarily healthcare, on an accrual basis rather than on a pay-as-you-go basis. The effect is the recognition of an actuarially required contribution as an expense on the statements of revenues, expenses, and changes in net position when future retirees earn their postemployment benefit rather than when they use their postemployment benefit. To the extent that an entity does not fund their actuarially required contribution, a postemployment benefit liability is recognized on the statements of net position over time.

a) Plan Description

In addition to providing the pension benefits described in Note 6, the Authority provides post-employment health care and life insurance benefits ("OPEB") for retired employees. The benefit levels, employer contributions and future employee contributions are governed by the Authority and can be amended by the Authority. As of June 30, 2013, approximately 781 retirees and 1,200 active and inactive employees meet the eligibility requirements.

In June 2009, the Board made changes to the plan benefits to be paid by the Authority for certain existing and future retirees. All current retired members of the Authority and all existing Authority employees who were vested as of October 1, 2009 would be eligible to have 100% of their premium cost subsidized. Employees not yet vested but employed by the Authority on October 1, 2009 would, upon retirement be eligible to receive 85% of the premium cost for benefits with the balance paid for by the retiree. For employees hired on or after October 1, 2009, the Board voted to implement a sliding scale subsidy for retiree health care premiums (ranging from 0%-85%) based on creditable service at retirement age (retirees must be age 60 or older to receive the subsidy), and whether or not the employee retired within sixty days after leaving the Authority. The Board also

Notes to Financial Statements June 30, 2014 and 2013

voted to eliminate retiree dental and life insurance coverage, as well as Medicare Part B premium subsidy for this group of employees.

The OPEB Plan is a single-employer plan and offers retirees a choice of medical plans, as well as two dental plans, and basic life insurance. The medical plans are either HMOs, PPOs or indemnity plans, and some are designed to work with Medicare benefits, such a Medicare supplement or Medicare HMO plans. The basic life insurance provides a \$5,000 death benefit to the retiree. Spouses and dependents are not eligible for this death benefit upon their death. To comply with the requirements of GASB 45, the Authority performed an actuarial valuation at January 1, 2013. The Authority issues publicly available audited financial statements for the Trust. The report may be obtained by writing to the Massachusetts Port Authority, Attn: John P. Pranckevicius, CPA, Director of Administration and Finance and Secretary-Treasurer, One Harborside Drive, Suite 200S, East Boston, MA 02128-2909. These statements are prepared on the accrual basis of accounting. Employer contributions are recognized when the employer has made formal commitments to provide the contributions and benefits are recorded when due and payable in accordance with the terms of the Trust. Investments are reported at fair value. Mutual funds and commingled funds are valued based on net asset or unit value at year-end. No long term contracts for contributions to the Trust existed at June 30, 2014 or 2013.

b) Annual OPEB Costs and Net OPEB Obligation

The Authority's 2014 and 2013 OPEB expense is calculated based on the ARC, an amount actuarially determined in accordance with the parameters of GASB 45. The ARC represents a level of funding that, if paid on an ongoing basis, is projected to cover the normal cost each year and amortize the unfunded actuarial liability over a period of thirty years. The following table shows the components of the Authority's annual OPEB cost for the years ending June 30, 2014, 2013 and 2012, the amount actually contributed to the plan, and the change in the Authority's net OPEB obligation based on an actuarial valuation as of January 1, 2013 (in thousands).

	2014	2013	2012
Annual Required Contribution (ARC) \$	14,738 \$	14,006 \$	18,444
Interest on net OPEB obligation	(3,989)	(3,265)	(3,032)
Adjustment to ARC	3,391	2,709	2,438
Annual OPEB cost	14,140	13,450	17,850
Current premiums on a pay-as-you-go basis	_		
Subsidy	2,370	2,254	2,335
Contributions made	14,000	20,851	13,807
Change in net OPEB	_		_
obligation	2,230	9,655	(1,708)
Net OPEB Asset – beginning of year	53,188	43,533	45,241
Net OPEB Asset – end of year \$	55,418 \$	53,188 \$	43,533
% of Annual OPEB cost contributed	99.0%	155.0%	77.4%

Notes to Financial Statements June 30, 2014 and 2013

c) Funded Status and Funding Progress

The funded status of the plan, based on an actuarial valuation as of January 1, 2013, was as follows (in thousands):

Actuarially accrued liability ("AAL")	\$ 224,488
Actuarial value of plan assets	 105,622
Unfunded actuarial accrued liability ("UAAL")	\$ 118,866
Funded ratio (actuarial value of plan assets/AAL)	47.1%
Covered payroll (active plan members)	\$ 95,400
UAAL as a percentage of covered payroll	124.6%

Actuarial valuations of an ongoing plan involve estimates of the value of reported amounts and assumptions about the probability of occurrence of events far into the future. Examples include assumptions about future employment, mortality, and the healthcare cost trend. Amounts determined regarding the funded status of the plan and the annual required contributions of the Authority are subject to continual revision as actual results are compared with past expectations and new estimates are made about the future. The schedule of funding progress, presented as required supplementary information following the notes to the financial statements, presents multi-year trend information that shows whether the actuarial value of plan assets is increasing or decreasing over time relative to the actuarial accrued liabilities for benefits.

d) Actuarial Methods and Assumptions

Projections of benefits for financial reporting purposes are based on the plan as understood by the Authority and the plan members and include the types of benefits provided at the time of each valuation and the historical pattern of sharing of benefit costs between the Authority and Plan members. The actuarial methods and assumptions used include techniques that are designed to reduce short-term volatility in actuarial accrued liabilities and the actuarial value of assets, consistent with the long-term perspective of the calculations.

The January 1, 2013 actuarial valuation used the projected unit credit cost method. The actuarial value of plan assets was \$105.6 million. The actuarial assumptions included a 7.50% investment rate of return and an initial annual healthcare cost trend rate range of 9.0% which decreases to a 5.0% long-term trend rate for all healthcare benefits after ten years. The amortization costs for the initial UAAL is a level percentage of payrolls for a period of 30 years, on a closed basis. At June 30, 2013, 25 years are remaining to be amortized. This has been calculated assuming an inflation rate of 3.25%.

Notes to Financial Statements June 30, 2014 and 2013

8. Leases

a) Commitments

The Authority has commitments under various operating leases, which contain escalation clauses, as lessee. The following is a schedule by years of minimum rental payments under noncancelable operating leases as of June 30, 2014 (in thousands):

Years	 Amount	Years	Amount
2015	\$ 26,353	2035 - 2039	\$ 4,436
2016	25,511	2040 - 2044	4,436
2017	25,511	2045 - 2049	4,436
2018	14,670	2050 - 2054	4,436
2019	8,385	2055 - 2059	4,436
2020 - 2024	7,013	2060 - 2064	4,436
2025 - 2029	4,436	2065 - 2069	4,436
2030 - 2034	4,436	2070	 567
		Total	\$ 147,934

Rent expense and other operating lease related payments were \$30.3 million and \$28.0 million for fiscal years 2014 and 2013, respectively.

b) Rental Income

The Authority leases a major portion of its Aviation and Port properties to various tenants. Many of these operating leases provide for periodic adjustments to rental rates, including certain provisions for contingent payments based on specified percentages of the tenant's gross revenue.

Notes to Financial Statements June 30, 2014 and 2013

The following is a schedule by years of minimum future rental income on noncancelable operating leases as of June 30, 2014 (in thousands):

Years	 Amount	Years	 Amount
2015	\$ 95,420	2050 - 2054	\$ 46,960
2016	59,478	2055 - 2059	47,140
2017	53,428	2060 - 2064	49,007
2018	49,143	2065 - 2069	49,521
2019	46,126	2070 - 2074	51,618
2020 - 2024	194,587	2075 - 2079	52,231
2025 - 2029	135,108	2080 - 2084	52,217
2030 - 2034	96,148	2085 - 2089	41,038
2035 - 2039	86,987	2090 - 2094	39,303
2040 - 2044	90,647	2095 - 2099	25,792
2045 - 2049	69,291	2100 - 2104	3,217
		2105 - 2107	1,052
		Total	\$ 1,435,459

Rental income and concession income, including contingent payments received under these provisions, were approximately \$282.3 million and \$257.3 million for the fiscal years 2014 and 2013, respectively.

9. Risk Management

The Authority, as mandated by the 1978 Trust Agreement, maintains a self insurance account for general liability and workers compensation within the Operating Fund. The self insurance accruals are determined based on insurance claim history and actuarial estimates needed to pay prior and current-year claims. The accrued liability was approximately \$8.0 million and \$7.3 million as of June 30, 2014 and 2013, respectively, and is included as a component of accrued expenses in the accompanying financial statements. This liability is fully funded as of June 30, 2014 and 2013.

Changes in the accrued liability accounts, related to self insurance, in fiscal year 2014 and 2013 were as follows (in thousands):

			2013		
Liability balance, beginning of year	\$	7,253	\$	6,843	
Provision to record estimated losses		3,552		1,279	
Payments		(2,790)	_	(869)	
Liability balance, end of year	\$	8,015	\$	7,253	

Notes to Financial Statements June 30, 2014 and 2013

As part of its normal operations, the Authority encounters the risk of accidental losses stemming from third party liability claims, property loss or damage, and job related injuries and illnesses. In managing these loss exposures, a combination of risk management measures is applied, including safety and loss prevention programs, emergency planning, contractual risk transfer, self insurance, and insurance.

In connection with the self insurance and insurance programs, the Authority retains part of the losses incurred and internally manages the self insured claims. The self insured retention currently includes: \$1.0 million for worker's compensation per job related accident for Massport employees and ILA Members \$1,000 per occurrence for automobile liability; aviation general liability and airport terrorism insurance, \$0.25 million for airside incidents and for non-airside auto losses; \$25 thousand for Comprehensive Marine Liability, Terminal Operator's Liability, Stevedore's liability and \$0.25 million for property losses per occurrence. Insurance is purchased above the self-insured amounts, subject to availability and the reasonableness of cost. Liabilities for self-insured claims are reported if it is probable that a loss has been incurred and the amount can be reasonably estimated. These losses include an estimate of claims that have been incurred but not reported at year-end and are based on the historical cost of settling similar claims. The Authority records such liabilities as accrued expenses. The Authority from time to time is engaged in various matters of routine litigation. These matters include personal injury and property damage claims for which the Authority's liability is covered in whole or in part by insurance. The Authority does not expect that these matters will require any amounts to be paid which in the aggregate would materially affect the financial statements.

Settled claims resulting from the risks discussed above have not exceeded the amount of insurance coverage in force in any of the past three fiscal periods. Further, insurance maintained in fiscal years 2014 and 2013 has not changed significantly from prior periods.

10. Payments in Lieu of Taxes

The Authority's Enabling Act, the 1978 Trust Agreement and the PILOT Agreements authorize and directs the Authority, subject to certain standards and limitations, to enter into agreements (collectively, the "PILOT Agreements") to make annual payments in lieu of taxes to the City of Boston and the Town of Winthrop.

The PILOT Agreements provide that annual payments may not exceed the balance of revenues remaining after deposits to pay operating expenses, required deposits to the Interest and Sinking Fund and required deposits to the Maintenance Reserve Fund.

Pursuant to the terms of the amended Boston PILOT Agreement (the "Amended Boston PILOT Agreement"), the term of the Amended Boston PILOT Agreement terminates on June 30, 2020 subject to (1) mutual rights annually to terminate the Amended PILOT Agreement and (2) automatic one year extensions of the term each July1. The Amended Boston PILOT Agreement provides for the Authority to pay (i) an annual base amount (the "Base Amount") of \$14 million, which, commencing in fiscal year 2007, increases annually by the annual percentage change in the consumer price index, provided that such increase shall be no less than 2%, nor greater than 8%, per year, and (ii) for ten years, an amount of \$700,000, which shall not be increased or adjusted.

Notes to Financial Statements June 30, 2014 and 2013

In fiscal year 2006, the Authority and the Town of Winthrop entered into an Amended and Restated Payment-In-Lieu-Of-Taxes Agreement (the "Amended Winthrop PILOT Agreement"), which extended the base in-lieu-of-tax payments through fiscal year 2025. The Amended Winthrop PILOT Agreement provides for the Authority to make an annual payment of \$900,000, which will be adjusted in fiscal years 2016 through 2025 if the average annual percentage change in the consumer price index in fiscal year 2006 through 2015 is less than 2% or more than 8%.

PILOT payments to the City of Boston for fiscal year 2014 and 2013 were \$17.5 million and \$17.2 million, respectively. PILOT payments to the Town of Winthrop for fiscal year 2014 and 2013 were \$0.9 million for each year.

11. Commitments

a) Contractual Obligations for Construction

The Authority enters into construction contracts with various construction and engineering companies. Construction contracts outstanding were approximately \$265.2 million and \$296.9 million as of June 30, 2014 and 2013, respectively.

b) Seaport Bond Bill

The Seaport Bond Bill was enacted in 1996 and among other things, provides for funding improvements to the Massachusetts rail transportation network allowing rail shipment of double stack cargo from Allston Yards in Boston to points west, which is anticipated to encourage expanded container shipments through the Port of Boston. The Seaport Bond Bill requires that the Authority provides up to fifty percent (50%) of the cost of improvements to the rail line from Framingham to the Allston Yard in Boston permitting double stack shipments. Expenditure of funds will not occur until the execution of a Master Agreement, as defined by the statute, between the Commonwealth and the participating railroads. The Authority believes that the likelihood that any such Master Agreement will be executed and Authority funds committed for double stack improvements within the next fiscal year is remote.

12. Litigation

a) Events of September 11, 2001

The Authority has been engaged in routine litigation as well as litigation involving the terrorist attacks of September 11, 2001.

On September 11, 2001, terrorists hijacked American Airlines flight 11 and United Airlines flight 175 and flew them into the World Trade Center in New York, N.Y. The terrorist acts caused the deaths of approximately 3,000 persons, unknown numbers of personal injuries, and massive property damage. Both flights originated at Logan Airport.

In September 2001, Congress passed the Air Transportation Safety and System Stabilization Act of 2001 ("ATSSSA"), which provides, among other things, a limitation on liability of various entities, including airport sponsors such as the Authority, for the events of 9/11. Specifically, the liability of an airport sponsor for those events "shall not be in an amount greater than the limits of liability insurance coverage maintained by that . . . airport sponsor". The Authority has insurance in effect to

Notes to Financial Statements June 30, 2014 and 2013

cover these incidents in the amount of \$500.0 million per occurrence and consequently, under ATSA the Authority's liability, if any, would be limited to such amounts. To the Authority's knowledge, the Authority's insurer has received copies of all complaints and Notices of Claim and/or any other form of notification to the Authority by an individual or entity claiming to have suffered a loss.

Furthermore, to the Authority's knowledge, its insurer has agreed to defend any such claims and has not reserved its rights to deny coverage with respect to any of those claims although the insurer has reserved its rights with respect to (i) the number of occurrences, (ii) indemnification of the Authority against any award of punitive damages, and (iii) the Authority's rights as a named additional insured under other policies of insurance, including policies of the Authority's tenants and licensees.

On July 18, 2013, the Authority was dismissed from the remaining property damage lawsuits, both brought by the World Trade Center Properties, LLC, ("WTC Properties"). WTC Properties has appealed this ruling. All other wrongful death and property damage lawsuits against the Authority and other defendants have been settled or dismissed. These settlements have been achieved without any financial contribution from the Authority or its insurer, even though the settling plaintiffs have provided the Authority with a release of all claims related to the events of 9/11.

b) Environmental Contamination

The Authority is currently involved in six separate pollution remediation obligations that meet the requirements for accounting treatment under GASB Statement No. 49, *Accounting and Financial Reporting for Pollution Remediation Obligations* ("GASB No. 49"). These obligations are generally related to the removal and/or treatment of contaminated soil, groundwater and petroleum products associated with fuel storage and conveyance. GASB 49 dictates that for each obligating event, an estimate of the expected pollution remediation outlays is required to be accrued as a liability and expensed in the current period. Re-measurement of the liability is required when new information indicates increases or decreases in estimated outlays.

The estimated liability as of June 30, 2014 and 2013 is \$7.2 million and \$3.9 million, respectively, which represents the approximate amounts the Authority expects to pay for future remediation activities. The Authority paid approximately \$0.3 million and \$0.7 million in fiscal years 2014 and 2013, respectively. This estimate was generated using input and guidance from internal management and professional consultants, and represents a wide array of remediation activities ranging from onetime events to longer-term sustained monitoring activity. The Authority will continue to closely monitor each of these obligations, working toward regulatory closure, and will make any necessary adjustments to the potential liability as new information becomes available.

c) Other Litigation

The Authority also is engaged in numerous matters of routine litigation. These matters include personal injury and property damage claims for which the Authority's liability is covered in whole or in part by insurance. Others include such matters as disputes with contractors, subcontractors, engineers and others arising out of construction and maintenance of the Authority's properties; disputes over leases and concessions; property, theft and damage claims arising from the Authority's operations, employment matters and workers compensation, as to which the Authority is self-insured. The Authority does not expect that these matters will require any amounts to be paid which, in the aggregate, will be material to the results of operations.

Notes to Financial Statements June 30, 2014 and 2013

13. Interagency Agreements

a) Investment in Joint Venture

In May 1996, the Authority entered into an interagency agreement with the Massachusetts Highway Department ("MHD") and Massachusetts Bay Transportation Authority ("MBTA") for the construction of a Regional Transportation Center ("RTC") in Woburn, Massachusetts ("Interagency Agreement"). Under the terms of the Interagency Agreement, the Authority has paid one third of the costs of acquiring the site and constructing the RTC, and will share in a like proportion in the profits and losses of the RTC. During fiscal years 2014 and 2013, the Authority recognized income of approximately \$0.1 million in each year, representing its share of the earnings of the RTC.

b) Logan Airport Silver Line Transportation Agreement

The Authority entered into an agreement with the MBTA to provide public transportation between South Station in Boston, Massachusetts and Logan Airport along a route called the Silver Line.

Pursuant to this agreement the Authority has purchased and accepted delivery of eight buses for a cost of \$13.3 million.

In addition, the MBTA and the Authority have entered into a ten year agreement ending on December 30, 2015. Under this agreement, the MBTA will operate and maintain the Authority's Silver Line buses for a cost of \$2.0 million per year, paid in equal monthly installments.

14. Subsequent Events

a) Bond issue

On July 17, 2014, the Authority issued \$249.8 million of Massachusetts Port Authority Revenue Bonds in three series. The Series 2014 A Revenue Bonds were issued in the principal amount of \$45.5 million with an original issue premium of approximately \$5.6 million and coupon rates ranging from 2.0% to 5.0%. The projects financed with Series A bond proceeds include a structured garage at the Framingham Logan Express site and roadways that provide access from the terminals to the Airport MBTA Station and the Rental Car Facility.

The Series 2014 B Revenue Bonds were issued in the principal amount of \$48.2 million with an original issue premium of approximately \$4.8 million and coupon rates ranging from 4.0% to 5.0%. The projects financed with Series B bond proceeds include electrical substation replacement for Terminals B and E, a post-security corridor between Terminals C and E, and the demolition of an obsolete hangar to create remain overnight aircraft parking spaces.

Notes to Financial Statements June 30, 2014 and 2013

The Authority also issued the Series 2014 C Revenue Refunding Bonds in the principal amount of \$156.1 million with an original issue premium of approximately \$32.2 million and coupons ranging from 2.0% to 5.0%. The aggregate difference in debt service between the refunded 2003 A, 2003 C and the 2005A bonds and the refunding bonds was \$23.6 million. This refunding had an economic gain and achieved a net present value savings of \$17.1 million or 10.04%. The average annual savings for fiscal year 2015 through fiscal year 2035 was approximately \$1.126 million.

b) Approval of the FY 2013 PFC Application

On August 13, 2014, the FAA approved Logan's application for the collection and use of \$100.0 million in PFCs for improvements at Terminal B, the acquisition of land in a runway protection zone, and the Light Pier at the end of runway 33L. This Final Agency Decision brings the Authority's PFC collection authority to a total of \$1,452.0 million for Logan.

c) Litigation

On July 2, 2014, the Authority was served with a lawsuit (the "Lawsuit") in which the Authority is the named defendant. The Lawsuit arises out of the Authority's taking by eminent domain on January 6, 2014 of the property commonly referred to as the Logan Express parking and shuttle facility in Braintree, MA (the "Property") for which the Authority paid what it determined was just compensation. The Lawsuit claims that the Authority failed to award just compensation to the former owner Tara Investment Holdings LLC f/k/a The Flatley 06 LLC for the Property.

Required Supplementary Information

Schedule of Pension Funding Progress / OPEB Funding Progress

June 30, 2014

(In thousands)

Schedule of Pension Funding Progress

(1) Actuarial valuation date		(2) Actuarial value of plan assets	(3) Actuarial accrued liability (AAL)	(4) (Overfunded) unfunded (UAAL) AAL(2) – (3)	(5) Actuarial value of assets as a percentage of AAL (funded ratio) (2)/(3)	(6) Annual covered payroll	(7) (UAAL) AAL as a percentage of covered payroll (4)/(6)
1/1/2013	- \$	433,408	457,937	24,529	94.6% \$	86,730	28.3%
1/1/2012		422,999	436,468	13,469	96.9	84,045	16.0
1/1/2011		420,801	419,272	(1,529)	100.4	82,541	(1.9)
1/1/2010		410,469	407,857	(2,612)	100.6	86,438	(3.0)
1/1/2009		342,953	327,829	(15,124)	104.6	85,944	(17.6)
1/1/2008		396,930	387,223	(9,707)	102.5	81,120	(12.0)
1/1/2007		368,346	357,507	(10,839)	103.0	76,835	(14.1)

Schedule of OPEB Funding Progress

(1) Actuarial valuation date	(2) Actuarial value of plan assets	(3) Actuarial accrued liability (AAL)	(4) (Overfunded) unfunded (UAAL) AAL(2) – (3)	(5) Actuarial value of assets as a percentage of AAL (funded ratio) (2)/(3)	(6) Annual covered payroll	(7) (UAAL) AAL as a percentage of covered payroll (4)/(6)
1/1/2013	\$ 105,622	224,488	118,866	47.1% \$	95,400	124.6%
1/1/2011	76,693	237,462	160,769	32.3	95,400	168.5
6/30/2009	48,931	219,619	170,688	22.3	95,749	178.3
7/01/2006	-	167,521	167,521	-	87,630	191.2

Analysis of the dollar amounts of net assets available for benefits, Actuarial Accrued Liability (AAL), and assets in excess of AAL in isolation can be misleading. Expressing the Actuarial Value of Assets available for benefits as a percentage of the AAL provides one indication of the Plan's funding status on a going-concern basis. Analysis of this percentage over time indicates whether the Plan is AAL and annual covered payroll are both affected by inflation. Expressing the AAL in excess of assets as a percentage of annual covered payroll approximately adjusts for the effects of inflation and aids analysis of progress made in accumulating sufficient assets to pay benefits when due. Generally, the lower this percentage, the stronger the Plan.

The comparability of trend information is affected by changes in actuarial assumptions, benefit provisions, actuarial funding methods, accounting policies, the size or composition of the population covered by the Plan, and other changes. Those changes usually affect trends in contribution requirements and in ratios that use the AAL as a factor.

Combining Schedule of Net Position June 30, 2014 (In thousands)

Assets and Deferred Outflows		Authority Operations		PFC Program		CFC Program	Eliminations	Combined Totals
Current assets:								
Cash and cash equivalents	\$	41,696	\$	_	\$	_	\$ —	\$ 41,696
Investments		35,020		_		_	_	35,020
Restricted cash and cash equivalents		122,206		32,426		25,411	_	180,043
Restricted investments		162,847		2,746		4,001	_	169,594
Accounts receivable								
Trade, net		48,058		8,678		3,100	_	59,836
Grants	_	28,602	_		_	971		 29,573
Total receivables, net		76,660		8,678		4,071	_	89,409
Prepaid expenses and other assets		6,954		139		57	_	7,150
Interfund transfer Authority Loan	_	10,052	_		_		(10,052)	
Total current assets		455,435		43,989		33,540	(10,052)	522,912
Noncurrent assets:								
Investments		66,587		_		_	_	66,587
Restricted investments		231,641		24,863		29,985	_	286,489
Prepaid expenses and other assets, long-term		5,855		205		1,258	_	7,318
Investment in joint venture		2,263		_		_	_	2,263
Net OPEB asset		55,418		_		_	_	55,418
Capital assets, net	_	2,180,246	_	430,154	_	290,244		 2,900,644
Total noncurrent assets	_	2,542,010	_	455,222	_	321,487		 3,318,719
Total assets	_	2,997,445	_	499,211	_	355,027	(10,052)	 3,841,631
Deferred outflows of resources								
Deferred loss on refunding of bonds	_	19,108	_	909	_			 20,017
Total deferred outflows of resources	_	19,108	_	909	_			 20,017
Liabilities								
Current liabilities:		05.252				7.242		100 514
Accounts payable and accrued expenses		95,372		_		7,342	_	102,714
Compensated absences		1,483		_			_	1,483
Contract retainage		9,308				3,253	_	12,561
Current portion of long-term debt		62,219		19,237		3,209	_	84,665
Commercial notes payable		150,000		_			(10.050)	150,000
Interfund transfer Authority Loan						10,052	(10,052)	
Accrued interest payable		26,708		2,718		5,878	_	35,304
Unearned revenues	_	5,217	_	21.055	_	2 20.734	(10.050)	 5,219
Total current liabilities		350,307		21,955		29,736	(10,052)	391,946
Noncurrent liabilities		10.540		200		67.4		10.604
Accrued expenses		18,542		388		674	_	19,604
Compensated absences		18,974					_	18,974
Long-term debt, net		1,204,187		93,891		203,725	_	1,501,803
Unearned revenues	_	8,982	_		_			 8,982
Total noncurrent liabilities	-	1,250,685	_	94,279	_	204,399		 1,549,363
Total liabilities	_	1,600,992	_	116,234		234,135	(10,052)	 1,941,309
Net Position		700 102		217.025		110.221		1 227 250
Invested in capital assets		790,102		317,935		119,321	_	1,227,358
Restricted for other purposes		201.754						201.754
Bond funds		201,754		_		_	_	201,754
Project funds		214,772				_	_	214,772
Passenger facility charges		_		65,951			_	65,951
Customer facility charges				_		1,571	_	1,571
Other purposes	_	25,472	_		_			 25,472
Total restricted		441,998		65,951		1,571	_	509,520
Unrestricted		183,461		_		_	_	183,461
Total net position	\$	1,415,561	\$	383,886	\$	120,892	\$	\$ 1,920,339

Combining Schedule of Revenues, Expenses, and Changes in Net Position Year ended June 30, 2014 (In thousands)

	Authority Operations		PFC Program	CFC Program	<u> </u>	Combined Totals
Operating revenues:						
Fees, tolls and other services \$	308,468	\$	— \$	_	\$	308,468
Rentals	204,380	Ψ	—	_	Ψ	204,380
Concessions	77,873		_	_		77,873
Other	27,874		_	_		27,874
Operating grants	3,876		_	_		3,876
Total operating revenues	622,471			_	-	622,471
	- , .				-	
Operating expenses:	206244					206244
Operations and maintenance	296,344		_	_		296,344
Administration	54,151		_	_		54,151
Insurance	9,001		_	_		9,001
Pension	11,990		_	_		11,990
Other post-employment benefits	14,140		_	_		14,140
Payments in lieu of taxes	18,444		_	_		18,444
Provision for uncollectible accounts	453		_	_		453
Depreciation and amortization	164,067		40,956	12,744		217,767
Total operating expenses	568,590		40,956	12,744	_	622,290
Operating income (loss)	53,881		(40,956)	(12,744)		181
Nonoperating revenues and (expenses):						
Passenger facility charges	_		62,682	_		62,682
Customer facility charges	_		_	29,963		29,963
Investment income	5,127		1,098	417		6,642
Net increase (decrease) in the fair value of investments	1,794		(74)	256		1,976
Other revenues	10,534		_	13		10,547
Settlement of claims	1,792		_	_		1,792
Terminal A debt service contribution			(11,839)	_		(11,839)
Other expenses	_		(11,057)	(1,407)		(1,407)
Gain on sale of equipment	90		_	(1,107)		90
Interest expense	(51,154)		(6,100)	(7,719)		(64,973)
Total nonoperating (expense) revenue, net	(31,817)		45,767	21,523	_	35,473
Increase in net position before capital grant revenue	22,064		4,811	8,779		35,654
Capital grant revenue	53,579		_	2,545		56,124
Increase in net position	75,643		4,811	11,324	_	91,778
Net position, beginning of year	1,339,918	_ =	379,075	109,568	_	1,828,561
Net position, end of year \$	1,415,561	\$	383,886 \$	120,892	\$	1,920,339

Combining Schedule of Net Position June 30, 2013 (In thousands)

Assets and Deferred Outflows	Authority Operations	PFC Program	CFC Program	Combined Totals
Current assets:				
Cash and cash equivalents	\$ 45,651 \$	— \$	— \$	45,651
Investments	27,976	_	_	27,976
Restricted cash and cash equivalents	131,592	30,137	35,920	197,649
Restricted investments	131,766	8,994	20,023	160,783
Accounts receivable				
Trade, net	42,215	8,459	3,646	54,320
Grants	6,536		578	7,114
Total receivables, net	48,751	8,459	4,224	61,434
Prepaid expenses and other assets	9,886	137	55	10,078
Total current assets	395,622	47,727	60,222	503,571
Noncurrent assets:				
Investments	91,827	_	_	91,827
Restricted investments	285,550	27,945	29,361	342,856
Prepaid expenses and other assets, long-term	7,800	347	1,317	9,464
Investment in joint venture	2,137	_	_	2,137
Net OPEB asset	53,188	_	_	53,188
Capital assets, net	2,085,648	436,961	247,056	2,769,665
Total noncurrent assets	2,526,150	465,253	277,734	3,269,137
Total assets	2,921,772	512,980	337,956	3,772,708
Deferred outflows of resources				
Deferred loss on refunding of bonds	20,664	1,183		21,847
Total deferred outflows of resources	20,664	1,183		21,847
Liabilities				
Current liabilities:				
Accounts payable and accrued expenses	95,519	12	7,212	102,743
Compensated absences	1,550	_	_	1,550
Contract retainage	8,092			8,092
Current portion of long-term debt	60,247	18,389	3,134	81,770
Commercial notes payable	100,000			100,000
Accrued interest payable	27,572	3,117	5,898	36,587
Unearned revenues	6,054	21.510	16244	6,054
Total current liabilities	299,034	21,518	16,244	336,796
Noncurrent liabilities	15.55	200		10.112
Accrued expenses	17,754	389	_	18,143
Compensated absences	19,873	_		19,873
Contract retainage	275		5,210	5,485
Long-term debt, net	1,254,754	113,181	206,934	1,574,869
Unearned revenues	10,828	112.570		10,828
Total current liabilities	1,303,484	113,570	212,144	1,629,198
Total liabilities	1,602,518	135,088	228,388	1,965,994
Net Position	720.204	206 574	05.710	1 121 577
Invested in capital assets	739,284	306,574	85,719	1,131,577
Restricted for other purposes	105.010			105.010
Bond funds	185,018	_	_	185,018
Project funds	208,948	72 501	_	208,948
Passenger facility charges	_	72,501		72,501
Customer facility charges	25.142	_	23,849	23,849
Other purposes	25,142	70.501		25,142
Total restricted	419,108	72,501	23,849	515,458
Unrestricted	181,526			181,526
Total net position	\$ 1,339,918 \$	379,075 \$	109,568 \$	1,828,561

Combining Schedule of Revenues, Expenses, and Changes in Net Position Year ended June 30, 2013 (In thousands)

	_	Authority Operations		PFC Program	_	CFC Program	_	Combined Totals
Operating revenues:								
Fees, tolls and other services	\$	289,384	\$	_	\$	_	\$	289,384
Rentals		184,744		_		_		184,744
Concessions		72,542		_		_		72,542
Other		22,515		_		_		22,515
Operating grants	_	2,638			_		_	2,638
Total operating revenues	_	571,823			_		_	571,823
Operating expenses:								
Operations and maintenance		272,611		_		_		272,611
Administration		48,950		_		_		48,950
Insurance		8,020		_		_		8,020
Pension		9,614		_		_		9,614
Other post-employment benefits		13,450		_		_		13,450
Payments in lieu of taxes		18,090		_		_		18,090
Provision for uncollectible accounts		(353)		_		_		(353)
Depreciation and amortization	_	159,980		38,704	_	362	_	199,046
Total operating expenses	_	530,362		38,704	_	362	_	569,428
Operating income (loss)	_	41,461		(38,704)	_	(362)	_	2,395
Nonoperating revenues and (expenses):								
Passenger facility charges		_		60,105		_		60,105
Customer facility charges		_				29,354		29,354
Investment income		6,447		1,118		771		8,336
Net (decrease) increase in the fair value of investments		(2,511)		189		(499)		(2,821)
Other revenues		187						187
Settlement of claims		567		_		_		567
Terminal A debt service contribution		_		(12,114)		_		(12,114)
Other expenses		(73)		(192)		(1,014)		(1,279)
Loss on sale of equipment		(64)		`—		` — ´		(64)
Interest expense		(54,657)		(6,167)		(247)		(61,071)
Total nonoperating (expense) revenue, net	_	(50,104)		42,939		28,365		21,200
(Decrease) increase in net position before capital grant revenue		(8,643)		4,235		28,003		23,595
Capital grant revenue	_	19,656			_	578	_	20,234
Increase in net position		11,013		4,235		28,581		43,829
Net position, beginning of year		1,328,905		374,840		80,987		1,784,732
Net position, end of year	\$	1,339,918	- \$		\$	109,568	\$	1,828,561
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Report

Boston Logan International Airport Market Analysis

June 18, 2015

Submitted to:

Massachusetts Port Authority

Submitted by:

ICF International 100 Cambridgepark Drive, Suite 501 Cambridge, MA 02140 (THIS PAGE INTENTIONALLY LEFT BLANK)





June 18, 2015

Massachusetts Port Authority One Harborside Drive, Suite 200S East Boston, MA 02128-2909

Re:

Boston Logan International Airport

Market Analysis

Dear Members of the Authority:

This study includes an analysis of the underlying economic basis for air travel demand at Logan International Airport ("Logan Airport" or "the Airport") and a review of current and long-term traffic and air service trends at the Airport. In this report, ICF also presents an overview of the current state of the U.S. aviation industry and the potential impact of disruption in service in the case of further airline mergers or airline liquidations. Finally this report provides a review and opinion of the Massachusetts Port Authority's aviation activity projections for Logan Airport.

The analysis used in this report is consistent with industry practices for similar studies in connection with airport bond issuances. ICF has relied on various published economic and aviation statistics, forecasts and information, in addition to statistics provided directly by the Massachusetts Port Authority. ICF believes that these sources are reliable; however, ICF's opinion could vary materially should some of these sources prove to be inaccurate.

ICF's opinions are based upon historical trends and expectations that it believes are reasonable. Some of the underlying assumptions, which are detailed explicitly or implicitly in this report, may or may not materialize because of unanticipated events or circumstances. ICF's opinions could vary materially should any key assumption prove to be inaccurate.

Sincerely,

ICF International

ICF International

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TABLE OF ACRONYMS

Acronym	Definition	
ASM	Available Seat Miles	
CAGR	Compound Annual Growth Rate	
CASM	Cost per Available Seat Mile	
CY	Calendar Year	
GA	General Aviation	
LCC	Low Cost Carrier	
O&D	Origin and Destination	
RASM	Revenue per Available Seat Mile	
RJ	Regional Jet	
RPM	Revenue Passenger Miles	
TAF	Terminal Area Forecast	
ULCC	Utra Low Cost Carrier	



GLOSSARY

Term	Definition
Ancillary Revenue	Non-fare related revenue including fees for baggage, reservations and cancellations, early boarding, premium seating, onboard retail and hotel and car rental commissions.
Large hub	Airports that enplane at least one percent of total U.S. air passengers (FAA).
Large jet	Jet aircraft over 90 seats (FAA).
Low cost carrier (LCC)	The opposite of a network carrier, an LCC typically offers fewer amenities and lower fares; often minimizes the number of aircraft types operated in order to lower costs. In the U.S., there are four LCCs in operation: JetBlue, Southwest Airlines, Sun Country and Virgin America.
Major carrier	Major airlines are defined by the U.S. DOT as those exceeding \$1 billion per year in revenue and include Allegiant Air, American/US Airways, Alaska Airlines, Delta Air Lines, Frontier Airlines, Hawaiian Airlines, JetBlue, Southwest Airlines, Spirit Airlines, United Airlines and Virgin America.
Network carrier (or full service)	A carrier that operates a hub-and-spoke route structure with more amenities included than low cost carriers; typically offers multiple classes of service (e.g., economy, business, first). Also known as a "legacy carrier". In the U.S., American, Delta, United, Alaska and Hawaiian are considered to be network carriers.
Regional carrier	Carriers operating smaller piston, turboprop, and regional jet aircraft (up to 90 seats) to provide connecting passengers to the larger carriers (FAA).
Ultra-low cost carrier	A carrier operating a business model with extreme unbundling of services. The purchase of a ticket on an ULCC covers only the seat and (depending on the carrier) does not include seat choice, food or drink, checked or carry-on luggage, or a paper boarding pass - all amenities available for additional a la carte purchase. In this report, three ULCCs are discussed: Allegiant Air, Frontier Airlines and Spirit Airlines.
Yield	Passenger ticket revenue per seat mile, excluding fees paid for ancillary products and services.



1. INTRODUCTION AND KEY FINDINGS

1.1 Introduction

The Massachusetts Port Authority ("Massport" or the "Authority") retained ICF International ("ICF") to perform a market analysis of the Boston Logan International Airport ("Logan" or "Logan Airport" or the "Airport") in connection with the issuance by Massport of its Revenue Bonds, Series 2015-A (Non-AMT) and Series 2015-B (AMT) (collectively, the "Series 2015 Bonds").

This study includes an analysis of the underlying economic basis for air travel demand at Logan Airport and a review of current and long-term traffic and air service trends at the Airport. In this market analysis, ICF also presents an overview of the current state of the U.S. aviation industry and the potential implications for Logan. In addition, ICF presents its review and opinion of Massport's aviation projections for Logan Airport.

ICF relied on information from a variety of published sources as the basis of this study, including data from the U.S. Department of Transportation ("DOT"), the Federal Aviation Administration ("FAA"), the Official Airline Guide ("OAG"), Innovata Airline Schedules ("Innovata") and industry information and surveys, as well as the financial records, airport planning documents and aviation activity records provided by Massport. Advance OAG schedules for July 2015, which were published on April 1, 2015, are used throughout this report. Historical trends for Logan, other large hub U.S. airports and the U.S. are generally reported through calendar year ("CY") 2014. All years throughout this report are on a calendar year basis unless otherwise stated. Some analyses rely on the latest available data from the U.S. DOT Origin-Destination ("O&D") Passenger Survey (available through CY 2014), the U.S. DOT T-100 Database for U.S. flag airlines (available through CY 2014), and the U.S. DOT Form 41 database (available through third quarter 2014). For sources where fourth quarter 2014 data was not available, the data are reported for the four quarters ended 3Q 2014 ("YE 3Q 2014" or "YE3Q14"). Airport activity data that includes foreign flag airlines is reported for the 12 months ended September 2014, as September 2014 was the most recent data available for foreign flag carriers in the U.S. DOT T-100 database when this report was prepared.

As part of this study, ICF did not evaluate, and does not offer an opinion on, the feasibility of the engineering, design plans or costs of any of the projects expected to be financed with the Series 2015 Bonds. ICF did not engage in a legal review of lease agreements or engineering contracts.

ICF's opinions are based upon historical trends and expectations that it believes are reasonable. Some of the underlying assumptions, which are detailed explicitly or implicitly elsewhere in this report, may or may not materialize because of unanticipated events or circumstances. ICF's opinions could vary materially should any key assumption prove to be inaccurate.

The opinions expressed herein are not given as an inducement or endorsement for any financial transaction. This report reflects ICF's expert opinion and best judgment based on the information



available to it at the time of its preparation. ICF does not have, and does not anticipate having, any financial interest in this transaction.

1.2 Key Findings

Logan Airport Strengths

- 31.6 million passengers in CY 2014 (representing a 4.7 percent increase over CY 2013); and the 18th busiest U.S. airport.
- Consistently one of the top five domestic U.S. origin-destination ("O&D") markets with approximately 95 percent O&D passengers.
- Large passenger fare base as the 7th ranked US airport in terms of revenue to the carriers in CY 2014.¹
- Key focus city for JetBlue, the leading airline at the Airport in terms of passengers in CY 2014.
- Strong based Low Cost Carrier ("LCC") service, which has been fueling growth in domestic seat capacity.
- Because of its geographic location in the Northeast, its large O&D base and the lack of a connecting hub operation, Logan is a highly competitive market and is not dominated by a single airline.
- Proven ability to manage gate utilization through a preferential gate use policy that applies to all gates, the use of short-term leases and effective recapture and sublet provisions in its leases.

Boston Market Fundamentals

- The 10th most populated metro area in the nation in 2014.²
- A high-income population area, with an average per capita income in 2013 that was 31 percent higher than the national average.³ This per capita wealth advantage is expected to continue at least through 2030.⁴
- A well-diversified, travel intensive regional economic base with core industries including high technology, biotechnology and pharmaceuticals, health care, financial services, higher education and tourism.

⁴ Woods & Poole Economics.



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¹ U.S. DOT, O&D Database, Database Products.

² Source: United States Census Bureau, *Annual Estimates of the Resident Population of Metropolitan and Micropolitan Statistical Areas: April 1, 2010 to July 1, 2014*, (for the Boston-Cambridge-Newton, MA-NH Metropolitan Statistical Area).

³ Woods & Poole Economics. For the Boston Metro area. Latest data is for 2013 (estimated).

Aviation Activity and Service Trends

- Sustained long term average passenger growth. Despite periodic declines resulting from economic slumps, external shocks and short-term service disruptions, passenger traffic grew at an average annual rate of 1.4 percent from CY 1990 to CY 2014.
- Improving operational efficiency as airlines use larger average aircraft with higher load factors. Logan handled 337,000 (excluding general aviation) aircraft takeoffs and landings in CY 2014 compared to a high of 453,000 in CY 2000. As a result of the airlines greater focus on maintaining high load factors, the overall average passengers per operation climbed by more than 50% from 2000 to 2014 (from 61 to 93 passengers per operation).
- Significant expansion of international service with the arrival of new foreign-based carriers. New long range, fuel-efficient smaller widebody aircraft (such as the Boeing 787 and the newly introduced Airbus A350) have benefited Logan's international service. This trend will likely continue as Boston is the type of international market that these aircraft were designed to serve.
- Logan was the 7th largest U.S. gateway for transatlantic traffic as of YE 3Q 2014.

In summary, beyond some inevitable short-term disruptions, Logan has been relatively unaffected by recent U.S. airline mergers due to the underlying strengths of the Boston market. Logan Airport serves a market with a large O&D passenger base, above average income levels, a travel intensive economic base and attractiveness as a destination market.

Massport Activity Forecasts for Logan Airport

- Massport's financial forecast projects an average annual growth rate of 1.1 percent reaching 39.8 million in CY 2035, and its planning forecast projects an average annual passenger growth rate of 1.7 percent reaching 45.5 million in CY 2035.
- ICF's view is that these forecasts of growth for Logan represent a reasonable range of future activity at the Airport, given the maturity of the market, the uncertainty facing the airline industry and the past historical performance of the Airport.

1.3 Report Layout

Chapter 2 provides an overview of the U.S. aviation industry including recent trends; Chapter 3 sets the stage by discussing the demographic and economic environment in which Logan Airport operates; Chapter 4 provides a detailed description of airlines serving the Airport, their current service levels, passenger trends, as well as operations and cargo growth; and Chapter 5 presents and reviews Massport's planning and financial traffic forecasts.



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2. INDUSTRY OVERVIEW

2.1 Introduction

The U.S. airline industry posted its fourth consecutive year of profitability in 2014, continuing an upward trend after a long period of exceptional volatility. Major U.S. airlines⁵ earned a profit of \$14.5 billion in YE3Q 2014, up from \$10.7 billion in CY 2013⁶ despite a difficult operating environment. High fuel prices in the first half of the year, weak though strengthening economic growth, tepid market demand and extreme weather conditions made 2014 another challenging year for the airlines. Since the 2008-09 economic downturn, a combination of industry consolidation, airline capacity discipline, diversification of revenues through ancillary sources⁷ and aircraft fleet renewal have proven crucial in supporting carriers' profitability. Recent drops in fuel prices have boosted profitability for some carriers, but harmed other carriers that had utilized extensive hedging.

As airlines continue to fine-tune their business models, the outlook for U.S. carrier profitability in the near-term is positive. The International Air Transport Association ("IATA") forecasts North American carriers (of all sizes) will earn a profit of approximately \$13.2 billion in 2015.8 Nevertheless, fuel price volatility will remain one of the most significant challenges. With oil prices still resting under \$60 per barrel, the full year 2015 outlook is uncertain as it seems not to be a matter of *if* but *when* oil prices will start to rise.

U.S. carriers have continued to exercise significant capacity discipline in recent years by eliminating unprofitable routes and redundant services and rationalizing services at smaller hubs. In the face of high fuel prices and slow economic growth, airline emphasis has shifted from capturing market share to careful supply-and-demand route management. Carriers remained conservative on capacity expansion in 2014, continuing to cut service at smaller airports and in less profitable markets. Domestic system capacity decreased by 0.8 percent in 2014 but is expected to increase by 2.5 percent in 2015.9 Moreover, carriers are expected to maintain domestic capacity discipline in the near-term, emphasizing cautious capacity growth and the use of right-sized aircraft to serve markets.

International capacity from U.S. airports increased by 3.8 percent from July 2014 to July 2015. Many of the new international flights have been made possible by the introduction of new aircraft

¹⁰ July 2015 estimates are based on airline advance schedules and seats as provided to the Official Airline Guide ("OAG").



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⁵ Major airlines are defined by the U.S. DOT as those exceeding \$1 billion per year in revenue and include Allegiant, American/US Airways, Alaska, Delta, Frontier, Hawaiian, JetBlue, Southwest, Spirit, United and Virgin America.

⁶ U.S. DOT Form 41.

⁷ The primary sources of ancillary revenues include fees for baggage, reservations and cancellations, early boarding, premium seating, onboard retail and hotel and car rental commissions.

⁸ IATA Industry Outlook Update (released December 2014).

⁹ Innovata published airline schedules through December 31, 2015 as of April 2015.

technology in the form of long range, fuel-efficient smaller widebody aircraft (such as the Boeing 787).

Another important trend has been the retirement of smaller Regional Jets ("RJ's") and other less fuel-efficient aircraft. In 2014, use of 37-50 seat RJs continued to decline as carriers rationalized service and moved to reduce costs. Carriers like Delta, United and American have already eliminated hundreds of these small RJs from their fleets. Although current jet fuel prices are below \$2.00 per gallon,¹¹ this level is not expected to last. Airlines will continue to move towards larger, more fuel efficient and cost-effective aircraft. Over the next decade, network carriers will persist in upgrading their fleets, reducing the fuel efficiency edge historically enjoyed by LCCs.

LCCs have continued to grow both domestically and internationally in the United States. In addition to LCCs, a new type of carrier, the Ultra-Low Cost Carrier or "ULCC" has also emerged. Such carriers have expanded the unbundling of services that both network carriers and LCCs have introduced to boost ancillary revenues and help maintain overall profitability. While passenger ticket prices are lower than they were in 2000 when accounting for inflation, 12 carrier revenue growth has been achieved in large part through fees and sales of ancillary products and services.

2.2 History of the U.S. Aviation Industry

2.2.1 Historical System Shocks and Recoveries

The airline industry is extremely cyclical and highly sensitive to economic and political events. Industry traffic has declined during all of the economic recessions of the past decades. Many of those recessions have coincided with other shocks such as the PATCO¹³ air traffic controllers strike in the early 1980s, the Gulf War in 1990/91, and several airline liquidations and reorganizations in the early 1990s and again in the first half of this decade (see Exhibit 2-1). Also, political "shocks" such as the events of 9/11 have challenged and changed the airline environment significantly, causing passenger travel declines and gradual recovery cycles.

In all cases, the industry recovered and growth in air passenger traffic resumed. In some cases, significant capacity reductions followed shocks – e.g. bankruptcy reorganizations caused many carriers to reduce their fleets and networks, and U.S. airlines reduced capacity by approximately 13 percent in the aftermath of 9/11. However, there has always been a gradual rebuilding of capacity as traffic growth resumed. From CY 1970 to CY 2014, total domestic and international passenger enplanements grew at an average annual rate of 3.5 percent.

¹³ Professional Air Traffic Controllers Organization.



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¹¹ U.S. Energy Information Administration, as of April 2015.

¹² Bureau of Transportation Statistics, Average Fares at All U.S. Airports.

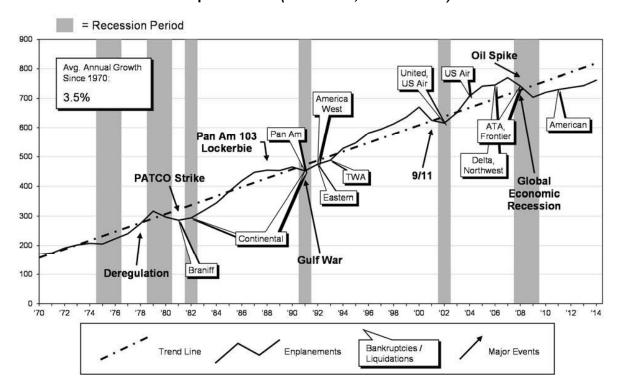


Exhibit 2-1: Airline Industry Shocks and Recoveries, U.S. Domestic Revenue Enplanements (In Millions, 1970 to 2014)

Source: Airlines for America (A4A).

Similar to other recoveries that have followed each shock, passenger traffic has returned to growth following the sharp declines in 2008-2009. The global economic recession linked with the U.S. subprime mortgage crisis depressed demand. Traffic fell in 2008 and 2009 in response to drastic capacity cuts and fare increases introduced by airlines due to a weak economy and a spike in fuel prices. Passenger traffic recovery began in 2010 as economic conditions slowly improved. While traffic recovery has been gradual and industry enplanements are just now approaching pre-recession levels, growth is expected to continue in the coming years.

2.2.2 Airline Bankruptcies and Consolidation

The events of 9/11 and the difficult operating conditions caused by high fuel prices and global recession led to a number of airline bankruptcies and mergers over the past 15 years. Network carriers filed for Chapter 11 protection to reorganize and lower operating costs. Delta, Northwest, United, US Airways and American all entered Chapter 11 between 2001 and 2011, while many smaller carriers including American Trans Air, Skybus Airlines and Aloha Airlines ceased operations. Overall, U.S. airlines have emerged from restructuring more streamlined, poised to ride out the challenging operating environment with lower costs and stricter capacity discipline.



The U.S. airline industry moved towards consolidation with many high profile mergers and acquisitions. Three mergers among network carriers each produced the world's largest carrier in terms of passengers. Delta and Northwest, both of which emerged from bankruptcy in 2007, combined (under the name "Delta") in October 2008; United and Continental merged (under the name "United") in August 2010; and most recently, American Airlines and US Airways merged (under the name "American Airlines") in December 2013.¹⁴

The trend of airline consolidation has also extended to LCCs, including Frontier Airlines and regional airline Midwest (keeping the "Frontier" brand), which merged under parent company Republic Airways Holding in April 2010.¹⁵ The Southwest and AirTran merger completed in April 2011 created the largest LCC in the U.S. The combined Southwest/AirTran entity is the third largest domestic carrier by seat capacity after American/US Airways and Delta.

As a result of airline mergers, capacity has become more concentrated among a few dominant carriers. In July 2015, the top four domestic carriers by seat capacity – American, Delta, Southwest and United – are scheduled to account for over 82 percent of total domestic capacity, up from 74 percent in 2012 (see Exhibit 2-2).

Exhibit 2-2: U.S. Airline Domestic Service Concentration – Share of Weekly Seat Capacity (Advance Schedule, July 2015)

Rank	Airline	Capacity Share
1	American	23.9%
2	Delta	21.9%
3	Southwest	21.6%
4	United	15.0%
5	Alaska	4.4%
6	JetBlue	4.0%
7	Spirit	2.2%
8	Frontier	1.6%
9	Allegiant	1.5%
10	Hawaiian	1.5%
	Other	2.4%
	Total	100.0%

Source: Innovata, July 2015.

Airline consolidation has also progressed through the creation of global airline alliances and joint ventures. Since the deregulation of the airline industry in the 1970s, airline ownership control has been limited to companies and individuals of the operating country. This has prevented major international mergers and acquisitions from occurring. Airlines worldwide, however, have

¹⁵ In December 2013, Republic Airways Holdings sold Frontier Airline to private equity firm Indigo Partners LLC.



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¹⁴ American and US Airways began operating under the same operating certificate in April 2015.

increasingly sought to increase revenues, share costs and expand the reach of their networks by developing international partnerships through multilateral alliances or joint ventures. In an alliance relationship, carriers seek to increase their efficiency and extend their global reach by aligning schedules, engaging in cooperative marketing efforts, and in some cases sharing revenue. Joint ventures, on the other hand, are narrower relationships with fewer carriers, and they often involve the sharing of costs as well as revenues.

Three major global alliances were created between 1997 and 2000 and are still in existence today: Star Alliance, SkyTeam and Oneworld. In recent years, antitrust immunity has been granted to a number of joint ventures within the global alliances, allowing carriers to more closely coordinate operations, including pricing, and increase cost savings in international markets. Members of all three major alliances have sought transatlantic joint ventures. SkyTeam partners Delta and Air France-KLM were the first to secure immunization on transatlantic operations from the U.S. Department of Transportation ("U.S. DOT") in 2008. Star Alliance partners United, Air Canada and Lufthansa also secured approval for their joint venture in July 2009. In July 2010, the U.S. DOT granted antitrust immunity to American and its Oneworld alliance partners: British Airways, Iberia Airlines, Finnair and Royal Jordanian for transatlantic operations. The move towards immunized alliances has also spread to transpacific ventures. United and All Nippon Airways launched a transpacific joint venture in 2011, as did American and its joint venture partner Japan Airlines. The rise of immunized ventures is a trend that is expected to dominate international operations through the next several years. Current airline membership in the three major alliances is shown in Exhibit 2-3.

Exhibit 2-3: Airline Alliance Membership (as of June 2015)

Source: Alliance websites.

¹⁶ US Airways joined the transatlantic joint venture in March 2014 as part of its move to the Oneworld Alliance.



2.3 Airline Capacity and Passenger Traffic Trends

A new trend of capacity discipline among U.S. airlines has emerged in the wake of the 2008-09 economic and financial crises. Both network carriers and LCCs have implemented substantial capacity cuts, withdrawing service from less profitable and low demand markets. Many regional markets across the U.S. have lost commercial service as a result. There has also been an increased emphasis on fuel-efficient aircraft and using aircraft with the right capacity for any specific route.

2.3.1 Passenger Traffic Trends

Air travel demand has historically demonstrated a strong correlation to economic growth. Airline passenger traffic normally declines during an economic recession with passenger growth resuming during subsequent economic expansions. This correlation can be seen clearly over the past decade as passenger demand fell during the global economic recession and recovered as the economy improved (Exhibit 2-4).

The year 2008 marked the beginning of a nationwide economic downturn following the global credit-related financial crisis. U.S. GDP decreased year-over-year for the first time in well over a decade. Fuel costs also reached an unprecedented high in 2008, forcing carriers to cut capacity and raise fares. Carriers passed on fuel surcharges to consumers in efforts to offset the massive increases in operating costs. The sharp traffic decline was a reaction to rising fares and service cuts. A correlated decline in enplanements was evident in 2008, with enplanements dropping sharply through the end of the year.

Passenger traffic recovery began in 2009 as GDP decline started to moderate. Enplanements rose through 2009, returning to 2007 levels in late 2010. However, the slow pace of the economic recovery in the U.S. has corresponded with slow growth of enplanements. Year-over-year enplanement growth rose above 2 percent for the first time in 2Q 2014 after averaging less than one percent over the prior eight quarters. Enplanement growth in both 3Q and 4Q 2014 was 3.5 percent.



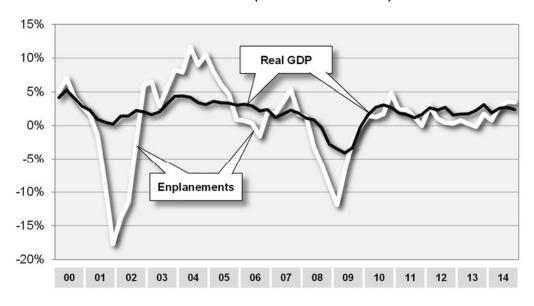


Exhibit 2-4: U.S. Scheduled Carrier Enplanements and U.S. Real GDP, Percent Change Over Prior Year (1Q 2000 to 4Q 2014)

Source: U.S. DOT Form 41 Database; U.S. DOC, Bureau of Economic Analysis.

The latest FAA Aerospace Forecast predicts that, after another year of slow growth in 2015, growth in passenger traffic over the next five years will elevate slightly with the improving strength of the U.S. economy.¹⁷

2.3.2 Capacity Trend Review

As illustrated in Exhibit 2-5, the steep capacity reduction that occurred in 2009 has not been repeated, though scheduled domestic seat capacity remains below the pre-recession level. Carriers shed 7.4 percent of scheduled domestic seats in 2009¹⁸ to deal with higher fuel prices and the economic decline. Seat capacity declined slightly in 2010 and then increased by 2.7 percent in 2011 as carriers responded to more favorable economic conditions. However, since 2012, seat capacity has remained relatively flat, reflecting industry consolidation and airlines' continued adherence to capacity discipline. July 2015 advance schedules indicate a capacity increase of 2.5 percent compared to July 2014 due to increased LCC flying (by Spirit, Allegiant, JetBlue and Southwest); however, domestic capacity remains six percent below July 2007 levels and about 15 percent below July 2000 levels. Although the economic recovery is gaining strength,

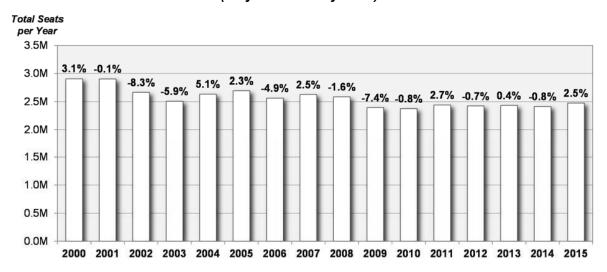
¹⁸ July capacity has been used as a representative measure for year-over-year growth, as July 2015 represents a one-month outlook from the publication of this report in June 2015.



¹⁷ FAA Aerospace Forecast FY2014-2034 (released March 14, 2015).

the majority of major carriers remain cautious in growing capacity as they continue to focus on increasing passenger yields and revenue.

Exhibit 2-5: U.S. Domestic Scheduled Daily Seats and Year Over Year Change (July 2000 to July 2015)



Note: July 2015 is using advance schedules

Source: Official Airline Guide.



Tight capacity control and better revenue management techniques have pushed passenger load factors to an all-time high. Exhibit 2-6 shows the continuing upward trend in U.S. domestic airline load factors since 2000. Following a dip in the average load factor after 9/11, the average load factor rose steadily to approximately 80 percent in 2007. Load factor growth stalled slightly in 2008 as the economic recession took hold. Since 2008, load factors have continued to rise, reaching 84.5 percent in 2014.

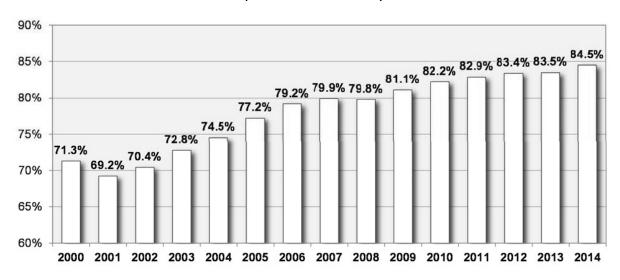


Exhibit 2-6: U.S. Domestic Load Factors (CY 2000 to CY 2014)

Source U.S. DOT T-100 Database

2.3.2.1 Network Carriers

As described in Section 2.2, U.S. network carriers (which currently include five major carriers: Alaska, American, Delta, Hawaiian and United) have been forced to undergo major restructuring to survive in the challenging operating environment since 2001. Following drastic capacity reductions in 2008-2009, network carriers have started cautiously to grow capacity slightly. Continued capacity cuts in unprofitable markets have been balanced by modest growth on more profitable routes. On average, network carriers grew capacity by 0.6 percent in 2014 and by 0.8 percent in 2015.¹⁹

- Delta's scheduled capacity growth for July 2015 is 4.3 percent compared to July 2014. In 2014, Delta grew international capacity, but reduced domestic capacity slightly. However, growth in 2015 will be from both domestic and international capacity.
- Following its merger with US Airways in December 2013, American surpassed Delta to become the largest U.S. airline in terms of scheduled capacity. System capacity for the newly merged airline is scheduled to increase by only 0.1 percent in July 2015 compared

¹⁹ Innovata, based on July of every year.



- to July 2014 as it continues to integrate operations. American's domestic capacity is expected to grow 0.4 percent in 2015 while international capacity will decline by 1.1 percent.
- United is the only network carrier with overall capacity reductions in each of the last two years. In July 2014, United's system capacity was 1.1 percent lower than the prior year, and scheduled system capacity in July 2015 is down another 3.4 percent from 2014. Reductions are mostly in domestic markets, as United continues to cut less profitable flying and adjust capacity for any softening in demand in order to improve overall financial performance. United's international capacity grew in 2014 and is contracting slightly in 2015.
- Alaska Airlines has shown strong capacity growth over the past two years. Alaska increased year-on-year system capacity by 6.4 percent in July 2014 and by 5.1 percent in July 2015. Capacity increases are primarily in domestic markets, with Alaska operating very limited Mexico and Canada international services.
- Hawaiian Airlines has also shown consistent growth over the past two years, with system capacity increasing by 4.5 percent in July 2014 and 4.4 percent in July 2015. This growth was driven by Hawaiian's increasing domestic capacity, as international capacity to Japan saw sharp decline in 2014 before rebounding slightly in 2015.



2.3.2.2 Low Cost Carriers

LCCs (including Southwest, JetBlue, Frontier, Spirit, Virgin America, Sun Country and Allegiant) rose to prominence in the early 2000s, expanding rapidly and gaining share in the domestic market. While LCCs provided just over 15 percent of domestic seat capacity in the U.S. in 2000, they will account for approximately 32 percent of domestic seats as of July 2015. In terms of passenger traffic, LCCs control approximately 29 percent of the domestic market based on revenue passenger miles, as of the third quarter of 2014, up from an 11 percent share in 2000.²⁰

As network carriers scaled back on domestic capacity and focused on more profitable international flying, LCCs seized the opportunity to increase their domestic market share. American, Delta and United reduced mainline domestic capacity between 2003 and 2009 by 85 billion domestic seats miles. During this same period, LCCs added approximately 84 billion domestic seat miles to their route systems.²¹

LCCs have also begun to look actively at international expansion possibilities. JetBlue has established a strong presence in the Caribbean and Latin America, adding service to 31 VFR ("Visiting Friends and Relatives") and leisure markets. JetBlue has also introduced commercial partnerships with more than 30 foreign airlines. The partnerships are most often in the form of interline agreements but several, including those with Aer Lingus, Emirates, Etihad, Icelandair, Japan Airlines, Lufthansa, Qatar, South African Airways, Turkish Airlines and Virgin Atlantic, allow for one-way or two-way code sharing. In addition, with the acquisition of AirTran, Southwest took over AirTran's existing Caribbean and Mexican routes, becoming positioned for further international expansion.

Allegiant and Spirit have embraced a new ultra-LCC (or ULCC) business model. A third carrier, Frontier, announced in April 2014 that it would also pursue this type of model. The ULCC business model is characterized by extreme unbundling of services. The purchase of a ticket on an ULCC covers only the seat and (depending on the carrier) does not include seat choice, food or drink, checked or carry-on luggage, or a paper boarding pass - all amenities available for additional a la carte purchase. Over the last year, U.S. based ULCCs have expanded from 4.5 percent of domestic seat capacity to 5.3 percent (as of July 2015).

While network carriers have kept capacity relatively flat in the past few years, LCCs and ULCCs have continued to expand opportunistically.

JetBlue increased system-wide capacity by 5.7 percent in July 2014 over the prior year, followed by another 6.6 percent year-over-year increase in July 2015. A large portion of the growth is focused on international expansion. JetBlue's international capacity increased by 26.6 percent in July 2014 and is scheduled to increase by 3.7 percent in July 2015. Domestic capacity growth was 1.4 percent in 2014 and rose to 7.3 percent in 2015.

²¹ Ihid



²⁰ U.S. DOT. Form 41 database.

- Southwest capacity was down by 1.3 percent in July 2014 compared to the prior year, as Southwest reconciled the two networks and integrated AirTran operations. Southwest emerged from its service contractions, increasing system-wide capacity by 3.5 percent in July 2015. In 2015, Southwest's domestic capacity is scheduled to increase by 3.1 percent and its international capacity by 35.2 percent.
- Virgin America system capacity was down by 5.9 percent in July 2014 before rebounding with growth of 6.5 percent in July 2015. Overall, its system capacity is up 0.3 percent from where it was in July 2013. Virgin America's domestic capacity far outweighs international capacity, but a similar trend was observed in both areas.
- Ultra LCCs such as Spirit Airlines, Frontier and Allegiant have also increased system capacity over the past two years. Spirit increased overall system capacity by 7.2 percent in 2014 and 34.9 percent in 2015. Frontier saw year-over-year capacity growth of 12.2 percent and 0.3 percent over the same periods. Allegiant grew system capacity by 8.6 percent in 2014 and 28.4 percent in 2015.

In recent years, European LCC's have started making their first foray into serving the transatlantic market. Norwegian Air Shuttle led the way, introducing its first transatlantic service to New York-JFK in May 2013 and eventually expanding to serve five distinct U.S. markets. Norwegian's transatlantic service from mainland Europe has been made possible in large part by the introduction of the Boeing 787 aircraft; despite brief experiments with other aircraft types, as of May 2015 all of Norwegian's routes use the Boeing 787. Following suit, Iceland-based WOW Air began offering service from Reykjavik to Boston in March 2015 and Baltimore in May 2015. Another major European LCC, Ryan Air, has made the news recently with conflicting reports on their intentions to begin offering transatlantic service.



2.4 Fleet Expansion and Changes

2.4.1 Aircraft Orders

Aircraft orders are constantly shifting as carriers adjust their order books to reflect market activities, changes to long-range plans and available aircraft financing. The economic and financial crises in 2008-2009 led airlines to make significant cancellations and deferrals of aircraft orders. As airlines returned to profitability in recent years and sought to incorporate more fuel-efficient aircraft into their fleets, aircraft orders have returned to higher levels. Over the next ten years, a total of 1,993 aircraft are scheduled to be delivered to U.S. commercial carriers. Recent aircraft orders have emphasized fuel efficiency, with the incoming aircraft slotted to replace the less efficient MD-80s, DC-9s and older 737s in carrier fleets. In addition, carriers are increasingly placing orders for larger capacity, new generation aircraft such as the Boeing 737 MAX.

As of March 2015, aircraft orders²² in place for delivery through 2018 are weighted 50 percent for the network carriers and 31 percent for the LCCs (see Exhibit 2-7).²³ LCC deliveries are expected to accelerate in the 2019-2024 period, however, accounting for 38 percent of total orders.

Southwest has the highest number of orders among LCCs by a significant margin. Southwest has a very aggressive plan to grow its fleet by 269 aircraft over the next ten years.²⁴ Other LCCs also have large aircraft orders in place. JetBlue has orders for 125 new aircraft and Spirit Airlines may add 97 aircraft through 2024. Frontier and Virgin America have 89 and 40 aircraft on order through 2024, respectively.

Network carrier new aircraft orders and deliveries for the period through 2018 reflect major fleet replacement programs by a number of carriers. American has large orders for the Boeing 737 MAX, Boeing 737-800 and Airbus A321neo in place, aimed at replacing the carrier's aging and fuel-inefficient MD-80 fleet. American has a total of 334 aircraft deliveries scheduled for 2015-2018, and over the next ten years, American is scheduled to receive 483 aircraft, the most of any carrier. United has 220 aircraft on order, including 49 Boeing 787 Dreamliners. United took delivery of its first 787 in the second half of 2012, making it the first North American carrier to receive the aircraft. Delta has 188 aircraft orders through 2024, 65 of which are for the Boeing 737-900 aimed at replacing older Boeing 757s, 767s and Airbus A320s.

²⁴ In April 2014, Southwest announced that its fleet would remain flat through 2015 in order to meet its return on capital goal.



²² Based upon ACAS (AirCraft Analytical System) data

²³ The remaining 19% of orders belong to regional carriers.

Exhibit 2-7: New Aircraft Deliveries for U.S. Carriers (2015 to 2024)

		Backlog						
Carrier	Code	2015	2016	2017	2018	2019-2024	Total	
Alaska	AS	10	21	9	14	27	81	
American	AA/US	86	104	87	57	149	483	
Delta	DL	19	38	42	31	58	188	
Hawaiian	HA	2	0	3	6	13	24	
United	UA	28	6	14	27	145	220	
Subtotal - Network		145	169	155	135	392	996	
Allegiant	G4	0	0	0	0	0	0	
Frontier	F9	0	7	16	19	47	89	
jetBlue	B6	10	7	14	14	80	125	
Southwest	WN/FL	13	29	30	24	173	269	
Spirit	NK	12	11	18	12	44	97	
Virgin America	VX	5	5	0	0	30	40	
Subtotal - LCC		40	59	78	69	374	620	
Other/Regional Carriers		34	46	39	47	211	377	
Total		219	274	272	251	977	1,993	
Share - Network Carriers		66%	62%	57%	54%	40%	50%	
Share - LCCs		18%	22%	29%	27%	38%	31%	
Share - Other		16%	17%	14%	19%	22%	19%	

Note: Does not include subsidiaries. Source: ACAS, March 2015.

2.4.1 Next Generation Aircraft Trends

The introduction of new aircraft technology will continue to be a key enabler of new nonstop services around the world, especially with respect to international services. Aircraft such as the next-generation 777s, the Boeing 787 and the Airbus 350 incorporate new airframe, engine and wing designs for significant improvements in aircraft range and fuel efficiency. Entering commercial service in 2011, the Boeing 787 "Dreamliner" was the first commercial airliner made of light-weight composite carbon fiber material rather than aluminum, allowing fuel savings of approximately 20 percent compared to existing aircraft of similar size. Despite production delays and various initial in-service problems, the 787 has enjoyed a high degree of success becoming the fastest-selling airliner to date since launch. The Airbus 350, a long-range twin-engine jetliner made primarily of composite materials, is a rival to the 787 that recently entered commercial service (in January 2015). These new fuel-efficient aircraft are allowing carriers to serve profitably long-haul routes that were previously uneconomical with the Boeing 777, Boeing 747, A340 and other older technology long-range aircraft.

As shown in Exhibit 2-8, there are over 260 Boeing 787 and Airbus 350 aircraft currently in service. More than 1,500 orders for these two aircraft have been placed by airlines worldwide. By 2020, an additional 1,272 next generation aircraft will be delivered including 1,036 787's and 795 A350's. Asia is the leading market for next generation wide-body aircraft deliveries, with Asian carriers accounting for close to 30 percent of 787 and A350 aircraft orders. European carriers



follow with close to 20 percent of orders and Middle Eastern carriers with approximately 15 percent. Among U.S. carriers, United was the first carrier to operate the 787 commencing in 2014, followed by American, which received its first 787 in 2015. United, American and Delta each expect additional 787/A350 deliveries ranging from 40 to 65 aircraft over the next ten years.

600 539 A350-1000XWB A350-900XWB 500 A350-800XWB 787-10 400 787-9 325 787-8 300 264 240 241 231 225 205 200 130 100 0 Current 2015 2016 2017 2018 2019 2020 2021 -**Options** Fleet 2035

Exhibit 2-8: Worldwide Boeing 787 and Airbus 350 Current Fleet and Aircraft Deliveries

Source: ACAS. March 2015.

Use of new fuel-efficient aircraft will allow airlines to open up new non-stop routes, introducing more service to non-hub markets that may lack significant feeder traffic from a hub carrier. Below, Exhibit 2-9 shows new (or regained) routes enabled by the B787.



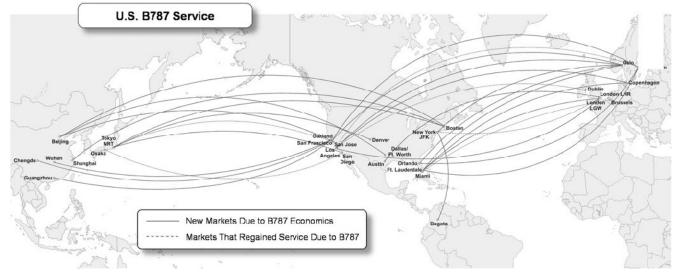


Exhibit 2-9: International Services Launched with the 787 from the U.S.

Source: OAG, May 2015.

2.5 U.S. Airline Financial Performance

2.5.1 Revenues

The average nominal domestic yield for the U.S. airline industry since 2000 is displayed in Exhibit 2-10. Since 2004, domestic yields made a significant recovery as airlines made efforts to capture additional revenue through various strategies such as yield management and product unbundling. Better yield management techniques allowed airlines to maximize revenue generation by filling their planes with as many high priced seats as possible. Carriers also began to offer "a la carte" pricing, maintaining a lower base fare, but introducing extra fees for services such as checked baggage and preferential seating. By 2008, average domestic yield reached 14.0 cents, almost returning to pre-9/11 levels. The global recession in 2009 led to another sharp decline in yields. Despite significant reductions in carrier capacity, the worsening global economic recession led to industry-wide contractions in passenger demand. Domestic passenger yield dropped to 12.2 cents, excluding ancillary fees, and 13.0 cents, including ancillary fees, in 2009.



16¢ Ticket Revenue + 15¢ **Ancillary Revenue** 14¢ 13¢ 12¢ Ticket Revenue 11¢ 10¢ '00 '14 '01 '02 '03 '05 '06 '07 '08 '09 '12 '13 YE3Q

Exhibit 2-10: Domestic Nominal Yields, Revenues per Revenue Passenger Mile (RPM) (CY 2000 to YE 3Q 2014)

Note: Ancillary revenue in this graph includes baggage and reservations/change/cancellation fees but excludes fees for premium seating or boarding and other services as these fees are not explicitly shown in U.S. DOT Form 41 data. All U.S. carriers required to report to Form 41 are shown on this graph.

Source: U.S. DOT, Form 41.

Since 2009, yields have increased as airlines have better managed capacity, passenger demand has strengthened and new ancillary fees have been introduced. The average industry yield climbed to 14.7 cents, excluding fees, and 15.4 cents, including fees, for the YE 3Q 2014. Since not all ancillary fees are required to be reported separately²⁵ in U.S. DOT data filings, this 5.1 percent difference is actually understated.

As shown in Exhibit 2-11, domestic yields, excluding fees, for network carriers and LCCs combined grew 3.4 percent in YE 3Q 2014.

²⁵ Some fees are aggregated into "Miscellaneous Operating Revenues."



Exhibit 2-11: Network Carrier and Low Cost Carrier Yields, Passenger Revenues per RPM (CY 2011 to YE 3Q 2014)

		Domestic	c Yield		Pct. Change			
Carrier	2011	2012	2013	YE3Q14	'11-'12	'12-'13	'13-YE3Q14	'11-YE3Q14
Low Cost Carriers								
Allegiant	10.04¢	10.09¢	10.12¢	10.38¢	0.5%	0.3%	2.6%	3.4%
Frontier	14.34¢	11.88¢	12.49¢	12.44¢	-17.2%	5.2%	-0.3%	-13.2%
JetBlue	12.92¢	13.34¢	13.54¢	14.05¢	3.2%	1.5%	3.7%	8.7%
Southwest	14.71¢	15.11¢	16.16¢	16.46¢	2.8%	6.9%	1.9%	12.0%
Spirit	9.06¢	8.60¢	8.72¢	8.77¢	-5.1%	1.4%	0.6%	-3.2%
Sun Country	12.44¢	13.68¢	14.62¢	14.06¢	9.9%	6.9%	-3.9%	13.0%
Virgin America	11.97¢	12.42¢	13.14¢	13.08¢	3.8%	5.7%	-0.5%	9.2%
Average Yield	13.85¢	13.93¢	14.61¢	14.83¢	0.6%	4.9%	1.5%	7.1%
Network Carriers								
Alaska	13.48¢	13.58¢	13.53¢	13.84¢	0.8%	-0.4%	2.3%	2.7%
American	13.89¢	14.50¢	14.79¢	15.52¢	4.4%	2.0%	4.9%	11.7%
Delta	14.03¢	14.68¢	15.70¢	16.41¢	4.7%	6.9%	4.5%	16.9%
Hawaiian	14.73¢	14.44¢	14.93¢	15.69¢	-1.9%	3.4%	5.1%	6.5%
United	13.82¢	13.45¢	13.55¢	14.03¢	-2.6%	0.7%	3.6%	1.5%
Average Yield	13.90¢	14.20¢	14.62¢	15.26¢	2.2%	3.0%	4.4%	9.8%
Total/Average	13.88¢	14.11¢	14.62¢	15.12¢	1.7%	3.6%	3.4%	8.9%

Note: Yield based on passenger ticket revenues only. Excludes ancillary revenue.

Source: U.S. DOT Form 41.

Revenue from baggage and other fees associated with ancillary products and services has become a key element in the airlines' ability to achieve top-line growth. In 2008 and 2009, as many carriers introduced baggage fees on passengers' checked baggage, airline revenue generated by baggage fees skyrocketed. Baggage fee revenue increased nearly eight-fold in the span of just three years, from \$441 million in 2006 to \$3.5 billion in 2010 but has since plateaued. In search of new revenue streams, airlines have continued to unbundle services, introducing charges for on-board food and beverages, seating with extra legroom, in-flight entertainment, priority boarding, the use of telephone reservation systems and other services. Total ancillary revenues collected by U.S. airlines in 2014 are estimated at \$15.9 billion, or ten percent of total revenue.²⁶

²⁶ Idea Works/Cartrawler study (2014).



2.5.2 Costs

While U.S. industry airline revenues grew steadily between 2002 and 2008, airline costs grew even faster. Despite efforts by airlines – both network and LCCs – to reduce costs in areas such as labor, aircraft ownership, maintenance, distribution and other support activities, fuel price increases pushed total operating costs higher. Nominal unit operating costs for scheduled U.S. carriers are presented in Exhibit 2-12. Average unit costs rose from approximately 12.8 cents per available seat mile ("ASM") in the third quarter of 2003 to a peak of 19.1 cents at the height of the fuel spike in 2008. After falling to 15.2 cents in 2Q 2009, average units costs have generally trended up again, driven by high though volatile fuel prices. The beginning of a decline in oil prices in the second half of 2014 has resulted in decreasing unit costs in the second half of 2014, reaching 17.7 cents in 3Q 2014.

20¢ 19¢ 18¢ 17¢ 16¢ 15¢ 14¢ 13¢ 12¢ 11¢ 10¢ 9¢ 8¢ 02 03 04 05 06 07 08 09 10 00 01 11 12 14

Exhibit 2-12: U.S. Scheduled Carrier Nominal Operating Costs per ASM (1Q 2000 to 3Q 2014)

Source: U.S. DOT Form 41.



Fuel cost per ASM has more than tripled since 2002, rising from approximately 1.5 cents to 4.6 cents per ASM during 3Q 2014 (Exhibit 2-13). In 2008, a spike in crude oil prices drove up jet fuel prices to an unprecedented 6.5 cents per ASM in 3Q 2008. Fuel cost per ASM rose again sharply between 2009 and 2011, in part due to unrest in the Middle East, but has trended downward since 2012. Starting in the second half of 2014, oil prices have been declining sharply.

7.0¢ 6.5¢ 6.0¢ 5.5¢ 5.0¢ 4.5¢ 4.0¢ 3.5¢ 3.0¢ 2.5¢ 2.0¢ 1.5¢ 1.0¢ 0.5¢ 0.0¢ 00 01 02 03 04 05 06 07 08 09 10 11 12 13 14

Exhibit 2-13: Nominal Fuel Cost Per ASM (1Q 2000 to 3Q 2014)

Source: U.S. DOT Form 41.



Exhibit 2-14 highlights the dramatic rise of fuel as a cost component for the airlines and the relative reduction of other cost elements. Fuel, as a percentage of costs, climbed from 16 percent in early 2003 to 32 percent in the third quarter of 2014. Historically fuel accounted for between 10 to 15 percent of overall operating costs. In 2015, fuel cost represents the largest airline cost component, surpassing even labor. Labor represented the second largest component of operating costs at 30 percent in the third quarter of 2014, down from 40 percent of overall costs in 2003. Aircraft ownership represents only 12 percent of current costs (down from approximately 17 percent in 2003). Airport usage costs are an even lower percentage of airline costs (e.g., landing fees are 1.7% of total operating costs).²⁷

100% Other 90% Agency Commissions Maintenance 80% Ownership Labor 70% Fuel 60% 50% 40% 30% 20% 10% 0% 01 02 04 05 06 07 08 09 13

Exhibit 2-14: Fuel Has Become the Largest Operating Cost for Airlines (1Q 2000 to 3Q 2014)

Note: Excludes fees paid to regional carrier affiliates for operating codeshare flights.

Source: U.S. DOT Form 41.

Overall, a tiered cost structure separation of the industry remains, with the LCCs having lower unit costs than the network carriers. Average unit costs, which reflect varying average stage lengths, and unit revenues for LCC and network carriers are shown in Exhibit 2-15. LCCs had an average unit cost (CASM) of 12.0 cents in YE 3Q 2014, up from 7.9 cents in 2000. The average unit cost for network airlines was 16.7 cents in YE 3Q 2014, up from 10.9 cents in 2000. Generally, network carriers reported unit costs between 14 and 17 cents, while LCCs reported unit costs between 10 and 13 cents. This segmentation of unit costs reflects differences in network structure,

²⁷ U.S. DOT Form 41 Database.



overhead cost, aircraft fleet age and crew seniority between the two carrier groups. While the LCCs enjoy a lower cost structure, they also generate less revenue due to lower fares, and high unit costs for network carriers are coupled with higher fares. In YE 3Q 2014, the average unit revenue (RASM) for LCCs was 13.4 cents compared to 18.3 cents for network carriers.

Exhibit 2-15: Cost per Available Seat Mile (CASM) and Revenue per Available Seat Mile (RASM) for Network and Low Cost Carriers (YE 3Q14)

YE 3Q 2014				YE 3Q 2014				
Carrier	RASM	CASM	Diff.		RASM	CASM	Diff.	
Network Carriers				Low Cost Carriers				
Alaska	16.6¢	14.0¢	2.7¢	Allegiant	12.3¢	10.5¢	1.8¢	
American	18.0¢	16.5¢	1.6¢	Frontier	12.6¢	11.2¢	1.5¢	
Delta	19.0¢	16.8¢	2.2¢	JetBlue	12.9¢	11.9¢	1.0¢	
Hawaiian	13.3¢	12.1¢	1.2¢	Southwest	14.1¢	12.6¢	1.5¢	
United	18.2¢	17.3¢	0.9¢	Spirit	12.0¢	9.9¢	2.1¢	
				Sun Country	11.5¢	11.5¢	0.0¢	
				Virgin America	12.1¢	11.1¢	0.9¢	
Average	18.2¢	16.6¢	1.6¢	Average	13.4¢	12.0¢	1.4¢	
				Total/Average	17.0¢	15.5¢	1.6¢	

Source: U.S. DOT Form 41.



2.5.3 U.S. Airline Profitability

The U.S. airline industry recovered from steep losses experienced during 2008 and has consistently achieved profits since 2010 (see Exhibit 2-16). In 2008, the sharp rise in fuel prices coupled with a worldwide recession drove operating costs higher while demand softened. Industry losses in 2008 reached \$6.3 billion. Carriers employed fuel hedging strategies extensively in an attempt to offset high fuel costs. While this provided some cushion, hedges also resulted in losses for some airlines due to the extreme volatility in oil prices. Airlines were forced to reduce losses by sharply curtailing capacity and controlling costs. Despite the lack of a robust economic recovery, the U.S. airline industry regained profitability. Helped by price of oil trending downward, in YE 3Q 2014, U.S. airline operating income was \$14.5 billion.

\$16 \$14.3 \$10.6 \$12 \$7.5 \$8 \$5.8 \$6.0 \$5.3 \$4.7 \$4.0 \$4 \$0.1 \$0 -\$4 -\$3.6 -\$4.0 -\$8 \$6.3 -\$9.1 \$9.3 -\$12 '00 '01 '02 '03 '04 '05 '06 '07 '08 '09 '10 '11 '12 '13 '14 YE3Q

Exhibit 2-16: Operating Income of U.S. Scheduled Airlines, in \$ Billions (CY 2000 to YE 3Q 2014)

Note: Includes major U.S. passenger airlines (Allegiant, American, Alaska Airlines, Delta, Frontier, Hawaiian, JetBlue, Southwest, Spirit, United, and Virgin America).

Source: U.S. DOT Form 41 Database.

All major U.S. carriers were profitable in YE 3Q 2014 (Exhibit 2-17). Delta was the leader by far, with profits of nearly \$4.6 billion. United and American each posted profits in excess of \$1.0 billion. The largest of the LCCs, Southwest and JetBlue, achieved operating profits of approximately \$2.0 billion and \$0.5 billion, respectively.



Southwest \$1,991M **JetBlue** \$458M Spirit \$333M **Low Cost Carriers** Frontier \$176M Allegiant \$153M Virgin America \$112M Delta \$4,566M American \$3,709M United \$1,988M Alaska \$850M **Network Carriers** Hawaiian \$206M \$4,000M \$0M \$2,000M \$6,000M

Exhibit 2-17: Operating Profits for U.S. Airlines (YE 3Q 2014)

Note: Includes major U.S. passenger airlines as defined by the U.S. DOT, excluding regional affiliates. Source: U. S. DOT Form 41 Database.



3. ECONOMIC CHARACTERISTICS OF THE BOSTON LOGAN SERVICE AREA

3.1 Introduction

Air travel demand and airport passenger traffic are strongly linked to the economic characteristics of a region. The Boston service area, encompassing the Greater Boston Metropolitan Area, is a central player in the nation's finance, technology, biotechnology, healthcare and education sectors. As one of the nation's largest population and economic centers, Boston is a mature market with a high per capita income of \$54,778 (2013),²⁸ which is 31.3 percent above the U.S. average, and an unemployment rate regularly below the national average. Such favorable economic conditions contribute to the region's sustained demand for air travel.

Following the longest and deepest downturn since the Great Depression, the Massachusetts economy in recent years has recovered and consistently performed better than the nation. In fact, of the ten largest U.S. metropolitan areas in terms of economic output, the Boston economy recorded the fifth highest rate of growth between 2009 and 2013.²⁹ The resilience of the Boston economy is partially attributed to the area's diversified economic base, which is spread across science and knowledge-based sectors including information technology, biotechnology, healthcare, education, and medical scientific research and products. These industries are highly travel dependent, boosting the O&D market.

Massachusetts has benefitted from improving economic conditions in the U.S. and has been further buoyed by its strong reliance on the growing technology sector; in 2014, according to Massbenchmarks, state economic growth outpaced the nation's economic growth in three of four quarters. Early 2014 was particularly affected by extreme cold temperatures (the "Polar Vortex"), which caused a first quarter decline of 2.4 percent in the Commonwealth's economy compared to a national decline of 2.1 percent.³⁰

Massbenchmarks forecasts near-term economic growth in the Commonwealth to remain steady with fewer fluctuations than those seen over the last few years. Specifically, economic forecasts predict that the negative impact of record snow levels in the first quarter of 2015 will be minimal; growth will be driven by the strong technology sector and falling unemployment. In 2014, over 60,000 new jobs were created in the Commonwealth – the highest number since 2000.³¹ The New England Economic Partnership forecasts Commonwealth GDP to increase by 2.9 percent in 2015 and then grow at slower rates down to 2.0 percent in 2018.³² Personal income for the Commonwealth and the Boston service area is forecast to grow by 1.9 percent annually over the

³² "Massachusetts Economic Outlook, October 2014," New England Economic Partnership.



²⁸ Woods & Poole Economics. Latest data available is 2013.

²⁹ Bureau of Economic Analysis.

³⁰ Massbenchmarks Bulletin, December 2014.

³¹ Ibid.

long-term (2013-2030).³³ These projections of economic activity suggest that air travel demand in the region will continue to grow over the long-term.

This section of the report covers various economic indicators for Massachusetts and the metro Boston region and the outlook for long-term demographic and economic growth.

3.2 Review of Massachusetts Economic Trends

As a result of the financial crisis that began in 2008, Massachusetts GDP declined 2.4 percent in 2009. Massachusetts GDP rebounded in 2010, however, growing by 3.4 percent and surpassing national GDP growth of 2.2 percent that same year.³⁴ Growth slowed to 2.2 percent and 2.3 percent in 2011 and 2012, respectively. Economic growth remained positive in 2013, but the annual rate dropped to 1.6 percent.³⁵

Over the 20-year period of 1993-2013, Massachusetts GDP as a percentage of U.S. GDP has ranged between 2.6 percent in 2006 and 2.8 percent in 2000 and 2001. The Commonwealth contributes disproportionately to national economic output; in 2013, Massachusetts accounted for 2.7 percent of U.S. GDP and 2.1 percent of total U.S. population. Preliminary results indicate that state GDP grew by 4.7 percent in the fourth quarter of 2014.³⁶ Below, Exhibit 3-1 shows annual growth rates for Massachusetts and the U.S. through 2013 as well as 2014 quarterly annualized rates; full calendar year data for Massachusetts for 2014 has not yet been released. The Commonwealth contributes disproportionately to national economic output; in 2013, Massachusetts accounted for 2.7 percent of U.S. GDP and 2.1 percent of total U.S. population.

³⁶ Full calendar year data for 2014 has not yet been released.

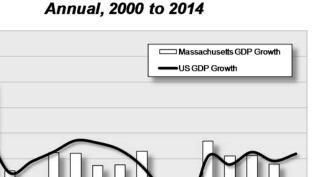


³³ Woods & Poole Economics.

³⁴ U.S. Department of Commerce, Bureau of Economic Analysis.

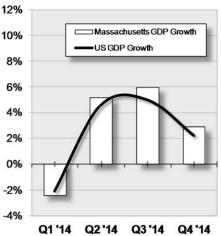
³⁵ U.S. Department of Commerce, Bureau of Economic Analysis.

Exhibit 3-1: Annual Growth in Massachusetts GDP and U.S. GDP (2000-2014)



'00 '01 '02 '03 '04 '05 '06 '07 '08 '09 '10 '11 '12 '13 '14

2014, by Quarter



Note: 2014 figures based on U.S. Bureau of Economic Analysis estimates for U.S. GDP and Massbenchmarks estimates for Massachusetts GDP. Full 2014 calendar year data for Massachusetts has not yet been released.

Source: U.S. Department of Commerce, Bureau of Economic Analysis (BEA); Massbenchmarks, March 2015.

3.2.1 Employment

12%

10%

8%

6%

4%

2%

0%

-2%

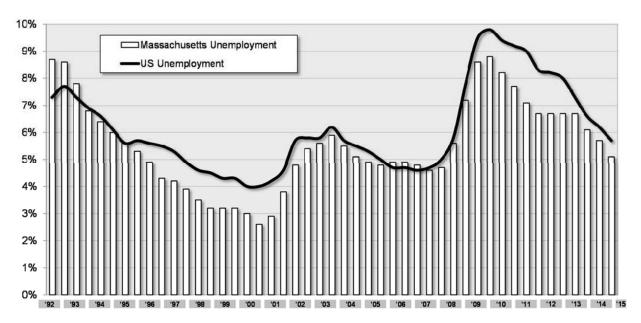
-4%

For most of the past two decades, unemployment rates in Massachusetts have been below the national rates (Exhibit 3-2). The financial crisis that began in 2008 sent unemployment rates soaring across the United States. The national unemployment rate increased from 4.7 percent in 2007 to over nine percent from 2009-2011, peaking at 9.8 percent in January 2010.³⁷ Over the same period, the Massachusetts unemployment rate was consistently below the national average, with a peak of 8.8 percent in January 2010. As the economy has recovered, national unemployment has declined since its 2010 peak. As of May 2015, the national unemployment rate stood at 5.5 percent while the Massachusetts rate was 4.6 percent.

³⁷ U.S. Department of Commerce, Bureau of Labor Statistics.



Exhibit 3-2: Unemployment Rates for Massachusetts and the U.S. (January and July, 1992 to 2015)





As of April³⁸ 2015, the Boston area's unemployment rate ranked 7th best among the nation's large metropolitan areas with unemployment below 5.0 percent. Compared to April 2014 (5.0 percent), Boston's unemployment rate declined considerably, in part due to the expanding technology sector, and its rate is only 1.2 times the lowest rate among large MSAs (3.0 percent).

Exhibit 3-3: Large Metropolitan Areas with Unemployment Below 5% (April 2015 Rankings)

Rank	Metropolitan Area	April 2015 (p) Unemployment Rate
Under 5.09	6 Unemployment	
1	Austin-Round Rock, TX Metropolitan Statistical Area	3.0
2	Salt Lake City, UT Metropolitan Statistical Area	3.1
3	Oklahoma City, OK Metropolitan Statistical Area	3.4
3	San Antonio-New Braunfels, TX Metropolitan Statistical Area	3.4
5	Minneapolis-St. Paul-Bloomington, MN-WI Metropolitan Statistical Area	3.5
6	Dallas-Fort Worth-Arlington, TX Metropolitan Statistical Area	3.7
7	Boston-Cambridge-Nashua, MA-NH Metropolitan NECTA	3.8
7	Columbus, OH Metropolitan Statistical Area	3.8
9	Seattle-Tacoma-Bellevue, WA Metropolitan Statistical Area	3.9
10	Houston-The Woodlands-Sugar Land, TX Metropolitan Statistical Area	4.0
10	San Francisco-Oakland-Hayward, CA Metropolitan Statistical Area	4.0
10	San Jose-Sunnyvale-Santa Clara, CA Metropolitan Statistical Area	4.0
13	Cincinnati, OH-KY-IN Metropolitan Statistical Area	4.1
14	Denver-Aurora-Lakewood, CO Metropolitan Statistical Area	4.2
14	Nashville-DavidsonMurfreesboroFranklin, TN Metropolitan Statistical Area	4.2
16	Indianapolis-Carmel-Anderson, IN Metropolitan Statistical Area	4.3
16	Raleigh, NC Metropolitan Statistical Area	4.3
16	Washington-Arlington-Alexandria, DC-VA-MD-WV Metropolitan Statistical Area	4.3
19	Louisville/Jefferson County, KY-IN Metropolitan Statistical Area	4.4
20	Pittsburgh, PA Metropolitan Statistical Area	4.6
21	Milwaukee-Waukesha-West Allis, WI Metropolitan Statistical Area	4.7
22	Birmingham-Hoover, AL Metropolitan Statistical Area	4.8
22	Richmond, VA Metropolitan Statistical Area	4.8
22	San Diego-Carlsbad, CA Metropolitan Statistical Area	4.8
25	Orlando-Kissimmee-Sanford, FL Metropolitan Statistical Area	4.9
25	Phoenix-Mesa-Scottsdale, AZ Metropolitan Statistical Area	4.9
25	Portland-Vancouver-Hillsboro, OR-WA Metropolitan Statistical Area	4.9
28	Tampa-St. Petersburg-Clearwater, FL Metropolitan Statistical Area	5.0

(p) Preliminary Figures

NOTE: Rates shown are a percentage of the labor force. Data refer to place of residence. Estimates for the current month are subject to revision the following month. There are 51 large metropolitan areas; 23 had April 2015 unemployment rates over 5%.

Source: U.S. Department of Commerce, Bureau of Labor Statistics (BLS).

³⁸ As of the publication of this report, May unemployment figures on an MSA level have not been released.



The Boston area maintains one of the largest employee bases in the nation, as shown in Exhibit 3-4. Boston is ranked 8th in the nation with over 2.5 million employees as of April 2015, compared to a population rank of 10th. Showing modest signs of growth, Boston area employment is up 1.7 percent from April 2014, compared to a 1.5 percent increase over the same time period from 2013 to 2014.

Exhibit 3-4: Non-Agricultural Employment for Major Metropolitan Areas and Total U.S. (April 2014 to April 2015)

	Employee	Non-Farm Em	plovees (000)	Net	Pct	Rank by Percent
Metropolitan Area	Rank	Apr 2015 (p)	Apr 2014	Change	Change	Change
New York-Newark-Jersey City, NY-NJ-PA	1	9,227.20	9,091.30	135.9	1.5%	13
Los Angeles-Long Beach-Anaheim, CA	2	5,854.70	5,694.60	160.1	2.8%	6
Chicago-Naperville-Elgin, IL-IN-WI	3	4,530.00	4,469.80	60.2	1.3%	14
Dallas-Fort Worth-Arlington, TX	4	3,370.50	3,244.70	125.8	3.9%	1
Washington-Arlington-Alexandria, DC-VA-MD-WV	5	3,167.00	3,101.40	65.6	2.1%	10
Houston-The Woodlands-Sugar Land, TX	6	2,972.70	2,903.60	69.1	2.4%	9
Philadelphia-Camden-Wilmington, PA-NJ-DE-MD	7	2,815.80	2,784.20	31.6	1.1%	15
Boston-Cambridge-Nashua, MA-NH NECTA	8	2,621.70	2,577.40	44.3	1.7%	12
Atlanta-Sandy Springs-Roswell, GA	9	2,566.30	2,483.10	83.2	3.4%	5
Miami-Fort Lauderdale-West Palm Beach, FL	10	2,503.80	2,421.00	82.8	3.4%	3
San Francisco-Oakland-Hayward, CA	11	2,241.40	2,167.80	73.6	3.4%	4
Detroit-Warren-Dearborn, MI	12	1,926.30	1,873.90	52.4	2.8%	7
Minneapolis-St. Paul-Bloomington, MN-WI	13	1,912.90	1,878.30	34.6	1.8%	11
Phoenix-Mesa-Scottsdale, AZ	14	1,906.60	1,855.30	51.3	2.8%	8
Seattle-Tacoma-Bellevue, WA	15	1,887.10	1,816.80	70.3	3.9%	2
Sub Total:		49,504.0	48,363.2	1,140.8	2.4%	
Rest Of U.S.		92,935.0	91,292.2	1,642.8	1.8%	
Total U.S.		142,439.0	139,655.4	2,783.6	2.0%	

(p) Preliminary Figures

NOTE: Data are counts of jobs by place of work. Estimates subsequent to the current benchmark are preliminary and will be revised when new information becomes available. Area delineations are based on Office of Management and Budget Bulletin No. 13-01, dated February 28, 2013, and are available on the BLS website at www.bls.gov/lau/lausmsa.htm. Areas in the six New England states are Metropolitan New England City and Town Areas (NECTAs), while areas in other states are county-based. Some metropolitan areas lie in two or more states. They are listed under the state containing the first principal city, unless otherwise footnoted. Estimates for the latest month are subject to revision the following month. Principal cities in the Boston-Cambridge-Quincy, MA-NH Metropolitan NECTA include Boston, MA, Cambridge, MA, Quincy, MA, Nashua, NH, Newton, MA, Framingham, MA, Waltham, MA and Peabody, MA.



^{*} Area boundaries do not reflect official OMB definitions.

The leading industries for employment (accounting for approximately half of non-farm employees) in Boston and Massachusetts are Education and Health Services; Trade, Transportation, and Utilities; and Professional and Business Services. As reflected in Exhibit 3-5, preliminary figures for May 2015 show that Education and Health Care Services account for 21.6 percent of Massachusetts' non-farm employees; Trade, Transportation and Utilities account for 16.1 percent; and Professional and Business Services represent approximately 15.3 percent of non-farm employees in Massachusetts.

Exhibit 3-5: Non-Agricultural Employment by Industry Sector for Massachusetts and the U.S. (May 2014 to May 2015)

	May 201 Non-Farm Empl	/	May 20 Non-Farm Empl		Percent Change from Prior Year		
Industry Sector	US	MA	US	MA	US	MA	
Education & Health Services	22,088.0	755.9	21,468.0	738.3	2.9%	2.4%	
Trade, Transportation, & Utilities	26,791.0	563.7	26,228.0	560.1	2.1%	0.6%	
Professional & Business Services	19,688.0	536.1	19,002.0	517.8	3.6%	3.5%	
Government	22,318.0	472.8	22,217.0	460.8	0.5%	2.6%	
Leisure & Hospitality	15,393.0	353.8	14,942.0	347.0	3.0%	2.0%	
Manufacturing	12,314.0	249.6	12,140.0	249.7	1.4%	0.0%	
Financial Activities	8.101.0	209.6	7.940.0	207.3	2.0%	1.1%	
Other Services	5,661.0	136.0	5,600.0	132.9	1.1%	2.3%	
Construction	6,441.0	134.3	6,151.0	129.9	4.7%	3.4%	
Information	2.787.0	86.5	2.725.0	86.0	2.3%	0.6%	
Natural Resources & Mining	838.0	1.0	884.0	1.1	-5.2%	-9.1%	
Total	142,420.0	3,499.3	139,297.0	3,430.9	2.2%	2.0%	
Percent of Total					MA More/Les	ss than US	
Education & Health Services	15.5%	21.6%	15.4%	21.5%		6.1%	
Trade, Transportation, & Utilities	18.8%	16.1%	18.8%	16.3%	=	2.7%	
Professional & Business Services	13.8%	15.3%	13.6%	15.1%		1.5%	
Government	15.7%	13.5%	15.9%	13.4%	=	2.2%	
Leisure & Hospitality	10.8%	10.1%	10.7%	10.1%	_	0.7%	
Manufacturing	8.6%	7.1%	8.7%	7.3%	-	1.5%	
Financial Activities	5.7%	6.0%	5.7%	6.0%		0.3%	
Other Services	4.0%	3.9%	4.0%	3.9%	-	0.1%	
Construction	4.5%	3.8%	4.4%	3.8%	-0.7%		
Information	2.0%	2.5%	2.0%	2.5%		0.5%	
Natural Resources & Mining	0.6%	0.0%	0.6%	0.0%	-	0.6%	
Total	100.0%	100.0%	100.0%	100.0%			

(p) Preliminary Figures



Since 2000, employment in the Education and Health Services sector has increased the fastest, while the Manufacturing sector showed the largest decline (Exhibit 3-6). Education and Health Services increased from 16.5 percent to 21.6 percent of the Commonwealth's non-agricultural employment from 2000 to 2015. Manufacturing decreased from 12.0 percent of non-agricultural employment in 2000 to 7.1 percent in 2015.

Exhibit 3-6: Non-Agricultural Employment by Industry Sector for Massachusetts (May 2000 to May 2015)

	Non-Farm	Employe	es (000)	Perc	ent Cha	nge	Net C	hange (0	000s)
Industry Sector	2000	2010	2015	00-10	10-15	00-15	00-10	10-15	00-15
Education & Health Services	549.7	687.5	755.9	2.3%	1.9%	2.1%	137.8	68.4	206.2
Trade, Transportation, & Utilities	590.5	542.0	563.7	-0.9%	0.8%	-0.3%	(48.5)	21.7	(26.8)
Professional & Business Services	487.0	464.2	536.1	-0.5%	2.9%	0.6%	(22.8)	71.9	49.1
Government	452.7	460.2	472.8	0.2%	0.5%	0.3%	7.5	12.6	20.1
Leisure & Hospitality	277.8	313.4	353.8	1.2%	2.5%	1.6%	35.6	40.4	76.0
Manufacturing	402.0	252.4	249.6	-4.5%	-0.2%	-3.1%	(149.6)	(2.8)	(152.4)
Financial Activities	226.0	207.6	209.6	-0.8%	0.2%	-0.5%	(18.4)	2.0	(16.4)
Other Services	110.9	119.1	136.0	0.7%	2.7%	1.4%	8.2	16.9	25.1
Construction	129.0	108.7	134.3	-1.7%	4.3%	0.3%	(20.3)	25.6	5.3
Information	110.4	85.7	86.5	-2.5%	0.2%	-1.6%	(24.7)	0.8	(23.9)
Natural Resources & Mining	1.5	1.3	1.0	-1.4%	-5.1%	<i>-</i> 2.7%	(0.2)	(0.3)	(0.5)
Total	3,337.5	3,242.1	3,499.3	-0.3%	1.5%	0.3%	(95.4)	257.2	161.8
Percent of Total									
Education & Health Services	16.5%	21.2%	21.6%	2.6%	0.5%	2.0%			
Trade, Transportation, & Utilities	17.7%	16.7%	16.1%	-0.6%	-0.9%	-0.7%			
Professional & Business Services	14.6%	14.3%	15.3%	-0.2%	1.7%	0.3%			
Government	13.6%	14.2%	13.5%	0.5%	-1.2%	0.0%			
Leisure & Hospitality	8.3%	9.7%	10.1%	1.5%	1.1%	1.4%			
Manufacturing	12.0%	7.8%	7.1%	-4.3%	-2.2%	-3.7%			
Financial Activities	6.8%	6.4%	6.0%	-0.6%	-1.7%	-0.9%			
Other Services	3.3%	3.7%	3.9%	1.0%	1.4%	1.1%			
Construction	3.9%	3.4%	3.8%	-1.4%	3.4%	-0.1%			
Information	3.3%	2.6%	2.5%	-2.2%	-1.7%	-2.1%			
Natural Resources & Mining	0.0%	0.0%	0.0%	-1.1%	-8.1%	-3.2%			
Total	100.0%	100.0%	100.0%						



3.2.1.1 Employers

As shown in Exhibit 3-7, 12 Fortune 500 companies are headquartered in Massachusetts. In 2013, revenues for the Massachusetts-based Fortune 500 firms ranged from \$6.9 billion (Biogen Idec) to \$39.1 billion (Liberty Mutual Insurance). These companies span several different industry sectors including insurance, aerospace, finance, technology and pharmaceuticals. The same 12 companies appeared on the 2013 list, indicating a steady business base in Massachusetts. In comparing the 2013 list of Fortune 500 companies to the 2014 list, Staples and Raytheon swapped ranks 4 and 5, with Raytheon now ranking above Staples; a similar switch occurred between Northeast Utilities and Boston Scientific, with Northeast Utilities now ranked 10th in Massachusetts.

Exhibit 3-7: Massachusetts Fortune 500 Companies (Ranked by 2013 Revenue)

Fort	une 500					
2014	2014	2013			2013 Rev.	Employees
MA	Nation	Nation	Company (Location)	Industry	(Billions)	(thousands)
1	76	81	Liberty Mutual Insurance Group (Boston)	Insurance: Property and Casualty (stock)	\$39.1	50.0
2	96	94	Mass.Mutual Life Insurance (Springfield)	Insurance: Life, Health (mutual)	\$33.4	10.0
3	108	115	TJX (Framingham)	Specialty Retailers: Apparel	\$27.4	191.0
4	126	124	Raytheon (Waltham)	Aerospace and Defense	\$23.7	63.0
5	127	122	Staples (Framingham)	Specialty Retailers: Other	\$23.3	46.4
6	128	133	EMC (Hopkinton)	Computer Peripherals	\$23.2	63.9
7	146	157	Global Partners (Waltham)	Wholesalers: Diversified	\$19.6	0.8
8	215	220	Thermo Fisher Scientific (Waltham)	Scientific, Photographic, and Control Equip.	\$13.1	50.0
9	275	268	State Street Corp. (Boston)	Commercial Banks	\$10.3	29.4
10	359	402	Northeast Utilities (Springfield)	Utilities: Gas and Electric	\$7.3	8.7
11	367	357	Boston Scientific (Natick)	Medical Products and Equipment	\$7.1	23.0
12	375	454	Biogen Idec (Weston)	Pharmaceuticals	\$6.9	6.9

Note: The Fortune 500 excludes private companies that do not file financial statements with a government agency; companies incorporated outside the U.S.; and U.S. companies owned or controlled by other companies, domestic or foreign, that file with a government agency. Employees are global figures.

Source: CNN Money, April 2015; Boston Business Journal and company websites.

3.2.1.2 Leading Massachusetts Industries

Six major industries have posted large contributions to the Boston region's economy since the early 1990s and currently account for approximately one half of the Boston area employment base.

These leading industries are:

High technology
 Biotechnology
 Health care
 Financial services
 Higher Education
 Tourism



High Technology

The high technology industry encompasses a number of economic activities that cut across traditional definitions of industrial sectors. Massachusetts high technology companies are heavily involved in computer software and related information technology development, research and development related to new technology products and procedures, and the manufacture and/or distribution of computer and electronic related equipment.

Biotechnology

Boston is one of the leading centers for biotechnology (including pharmaceuticals and medical devices) in the U.S. The existence of a well-trained and highly educated work force and the wealth of medical and higher education facilities and personnel in the region make the Boston area one of the most desirable locations in the nation for the biotechnology industry. The top 20 employers in this industry employed over 21,000 people in 2014.³⁹

Healthcare

Boston has a world-renowned reputation as a leader in the health care industry, which is a strong driver of the local economy. From medical education to training, research and the provision of medical services, Boston's medical institutions perform a wide variety of activities. The large amount of research and health care related activities at these institutions also act as a driver of other health care related industries, such as the biotech industry. The top 20 hospitals in the region accounted for approximately 101,000 full-time employees in 2013.⁴⁰

Financial Services

The Boston area is also a leader in the financial services industry. A substantial number of mutual fund companies, hedge funds, venture capital firms and wealth management and financial advisory companies are based in or have significant operations in Boston.

Education

Massachusetts is the home of some of the nation's most prestigious colleges and universities. These higher education institutions attract undergraduate and graduate students from across the U.S. and around the world. The top 20 regional institutions have a combined total enrollment of over 233,000 students. These institutions play an important role in the regional economy, not only in terms of their direct workforce but also by spawning important scientific research that in turn leads to industry developments. A significant portion of the region's growth in high technology, biotechnology, financial services and health care emanates from the graduates and research produced by the area's universities. These well-known universities also provide a continuous supply of well-educated and highly trained workers for Boston's economy.

⁴¹ Ibid.



³⁹ Boston Business Journal, Book of Lists 2015.

⁴⁰ Ibid.

Tourism

Tourism is an integral part of the Massachusetts economy. Millions of people visit Massachusetts and Boston every year to enjoy its rich historic and cultural heritage, attend cultural or sporting events, conduct business, visit area beaches and attend conventions at one of Boston's convention centers. Massachusetts attracted 25.0 million domestic and international visitors in 2013.⁴² Domestic and international travelers in Massachusetts spent \$18.5 billion on transportation, lodging, food, entertainment, recreation and retail shopping in 2013, representing an increase of 4.2 percent from 2012. Visitor spending in the Commonwealth during the same time period supported approximately 129,400 jobs (a 2.3 increase from 2012) and a payroll totaling \$3.9 billion (a 5.0 percent increase from 2012).⁴³

3.3 Historical Socioeconomic Trends and Future Outlook

3.3.1 Population

Massachusetts has a slow growing population base compared to the U.S. overall, but the Commonwealth's population is extremely clustered within the Boston metro area. The Massachusetts Data Center estimates that population density is currently 864.8 persons per square mile versus 90.3 on a national level. Only two states are reported to be more concentrated than Massachusetts: Rhode Island and New Jersey.⁴⁴ As of 2013, the population within the Boston Service Area is estimated at 5.6 million. As shown in Exhibit 3-8, since 1990, the population of the Boston Service Area has grown slightly faster than the Massachusetts population but slower than the U.S. population as a whole. From 2000 to 2013, the population of the Boston Service Area grew by 0.5 percent per year compared to the U.S. population growth of 0.9 percent per year.

⁴⁴ Massachusetts State Data Center, Due Diligence Report, Second Quarter FY 2015.



⁴² Massachusetts Office of Travel and Tourism.

⁴³ Massachusetts Office of Travel & Tourism, *The Economic Impact of Travel on Massachusetts Counties*, 2013

Exhibit 3-8: Historical and Forecast Regional and National Population Growth (1990 to 2030)

	Hist	Historical Estimated Forecast				
	1990	2000	2013	2015	2020	2030
Population (in 000s)						
Boston Service Area	5,004.1	5,298.3	5,622.5	5,675.8	5,832.6	6,144.0
Massachusetts	6,022.6	6,361.1	6,692.8	6,753.6	6,933.2	7,289.7
New England	13,229.5	13,949.7	14,618.8	14,760.2	15,175.2	16,003.3
Total US	249,622.8	282,162.4	316,128.8	321,449.2	336,499.6	368,462.4
Boston Service Area Pop	ulation as a	Percent of:				
% of Massachusetts	83.1%	83.3%	84.0%	84.0%	84.1%	84.3%
% of New England	37.8%	38.0%	38.5%	38.5%	38.4%	38.4%
% of US Total	2.0%	1.9%	1.8%	1.8%	1.7%	1.7%
	10 Years	13 Years	2 Years	5 Years	10 Years	17 Years
Average Annual Growth	<u>'90-'00</u>	<u>'00-'13</u>	<u>'13-'15</u>	<u>'15-'20</u>	<u>'20-'30</u>	<u>'13-'30</u>
Boston Service Area	0.6%	0.5%	0.5%	0.5%	0.5%	0.5%
Massachusetts	0.5%	0.4%	0.5%	0.5%	0.5%	0.5%
New England	0.5%	0.4%	0.5%	0.6%	0.5%	0.5%
Total US	1.2%	0.9%	0.8%	0.9%	0.9%	0.9%

Note: The Boston Service Area includes Bristol, Essex, Middlesex, Norfolk, Plymouth, Suffolk and Worcester Counties; 1969-2013 Woods & Poole population data is historical from the U.S. Department of Commerce.

Source: Woods & Poole Economics.

Population growth for the Boston Service Area is forecast by Woods & Poole Economics⁴⁵ to increase by 0.5 percent annually through 2030, which is the same growth rate as for Massachusetts and New England (Exhibit 3-8). The Boston Service Area is a mature, densely populated region, and as a result, population is forecast to grow more slowly than the national average; the U.S. average annual population growth rate is forecast at 0.9 percent through 2030.

3.3.1 Personal Income and Per Capita Income

Personal income for the Boston Service Area has historically increased at a faster rate than personal income for New England and the U.S. As shown in Exhibit 3-9, from 1990 to 2000, total personal income for the Boston Service Area grew by 3.8 percent annually, compared to 3.3 percent for New England and 3.7 percent for the nation. However, average annual personal income growth for the Boston service area and Massachusetts slowed to 1.5 percent between 2000 and 2013 compared to 1.9 percent for the U.S.

Per capita income levels in Boston have been consistently higher than those of the New England region and the rest of the U.S. In 2013, Boston's per capita income is estimated at \$54,778, approximately 7.3 percent higher than New England's per capita income and 31.3 percent higher than the U.S. average. As shown in Exhibit 3-9, per capita income in the Boston area increased at an average annual rate of 2.0 percent in the 23-year period between 1990 and 2013. During

⁴⁵ Woods and Poole Economics is a Washington-based economic research, forecasting and data services firm that specializes in developing forecasts of economic and demographic information derived from U.S. Census data.



the same period, New England per capita income grew at 1.8 percent annually and national per capita income grew at 1.6 percent annually.

Exhibit 3-9: Historical and Forecast Regional and National Income Growth (1990 to 2013 Estimate)

	Historical		Estimated		Forecast	
	1990	2000	2013	2015	2020	2030
Total Income (Millions)						
Boston Service Area	\$175,650	\$254,556	\$307,987	\$319,985	\$353,832	\$426,789
Massachusetts	\$206,061	\$294.063	\$356,975	\$371.141	\$410,613	\$495,414
New England	\$446,476	\$619,110	\$746,357	\$777,020	\$860,498	\$1,039,314
Total US	\$7,248,655	\$10,381,867	\$13,184,706	\$13,829,017	\$15,576,939	\$19,510,989
% of Massachusetts	85.2%	86.6%	86.3%	86.2%	86.2%	86.1%
% of New England	39.3%	41.1%	41.3%	41.2%	41.1%	41.1%
% of US Total	2.4%	2.5%	2.3%	2.3%	2.3%	2.2%
	10 Years	13 Years	23 Years	5 Years	10 Years	17 Years
Average Annual Growth	<u>'90-'00</u>	<u>'00-'13</u>	<u>'90-'13</u>	<u>'15-'20</u>	<u>'20-'30</u>	<u>'13-'30</u>
Boston Service Area	3.8%	1.5%	2.5%	2.0%	1.9%	1.9%
Massachusetts	3.6%	1.5%	2.4%	2.0%	1.9%	1.9%
New England	3.3%	1.4%	2.3%	2.1%	1.9%	2.0%
Total US	3.7%	1.9%	2.6%	2.4%	2.3%	2.3%
Per Capita Income						
Boston Service Area	\$35,101	\$48,044	\$54,778	\$56,377	\$60,665	\$69,464
Massachusetts	\$34,214	\$46,228	\$53,337	\$54,955	\$59,224	\$67,960
New England	\$33,749	\$44,382	\$51,055	\$52,643	\$56,704	\$64,944
Total US	\$29,038	\$36,794	\$41,707	\$43,021	\$46,291	\$52,952
% of Massachusetts	102.6%	103.9%	102.7%	102.6%	102.4%	102.2%
% of New England	104.0%	108.3%	107.3%	107.1%	107.0%	107.0%
% of US Total	120.9%	130.6%	131.3%	131.0%	131.1%	131.2%
	10 Years	13 Years	23 Years	5 Years	10 Years	17 Years
Average Annual Growth	<u>'90-'00</u>	<u>'00-'13</u>	<u>'90-'13</u>	<u>'15-'20</u>	<u>'20-'30</u>	<u>'13-'30</u>
Boston Service Area	3.2%	1.0%	2.0%	1.5%	1.4%	1.4%
Massachusetts	3.1%	1.1%	1.9%	1.5%	1.4%	1.4%
New England	2.8%	1.1%	1.8%	1.5%	1.4%	1.4%
Total US	2.4%	1.0%	1.6%	1.5%	1.4%	1.4%

Note: The Boston Service Area includes Bristol, Essex, Middlesex, Norfolk, Plymouth, Suffolk, and Worcester Counties; 2013 numbers are estimates; figures in 2009 dollars.

Source: Woods & Poole Economics.

From 2013 to 2030, total personal income in the Boston Service Area, reflecting growth in population and average income, is forecast to grow at 1.9 percent annually, while per capita income is forecast to grow 1.4 percent annually (Exhibit 3-9). For this time period, Boston is projected to parallel growth for New England (projected at 2.0 percent), but lag the national U.S. projected growth of 2.3 percent.



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4. BOSTON LOGAN INTERNATIONAL AIRPORT TRAFFIC AND SERVICE CHARACTERISTICS

4.1 Introduction

Boston Logan International Airport is the busiest commercial airport in New England serving a record 31.6 million commercial airline passengers in CY 2014. Logan is the principal airport for the greater Boston metropolitan area and the international and long-haul gateway for much of New England. In recent years, Logan's passenger traffic has fully recovered from the global recession and accompanying depressed air traffic levels of 2008-2009 and has grown to new record levels. The Airport is one of the leading U.S. airports in terms of air passenger volume and airline revenue generation and continues to be a highly desirable market for air carriers.

A rapid increase in LCC service at the Airport over the past decade has contributed significantly to growth in the Boston market. JetBlue began service at Logan Airport in 2004 and has grown to be the market leader. Logan is currently JetBlue's second largest focus city after New York-JFK. As of July 2015, JetBlue is scheduled to operate 125 daily departures from Logan. Other recent LCC entrants to the Boston market include Southwest Airlines and Virgin America, which both initiated Logan services in 2009. Southwest has also expanded significantly at Logan and operates 35 daily departures from Logan as of July 2015.

Historically, Logan has consistently rebounded from setbacks and periods of weak demand. The Airport recovered after 9/11, with passenger traffic in 2007 exceeding the previous peak achieved in 2000. Similarly, Logan recovered from the extraordinary rise in fuel prices and the global economic downturn that depressed traffic levels in 2008 and 2009, reaching new record-high passenger levels in 2011 and in each of the subsequent years.

Similar to other large hub airports across the U.S., over the past decade Logan has experienced increasing aircraft size and passenger load factors. In CY 2014, there were 337,000 commercial airline operations at Logan, 25 percent lower than 2000 levels. Compared to 2013, in CY 2014 aircraft operations increased by only 0.8 percent, while Airport passengers grew by 4.7 percent. Part of this difference was caused by a shift in aircraft fleet mix at Logan. Many of the small regional jet (RJ) ⁴⁶ aircraft (with 30 to 50 seats) were replaced with larger RJs and turboprops (generally with 70 or more seats) after fuel prices climbed to record high levels. This change in aircraft fleet mix has had a dramatic effect on the average number of passengers per operation at Logan, which climbed from 61 in the 2000 to 93 in 2014.

⁴⁶ Regional jets ("RJs") are small jet powered aircraft with 90 or fewer seats. RJs operate at higher speeds and can fly longer stage lengths than turboprops. The operating range for a typical RJ is 800 to 1,000 miles, compared to 400 miles for a turboprop. The distinction between RJs and jets is blurring as larger regional jet models with up to 100 seats have been introduced. In this report, RJs over 90 seats are included in the large jet category.



This section reviews recent and long-term trends in passenger traffic, airline service, aircraft activity, air cargo and general aviation at Logan. A comparison of Logan's performance to that of other large U.S. airports is also presented.

4.2 Logan Airport Service Area

Logan Airport fulfills a number of roles in the local, New England and national air transportation networks:

- 1. Logan is the primary airport serving the Boston metropolitan area, and is the principal New England airport for long-haul services;
- 2. Logan is a major U.S. international gateway airport for transatlantic services;
- 3. Logan serves as a regional connecting hub for small northern New England markets and the Massachusetts maritime counties of Barnstable, Dukes and Nantucket; and
- 4. Logan is the busiest air cargo center in New England.

An airport's service area refers to the local geographic region from which it draws passengers. The quality of service at an airport, as well as the proximity, accessibility and service offerings of other airports in the region, generally determine airport service area boundaries. The "core" or primary service area generates the majority of an airport's passengers. The secondary service area extends outward from the core and may overlap with the service areas of other airports.

The primary service area for Logan Airport consists of Suffolk, Middlesex, Norfolk, Essex and Plymouth counties in Massachusetts, referred to as the "Boston Service Area" (Exhibit 4-1). Logan is the principal commercial airport serving this region. While Hanscom Field (also owned and operated by Massport), is located within Logan's primary service area, it currently has no scheduled commercial operations and serves as a general aviation reliever airport to Logan.



Bangor International # Burlington International Portland International Primary Service Area Secondary Service Air Carrier Airports Manchester ተ General Aviation Reliever Hanscom O Boston Logan International Worcester Regional **Boston Logan** Bradley International International Norfolk 2014 **Driving Distance to Passengers Airport** Boston Boston Logan 31,634,445 Bradley International 102 mi 5,875,801 T.F. Green 50 mi 3,566,769 Manchester-Boston 58 mi 2,095,674 108 mi Portland 1,665,209 Burlington 224 mi 1,223,610 Bangor 240 mi 489,977 Worcester 49 mi 116,711 Hanscom 22 mi

Exhibit 4-1: Boston Logan Airport, Primary and Secondary Service Areas

Note: Worcester and Hanscom airports are owned by the Authority.

Sources: Massport and airport records.



The Airport's secondary service area encompasses the rest of Massachusetts and the other New England states. Smaller regional commercial service airports, such as T.F. Green in Warwick, Rhode Island and Manchester-Boston in Manchester, New Hampshire are located in the secondary service area and have some overlap with and may draw some of their passengers from Logan's primary service area, though this trend has waned in recent years as LCC services expanded at Logan and airlines withdrew many services from the secondary airports.

Other commercial service airports in the Airport's secondary service area are Worcester Regional Airport in Worcester, Massachusetts, which is also owned by Massport;⁴⁷ Portland International Jetport in Portland, Maine; Bangor International Airport in Bangor, Maine; Bradley International Airport in Hartford, Connecticut; and Burlington International Airport in Burlington, Vermont.

4.3 Airport Passengers

In CY 2014, Logan Airport served a record 31.6 million total passengers. Compared to CY 2013, total passengers at the Airport saw an increase of 4.7 percent. A history of Logan's passenger traffic is presented in Exhibit 4-2.

Passenger traffic at the Airport fully recovered from the 2008-2009 global economic downturn, returning to pre-recession levels in 2011 and reaching new records in each subsequent year. Factors contributing to traffic recovery and growth at Logan include the continued expansion of JetBlue at the Airport, the entry of other LCCs such as Southwest and Virgin America, sharp service reductions at secondary airports in the region (T.F. Green and Manchester-Boston), and new international air service. Over the long term, despite the numerous external shocks and challenges, from 2000 to 2014, Logan's passenger traffic grew by an average 0.9 percent per year, which was consistent with the total traffic growth in the U.S.⁴⁸

⁴⁸ Bureau of Transportation Statistics.



⁴⁷ On July 1, 2010, in accordance with the Commonwealth's Transportation Reform Act, Massport assumed ownership of the Worcester Regional Airport from the City of Worcester. In November 2013, JetBlue commenced daily nonstop services from Worcester to Orlando and Ft. Lauderdale, which it still serves as of June 2015.

Exhibit 4-2: Historical Passenger Traffic at Boston Logan Airport (CY 1970 to CY 2014)

	BOS Pas	ssengers (000s) ^{\1}	General	Logan	U.S. Pass	sengers (0	00s) ^{\2}
Year	Domestic	Intl.	Total	Aviation	Total	Domestic	Intl.	Total
1970	8,476	916	9,393	n/a	9,393	153,662	16,260	169,922
1980	12,564	2,159	14,722	n/a	14,722	247,069	49,831	296,901
1990	19,455	3,359	22,814	n/a	22,814	423,566	41,992	465,558
2000	23,101	4,513	27,614	113	27,727	610,601	55,549	666,149
2001	20,070	4,301	24,371	104	24,475	570,126	52,003	622,129
2002	18,725	3,882	22,608	88	22,696	561,530	52,808	614,338
2003	18,890	3,816	22,706	85	22,791	593,593	53,876	647,470
2004	21,830	4,202	26,032	111	26,143	641,470	62,222	703,692
2005	22,729	4,237	26,966	122	27,088	670,417	68,211	738,628
2006	23,556	4,050	27,606	119	27,725	671,799	72,929	744,728
2007	23,838	4,153	27,991	111	28,102	693,372	76,250	769,622
2008	22,032	3,977	26,010	93	26,103	665,734	77,580	743,313
2009	21,767	3,696	25,463	49	25,512	630,458	73,443	703,901
2010	23,688	3,682	27,370	59	27,429	641,602	78,894	720,496
2011	24,831	3,962	28,794	114	28,908	649,880	80,917	730,797
2012	24,743	4,384	29,127	109	29,236	653,274	83,427	736,701
2013	25,578	4,546	30,124	95	30,219	657,172	85,926	743,098
2014	26,546	4,992	31,538	96	31,634	*	*	762,097
Average A	nnual Growth	<u>1</u>						
1970-1980	4.0%	8.9%	4.6%	-	4.6%	4.9%	11.9%	5.7%
1980-1990	4.5%	4.5%	4.5%	-	4.5%	5.5%	-1.7%	4.6%
1990-2000	1.7%	3.0%	1.9%	-	2.0%	3.7%	2.8%	3.6%
2000-2010	0.3%	-2.0%	-0.1%	-6.3%	-0.1%	0.5%	3.6%	0.8%
2010-2014	2.9%	7.9%	3.6%	13.1%	3.6%	-	-	1.4%
Percent Ch	ange Over P	rior Year						
2010	8.8%	-0.4%	7.5%	20.7%	7.5%	1.8%	7.4%	2.4%
2011	4.8%	7.6%	5.2%	94.7%	5.4%	1.3%	2.6%	1.4%
2012	-0.4%	10.6%	1.2%	-4.6%	1.1%	0.5%	3.1%	0.8%
2013	3.4%	3.7%	3.4%	-13.1%	3.4%	0.6%	3.0%	0.9%
2014	3.8%	9.8%	4.7%	1.4%	4.7%	-		2.6%

^{*} Data not yet released.

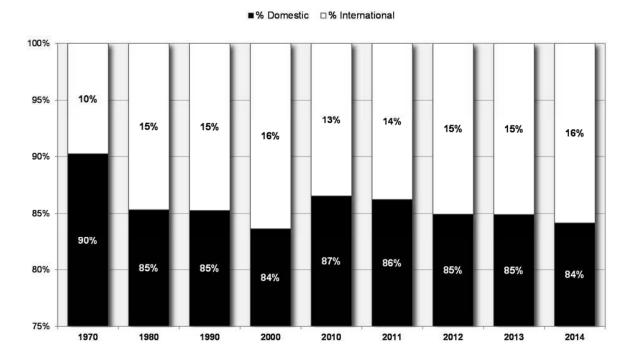
Source: Massport and A4A.



^{\1} Includes commercial airline passengers and general aviation passengers. General aviation passengers include passengers flying on private, corporate and on-demand air taxi flights.

As shown in Exhibit 4-3 below, the traffic mix at the Airport is strongly domestic, with 84 percent of the Airport's total passengers in 2014 accounted by domestic passenger. The international segment represented 16 percent in 2014, below the high of 18 percent share achieved in 2001. Historical growth trends in each of these segments are discussed in the following sections.

Exhibit 4-3: Logan Domestic and International Share of Commercial Passenger Traffic (CY 1970 to CY 2014)



Note: Excludes general aviation passengers.

Source: Massport.

Logan Airport is among the top U.S. airports in terms of total passengers, ranking as the 18th busiest airport in CY 2014 (Exhibit 4-4). Logan is also one of the fastest growing FAA large hubs.⁴⁹ In CY 2014, passenger traffic at Logan increased by 4.7 percent over the prior year, substantially faster than the large hub average growth of 3.1 percent. Annual passenger growth at Logan since 2009 has averaged 4.4 percent, ranking 5th among U.S. large hub airports, and outperforming most of its peer group airports (Exhibit 4-5).

⁴⁹ The FAA defines large hubs as airports that enplane at least one percent of total U.S. air passengers. There are currently 29 large hub airports, excluding Honolulu (HNL).



Exhibit 4-4: Ranking of U.S. Large Hub Airports Based on Total Passengers (CY 2014)

Rank	Airport	Passengers (millions)	% Change from 2013	Rank	Airport	Passengers (millions)	% Change from 2013
1	Atlanta	96.2	1.9%	16	Orlando	34.8	-2.6%
2	Los Angeles	70.7	6.0%	17	Detroit	32.5	0.4%
3	Chicago O'Hare	70.1	4.5%	18	Boston	31.6	4.7%
4	Dallas/Fort Worth	63.5	5.1%	19	Philadelphia	30.7	0.8%
5	New York - JFK	54.8	5.5%	20	New York - LGA	28.0	1.0%
6	Denver	53.5	1.7%	21	Fort Lauderdale	24.6	4.6%
7	San Francisco	47.2	4.8%	22	Baltimore	22.3	-0.8%
8	Charlotte	44.3	1.9%	23	Washington Dulles	21.6	-1.7%
9	Las Vegas	42.9	2.4%	24	Chicago Midway	21.2	3.4%
10	Phoenix	42.1	4.4%	25	Salt Lake City	21.1	4.7%
11	Houston - IAH	41.3	3.6%	26	Washington National	20.8	1.9%
12	Miami	40.9	0.9%	27	San Diego	18.8	5.9%
13	Seattle/Tacoma	37.5	7.7%	28	Tampa	17.6	3.7%
14	New York - EWR	36.8	1.6%	29	Portland	15.9	5.9%
15	Minneapolis	35.1	3.7%				
	Total Large Hubs	1,118.3	3.1%				

Sources: Publicly available records from airport websites; Massport.



Exhibit 4-5: Fastest Growing U.S. Large Hub Airports Total Passengers (CY 2009 vs. CY 2014)

Rank	Airport	Passenger 2009	rs (millions) 2014	Average Annual Growth
1	Charlotte	34.5	44.2	5.1%
2	San Francisco	37.2	46.9	4.7%
3	Los Angeles	56.4	70.6	4.6%
4	Houston - IAH	17.1	21.2	4.4%
5	Boston	25.5	31.6	4.4%
6	Portland	12.9	15.9	4.2%
7	New York - LGA	22.1	26.9	4.0%
8	Miami	33.7	40.5	3.7%
9	Seattle/Tacoma	31.2	37.4	3.7%
10	Washington National	17.5	20.9	3.6%
11	Fort Lauderdale	21.0	24.7	3.2%
12	New York - JFK	45.9	53.1	2.9%
13	Dallas/Fort Worth	55.8	63.4	2.6%
14	Phoenix	37.7	42.0	2.2%
15	San Diego	16.9	18.7	1.9%
16	Minneapolis	32.2	35.1	1.7%
17	Chicago O'Hare	64.5	70.0	1.7%
18	Atlanta	89.5	96.0	1.4%
19	Baltimore	21.0	22.4	1.3%
20	Denver	50.3	53.5	1.2%
21	New York - EWR	33.4	35.5	1.2%
22	Las Vegas	40.5	43.0	1.2%
23	Orlando	33.6	35.6	1.1%
24	Detroit	31.2	32.4	0.8%
25	Salt Lake City	20.4	21.1	0.7%
26	Tampa	17.0	17.6	0.6%
27	Houston Intercontinental	40.1	41.1	0.5%
28	Philadelphia	30.5	30.8	0.2%
29	Washington Dulles	23.2	21.5	-1.5%
	Total Large Hub	993.1	1,113.7	2.3%

Note: Total passengers based on enplaned passengers times two. Sources: Publicly available records from airport websites; Massport



Logan is an extremely competitive market where multiple carriers compete actively for passenger traffic share. In 2010, JetBlue surpassed Delta as the leading airline at Logan Airport, capturing 5.1 million passengers for an 18.7 percent market share. In 2014, JetBlue carried approximately 8.4 million passengers, maintaining a Logan market share of close to 27 percent. The combined American Airlines and US Airways now represent the second largest carrier at Logan following the merger of the two airlines in December 2013. American and US Airways together carried 7.1 million passengers, which was 22.3 percent of total passengers at Logan. Delta and its regional affiliates ranked third with 4.5 million passengers, or 14.3 percent of the total. United ranked fourth with an 11.6 percent market share, followed by the merged Southwest/AirTran, which captured 8.0 percent of Airport passengers. In 2014, the top five carriers together accounted for approximately 83 percent of the Airport's passenger traffic. With the exception of Delta, the top carriers saw their market shares slip slightly from 2013, due to growth by many of the other carriers at the Airport and also the entry of new airlines. The breakdown of airline passenger market share at Logan is presented in Exhibit 4-6.

Exhibit 4-6: Airline Share of Total Logan Passengers (CY 2013 and CY 2014)

	CY 201	3	CY 201	4
Airline \1	Passengers	Share	Passengers	Share
JetBlue	8,102,281	26.8%	8,419,209	26.6%
American	6,851,899	22.7%	7,065,118	22.3%
Delta	4,252,442	14.1%	4,531,886	14.3%
United	3,696,717	12.2%	3,679,845	11.6%
Southwest	2,523,714	8.4%	2,524,117	8.0%
All Other Carriers	4,791,578	15.9%	5,414,270	17.1%
Total Airport	30,218,631		31,634,445	

\1 Includes passengers on regional airline affiliates.

Source: Massport.



4.3.1 Domestic Passengers

In terms of domestic passengers only, the new American was the leading domestic carrier at Logan in CY 2014 with a 28.8 percent share (see Exhibit 4-7). JetBlue was a very close second with a 28.7 percent market share. Delta was the third largest domestic carrier at Logan with 15 percent of domestic passengers, followed by Southwest with 11 percent and United with 9.5 percent.

Other 6.6% American/ US Airways 28.8%

Delta 15.1%

JetBlue 28.7%

Exhibit 4-7: Airline Market Share of Logan Domestic Passengers (CY 2014)

Note: Regional airline passengers are grouped with their mainline carrier partners. Excludes general aviation passengers.

Source: Massport.

Logan's domestic passenger traffic reached a new peak of 26.5 million in CY 2014 (see Exhibit 4-2), after declining in 2008 and 2009. Rising fuel costs and the economic recession in 2008/2009 caused Logan's passengers to decline from 2007 to 2009. Domestic passenger traffic began to recover in 2010 and has increased by an average 2.9 percent per year from 2010 to 2014. The expansion of LCC service at Logan has been a major factor in this recovery and growth in the domestic passenger segment. JetBlue's market entry in 2004 and subsequent aggressive expansion at the Airport has led to sustained growth in the domestic passenger market segment.

Logan Airport is principally an O&D airport, meaning that the majority of passengers originate from or travel to the Boston Service Area. Because of Logan's geographic location on the Northeast U.S. coast, no major airline has established domestic connecting hub operations at the Airport. More than nine out of ten (94.9 percent⁵⁰) domestic passengers using Logan are O&D passengers. This is the second highest O&D share among U.S. large hub airports (see Exhibit 4-8) and is a distinguishing characteristic of Logan that has remained stable over time.⁵¹ Since connecting passengers represent only a small percentage of Logan's passenger traffic, long-term passenger growth at the Airport is primarily a function of the underlying market demand. Unlike

⁵¹ Since 1996, Logan's O&D percentage has been estimated at between 86 and 95 percent.



⁵⁰ For CY 2014 period.

major connecting hub airports, Logan is not reliant on connecting passengers and therefore is not subject to large traffic fluctuations that may result from changes in a hubbing carrier's network strategy.

Exhibit 4-8: Domestic Local and Connecting Passenger Shares for Top 15
U.S. Large Hub Airports
(CY 2014)

% Local		% of Dom	nestic Psgrs
Rank	Airport	O&D	Connecting
1	Orlando	95.2%	4.8%
2	Boston	94.9%	5.1%
3	Tampa	94.6%	5.4%
4	San Diego	94.4%	5.6%
5	Fort Lauderdale	92.1%	7.9%
6	New York La Guardia	89.4%	10.6%
7	Portland	84.2%	15.8%
8	Washington National	83.2%	16.8%
9	Las Vegas	83.0%	17.0%
10	San Francisco	79.2%	20.8%
11	Los Angeles	74.7%	25.3%
12	New York J F Kennedy	74.7%	25.3%
13	New York Newark	74.1%	25.9%
14	Seattle/Tacoma	73.0%	27.0%
15	Baltimore	71.0%	29.0%
16	Philadelphia	60.7%	39.3%
17	Chicago Midway	59.9%	40.1%
18	Denver	58.9%	41.1%
19	Washington Dulles	58.8%	41.2%
20	Phoenix	57.6%	42.4%
21	Miami	55.7%	44.3%
22	Salt Lake City	54.0%	46.0%
23	Minneapolis	53.6%	46.4%
24	Detroit	51.8%	48.2%
25	Chicago O'Hare	51.0%	49.0%
26	Houston Intercontinental	45.8%	54.2%
27	Dallas/Fort Worth	41.3%	58.7%
28	Atlanta	31.8%	68.2%
29	Charlotte	25.8%	74.2%
	Average Large Hubs	62.9%	37.1%

Source: U.S. DOT O&D Database, ICF Analysis.

In CY 2014, Logan Airport served 23.0 million domestic O&D passengers and ranked as the 10th largest domestic O&D market in the United States. Logan's domestic O&D passengers grew at an average annual rate of 2.9 percent from CY 2010 to CY 2014, as shown in Exhibit 4-9, making it the 6th fastest growing airport among the top 20 domestic O&D markets. On average, O&D



growth at the top 20 U.S. markets increased 2.2 percent annually from CY 2010 to CY 2014. Domestic O&D passengers in other East Coast markets grew at markedly slower rates than Logan – New York (2.1 percent) and Washington, DC (1.3 percent) – or saw a decline in passengers – Philadelphia (-0.9 percent) and Baltimore (-1.9 percent).

Exhibit 4-9: Comparison of Domestic O&D Passenger Growth in Largest U.S. Markets (CY 2010 to CY 2014)

Avg. Annua	I			Avg. Annual
Change	_	Domestic O&I) Passengers	Change
Rank	Market	CY 2010	CY 2014	(2010-2014)
1	Denver	23,650,980	28,204,690	4.5%
2	San Francisco	21,879,980	26,039,260	4.4%
3	Los Angeles	29,729,290	35,192,520	4.3%
4	Houston	17,789,930	20,440,770	3.5%
5	Dallas/Fort Worth	24,710,260	28,219,620	3.4%
6	Boston	20,740,540	23,223,240	2.9%
7	Minneapolis	14,344,390	16,031,930	2.8%
8	Seattle/Tacoma	20,029,870	22,376,990	2.8%
9	Chicago	35,605,450	39,247,770	2.5%
10	New York	52,253,950	56,839,300	2.1%
11	Phoenix	20,814,740	22,560,630	2.0%
12	San Diego	14,831,080	16,024,070	2.0%
13	Tampa	13,685,520	14,597,250	1.6%
14	Washington	22,000,670	23,180,250	1.3%
15	Las Vegas	28,075,080	29,346,270	1.1%
16	Fort Lauderdale	16,768,630	17,488,690	1.1%
17	Atlanta	24,409,090	25,315,830	0.9%
18	Orlando	27,004,750	26,567,100	-0.4%
19	Philadelphia	15,371,530	14,837,390	-0.9%
20	Baltimore	15,696,750	14,511,270	-1.9%
	Total Top 20	459,392,480	500,244,840	2.2%

Note: Top 20 markets based on CY 2014 domestic O&D passengers. New York includes JFK, LaGuardia and Newark airports. Washington includes Reagan National and Dulles airports. Houston includes Hobby and George Bush Intercontinental airports. Dallas includes Love Field and Dallas/Ft. Worth airports. Chicago includes Midway and O'Hare airports.

Source: U.S. DOT, O&D Survey.

The average domestic airline yield at Logan and the other large hub airports has been increasing as airlines have tightly controlled capacity and improved revenue management in recent years. As shown in Exhibit 4-10, growth in domestic passenger yields at Logan was 4.0 percent annually



between CY 2010 and CY 2014, which was in line with the average annual growth for all U.S. large hubs.

Exhibit 4-10: Comparison of Average Domestic Yield Trends at U.S. Large Hubs (CY 2010 to CY 2014)

Avg. Annual Change		Avg. Stage		Domestic Yiel	Al	Avg. Annual Change
Rank	Airport	Length (miles) CY 20		CY 2012	CY 2014	(2010-2014)
1	Miami	1,279	12.65¢	14.22¢	15.81¢	5.7%
2	New York - JFK	1,674	10.88¢	12.37¢	13.55¢	5.6%
3	Orlando	1,140	11.37¢	13.03¢	14.05¢	5.4%
4	Charlotte	916	18.10¢	21.16¢	22.19¢	5.2%
5	Atlanta	923	17.08¢	18.58¢	20.90¢	5.2%
6	Detroit	1,069	15.22¢	17.60¢	18.61¢	5.2%
7	San Francisco	1,656	10.94¢	12.23¢	13.12¢	4.6%
8	New York - LGA	998	16.06¢	17.36¢	19.23¢	4.6%
9	Philadelphia	1,233	13.97¢	15.59¢	16.66¢	4.5%
10	Tampa	1,111	12.19¢	13.95¢	14.53¢	4.5%
11	Los Angeles	1,613	10.90¢	12.11¢	12.93¢	4.4%
12	Salt Lake City	1,168	13.95¢	15.87¢	16.47¢	4.2%
13	Chicago Midway	925	13.97¢	15.20¢	16.46¢	4.2%
14	Fort Lauderdale	1,237	10.67¢	11.71¢	12.56¢	4.2%
15	Washington Dulles	1,453	13.39¢	15.20¢	15.75¢	4.1%
16	Chicago O'Hare	1,039	16.04¢	17.54¢	18.86¢	4.1%
17	Boston	1,318	12.29¢	13.91¢	14.37¢	4.0%
18	San Diego	1,382	11.25¢	12.54¢	13.08¢	3.8%
19	Denver	1,058	12.99¢	14.26¢	15.02¢	3.7%
20	Las Vegas	1,247	11.03¢	12.00¢	12.74¢	3.7%
21	Seattle	1,475	10.79¢	12.25¢	12.45¢	3.6%
22	Phoenix	1,224	12.23¢	13.21¢	14.09¢	3.6%
23	Houston Intercontine	1,151	17.20¢	19.76¢	19.77¢	3.5%
24	Minneapolis	1,102	15.91¢	18.20¢	18.27¢	3.5%
25	Baltimore	1,075	13.26¢	15.15¢	15.05¢	3.2%
26	New York - EWR	1,444	14.28¢	15.32¢	15.92¢	2.7%
27	Portland	1,372	11.49¢	12.44¢	12.65¢	2.4%
28	Dallas/Fort Worth	1,068	17.14¢	18.51¢	18.55¢	2.0%
29	Washington National	1,014	17.69¢	18.59¢	19.12¢	2.0%
	Average Large Hub	1,234	13.07¢	14.51¢	15.32¢	4.0%

Average airline yields ancillary

fees.

Source: U.S. DOT, O&D Survey.

Logan Airport represents a large and important domestic revenue market for the U.S. airlines. For CY 2014, Logan Airport was the 7th largest U.S. airport in terms of airline passenger fare revenues (Exhibit 4-11). Domestic passenger revenues at the Airport, excluding ancillary fees for baggage, reservations changes and other items, totaled \$4.4 billion for CY 2014. Although Boston



ranks 9th in terms of yield (Exhibit 4-10), it ranks 7th in terms of airline revenue generation (Exhibit 4-11) due to its longer average stage length.

Exhibit 4-11: Domestic Airline Revenue Generation for Large Hub U.S. Airports (CY 2014)

Rank	Airport	Revenue (\$ millions)	Rank	Airport	Revenue (\$ millions)
1	Los Angeles	\$7,343	16	Philadelphia	\$3,048
2	San Francisco	\$5,658	17	Washington National	\$3,000
3	Chicago O'Hare	\$5,296	18	San Diego	\$2,898
4	Atlanta	\$4,881	19	Fort Lauderdale	\$2,717
5	Las Vegas	\$4,662	20	Tampa	\$2,355
6	Denver	\$4,483	21	Baltimore	\$2,347
7	Boston	\$4,399	22	Detroit	\$2,725
8	Dallas/Fort Worth	\$4,286	23	Houston Bush	\$2,893
9	Orlando	\$4,256	24	Portland	\$2,094
10	New York - LGA	\$4,181	25	Chicago Midway	\$1,833
11	Seattle	\$4,098	26	Salt Lake City	\$1,927
12	New York - JFK	\$4,098	27	Charlotte	\$1,979
13	New York - EWR	\$3,902	28	Miami	\$1,933
14	Phoenix	\$3,676	29	Washington Dulles	\$1,764
15	Minneapolis	\$3,228			

Source: U.S. DOT, O&D Database, Database Products.

Because of the large O&D base, strong revenue generation and high O&D passenger ratio, the Airport is a highly competitive market for airlines. Of all large hub airports, Logan has the third lowest concentration of service flown by the top three carriers, highlighting the competitive nature of the Boston market (Exhibit 4-12). JetBlue is currently the leading domestic air service provider at Logan in terms of seat capacity, with 28 percent of the Airport's scheduled domestic seats (as of July 2015). American Airlines, now merged with US Airways, is a close second with a 25.1 percent share, and Delta, including its regional carrier affiliates, is the third largest carrier, providing 16.3 percent of Logan's domestic seat capacity. Given Logan's strong position as an O&D market, any future U.S. airline consolidation (through bankruptcies or mergers) is not anticipated to have a detrimental long-term effect on service levels. Initially, new consolidation could lead to service reductions, but Logan's strong O&D demand, high yield business passengers and positive growth outlook are expected to attract new services from incumbent carriers or new carriers seeking to capitalize on new opportunities. Historically, Airport passengers have grown from 14.7 million in 1980 to 27.7 million in 2000 and to 31.6 million in 2014. Over this 34-year period, many carriers have discontinued operations at the Airport (e.g. Eastern, TWA, Pan AM, New York Air, Braniff, Peoples Express and Frontier), yet passenger traffic has



continued to grow as other airlines have replaced the lost services. Based on past history, the strong O&D passenger demand in the Boston market is expected to be met regardless of changes in the airline landscape or further consolidation.

Exhibit 4-12: Domestic Carrier Market Share at Boston Logan and Other Large Hub Airports, Share of Scheduled Seats (July 2015)

			Carrier Sha	re of Non-Stop	Domestic We	ekly Seats
Rank	Airport	Code	Largest	2nd largest	3rd Largest	All Other
1	Fort Lauderdale	FLL	23.7%	21.0%	17.6%	37.7%
2	Los Angeles	LAX	24.3%	20.7%	18.2%	36.8%
3	Boston	BOS	28.2%	25.1%	16.3%	30.4%
4	Orlando	MCO	33.4%	16.6%	15.8%	34.2%
5	New York J F Kennedy	JFK	36.9%	35.3%	18.8%	9.0%
6	Tampa	TPA	40.6%	18.4%	16.3%	24.7%
7	Denver	DEN	40.9%	31.2%	10.7%	17.1%
8	Portland	PDX	41.0%	19.0%	14.2%	25.9%
9	San Diego	SAN	42.2%	14.1%	12.8%	30.9%
10	Chicago O'Hare	ORD	42.9%	41.6%	5.4%	10.1%
11	New York La Guardia	LGA	43.1%	28.8%	9.3%	18.8%
12	San Francisco	SFO	43.9%	12.8%	12.4%	30.9%
13	Las Vegas	LAS	49.8%	11.5%	10.1%	28.6%
14	Seattle/Tacoma	SEA	50.0%	20.1%	10.0%	19.8%
15	Washington National	DCA	51.3%	14.9%	14.0%	19.8%
16	Phoenix	PHX	52.9%	34.7%	5.9%	6.5%
17	Washington Dulles	IAD	67.7%	8.3%	6.5%	17.5%
18	New York Newark	EWR	69.2%	10.1%	6.5%	14.3%
19	Salt Lake City	SLC	71.2%	10.6%	7.1%	11.1%
20	Baltimore	BWI	72.1%	9.1%	8.5%	10.4%
21	Minneapolis	MSP	73.8%	5.9%	5.8%	14.6%
22	Detroit	DTW	74.9%	8.1%	6.6%	10.4%
23	Philadelphia	PHL	75.0%	8.0%	7.1%	9.8%
24	Houston Intercontinental	IAH	79.0%	9.2%	5.1%	6.6%
25	Atlanta	ATL	80.1%	11.4%	3.8%	4.7%
26	Miami	MIA	81.3%	11.9%	3.5%	3.3%
27	Dallas/Fort Worth	DFW	85.8%	4.7%	4.4%	5.1%
28	Charlotte	CLT	91.2%	4.9%	1.8%	2.2%
29	Chicago Midway	MDW	95.4%	4.2%	0.3%	0.1%
	Average Large Hub		57.3%	16.3%	9.5%	16.9%

^{*} Ranked in ascending order by largest air carrier market share.

Source: Official Airline Guide, July 2015.



Boston is one of the few markets where a carrier's strategic actions can dramatically affect its market position. The changing airline market shares at Logan over time highlight the contestability of the Boston market. Since 1990, the leading carrier position at Logan Airport has changed various times between Delta, US Airways, American and JetBlue. The continual shifting balance of service among top carriers at the Airport reflects the very active and competitive dynamics in the Boston market.

4.3.2 International Passengers

International passenger traffic at Logan has exhibited strong growth over the past several years, reaching a new peak of 5.0 million passengers in 2014 (See Exhibit 4-2). After two periods of decline and gradual recovery, Logan's international traffic finally surpassed CY 2000 levels for the first time in 2013. In 2014, international passengers increased by a further 9.8 percent. Since 2010, the international passenger segment has averaged 7.9 percent annual growth. This growth has been driven by the expansion of JetBlue and Delta international service at Boston, as well as a rapid increase in foreign carrier service in recent years. Since 2010, JetBlue has continued to expand its Caribbean network from Logan, while Delta has added nonstop service to Amsterdam, London Heathrow and Paris De Gaulle. Logan has also attracted new service by Japan Airlines, Copa Airlines, Emirates, Turkish Airlines, Hainan Airlines, WOW Air, and Cathay Pacific. As of June 2015, 25 U.S. and foreign airlines provide scheduled service from Logan to 44 year round and seasonal international destinations.⁵²

In CY 2014, JetBlue was the leading international carrier, carrying 15 percent of Logan's international passengers (Exhibit 4-13). British Airways, which offers four daily departures to London Heathrow, was the second largest international carrier with a 12 percent share, followed by Delta, which serves destinations in Europe and the Caribbean, with a 10 percent share. Foreign flag carriers have a dominant share of the international passenger market at Logan, accounting for 66 percent of the Airport's international passengers in CY 2014.

⁵² Source: OAG Schedules, July 2015.



JetBlue **British Airways** 15% 12% Other 17% Delta 10% **Emirates** 3% Virgin Atlantic Air Canada 3% 10% **Porter Airlines** 4% Lufthansa 9% Icelandair **Aer Lingus** 4% Air France 8% 5%

Exhibit 4-13: Airline Market Share for International Passengers (CY 2014)

Note: Regional airline passengers are grouped with their mainline carrier partners. Excludes general aviation passengers.

Source: Massport.

Boston is currently the 12th largest U.S. gateway for international air travel, as shown in Exhibit 4-14 below. However, Logan is the third largest U.S. gateway airport (after Honolulu and Fort Lauderdale) that is not also a connecting US airline hub. Historically, the growth of international services has been heavily concentrated at major airline connecting hubs in the U.S. (e.g., Atlanta, Chicago O'Hare, Dallas/Ft. Worth, Houston and Washington Dulles), as a hub carrier's connecting network was often needed to generate sufficient passenger traffic to fill the large widebody aircraft used on international flights. However, the O&D strength of the Boston market makes Logan an attractive gateway for foreign flag airlines despite Logan's lack of a network carrier hub. In recent years, JetBlue has shown a willingness to develop interline and codeshare relationships with foreign airlines, increasing the connectivity potential at Logan. In addition, trends in new aircraft technology have also allowed for smaller and more fuel-efficient aircraft on international routes, benefitting mid-size O&D markets like Boston.

Recent developments in international air service at Logan are discussed further in Section 4.4.



Exhibit 4-14: Top U.S. Gateways for International Traffic (CY 2010 to YE 3Q 2014)

YE 3Q 201		Harla		ssengers	YE 3Q 2014	
Rank	US Gateway	Hub	CY 2010	YE 3Q 2014	Pct. Share	10-14
1	New York	Hub	35,071,899	39,886,540	21.8%	3.5%
2	Miami	Hub	16,721,095	20,080,978	11.0%	5.0%
3	Los Angeles	Hub	15,663,985	18,376,731	10.0%	4.4%
4	Chicago	Hub	10,552,133	11,730,506	6.4%	2.9%
5	Atlanta	Hub	9,126,256	10,546,212	5.8%	3.9%
6	San Francisco	Hub	8,543,923	9,924,828	5.4%	4.1%
7	Houston	Hub	8,334,428	9,458,102	5.2%	3.4%
8	Washington	Hub	6,452,084	7,198,404	3.9%	3.0%
9	Dallas/Fort Worth	Hub	5,052,668	6,760,009	3.7%	8.1%
10	Honolulu		3,657,952	4,933,779	2.7%	8.3%
11	Fort Lauderdale		3,329,999	4,267,766	2.3%	6.8%
12	Boston		3,654,558	4,204,006	2.3%	3.8%
13	Orlando		3,081,047	4,113,500	2.2%	8.0%
14	Philadelphia	Hub	3,804,008	3,944,858	2.2%	1.0%
15	Seattle/Tacoma		2,688,504	3,526,130	1.9%	7.5%
16	Detroit	Hub	2,909,923	3,401,153	1.9%	4.2%
17	Charlotte	Hub	2,691,448	3,164,576	1.7%	4.4%
18	Las Vegas		2,137,104	3,139,378	1.7%	10.8%
19	Minneapolis	Hub	2,284,969	2,365,633	1.3%	0.9%
20	Phoenix	Hub	2,146,325	2,248,803	1.2%	1.3%
	Sub Total: Top 20		147,904,308	173,271,892	94.6%	4.3%
	Other		7,943,287	9,945,727	5.4%	6.2%
	Grand Total		155,847,595	183,217,619	100.0%	4.4%

Source: T100 Database via Database Products.



4.3.3 Logan Top O&D Markets

The top 15 domestic O&D markets (as shown in Exhibit 4-15) accounted for approximately 54 percent of Boston's total domestic O&D passengers for CY 2014.

Exhibit 4-15: Top Boston Domestic O&D Passenger Markets (CY 2014)

Rank	City	Nonstop Miles	O&D Psgrs	Percent of Total	Sched Daily Nonstop Depts
1	Washington	412	,,	6.1%	31
2	New York	187	.,,		
3	Chicago	864	1,332,380	5.7%	28
4	San Francisco	2,697	1,201,950	5.2%	15
5	Los Angeles	2,605	1,047,690	4.5%	15
6	Orlando	1,122	836,410	3.6%	9
7	Philadelphia	280	710,150	3.1%	22
8	Atlanta	946	693,270	3.0%	15
9	Baltimore	369	692,870	3.0%	14
10	Fort Lauderdale	1,239	641,310	2.8%	6
11	Dallas/Fort Worth	1,559	628,490	2.7%	11
12	Denver	1,749	600,990	2.6%	9
13	Fort Myers	1,251	513,730	2.2%	2
14	Houston	1,595	481,370	2.1%	9
15	Tampa	1,185	472,450	2.0%	3
	Subtotal Top 15		12,593,520	54.2%	248
	All Other		10,629,720	45.8%	219
	Grand Total		23,223,240	100.0%	467

Note: New York includes JFK, LaGuardia and Newark airports. Washington includes Reagan National and Dulles airports. Houston includes Hobby and George Bush Intercontinental airports. Dallas includes Love Field and Dallas/Ft. Worth airports. Chicago includes Midway and O'Hare airports.

Discrepancies between the figures in Exhibit 4-15 and Appendix A to the official statement to which this report is attached are due to proprietary data processing methods used by Database Products (which is the source used in Exhibit 4-15) and Diio (which is the source used in Appendix A) to scale-up the U.S. DOT O&D Survey data, which is a 10 percent sample.

Sources: U.S. DOT, O&D Survey, via Database Products, CY 2014; Official Airline Guide, July 2015.



Washington, DC is Boston's largest O&D market, followed by New York. Washington surpassed New York as Boston's top O&D market in 2011 following JetBlue's initiation of frequent nonstop services between Logan and Washington Reagan National Airport in November 2010 as part of its strategy to increase its share of the business market at Boston. JetBlue was able to gain access to the capacity-restricted Washington airport by leasing slots from American Airlines. In December 2011, JetBlue obtained eight additional slot pairs at Washington Reagan National, as well as eight slot pairs at New York-La Guardia Airport, through an FAA slot auction, allowing it to double its presence at both airports.

The stimulating effect of JetBlue's frequent, low-fare Boston-Washington Reagan National service is shown in Exhibit 4-16. From 2009, the year before JetBlue's Boston-Washington Reagan National service, to 2011, O&D passengers increased by 33 percent and the average fare fell by 25 percent. For CY 2014, there were 1.4 million Boston-Washington, DC O&D passengers, compared to 856,000 in 2003.

O&D Passengers (Millions) Airfare 1.6 □ Passengers \$180 One-way Airfare \$160 1.4 \$140 1.2 \$120 1.0 \$100 0.8 \$80 0.6 \$60 0.4 \$40 0.2 \$20

2001 2002 2003 2004 2005 2006 2007 2008 2009 2010 2011 2012 2013 2014

Exhibit 4-16: Passengers and Average Fares in the Boston–Washington, DC Market (CY 2000 to CY 2014)

Source: U.S. DOT, O&D Survey.

0.0



\$0

The New York market, which includes traffic to LaGuardia, JFK and Newark, is Boston's second largest O&D market. For CY 2014, there were 1.3 million passengers in the Boston-New York market (Exhibit 4-17). Flights in the Boston-New York market include the shuttle services offered by Delta and US Airways to LaGuardia Airport; JetBlue, American and Delta services to JFK; and JetBlue and United services to Newark.

O&D Passengers Airfare (millions) 3.0 \$200 Passengers \$180 Round Trip Airfare 2.5 \$160 \$140 2.0 \$120 1.5 \$100 \$80 1.0 \$60 \$40 0.5 \$20 0.0 2000 2001 2002 2003 2004 2005 2006 2007 2008 2009 2010 2011 2012 2013 2014

Exhibit 4-17: Passengers and Average Fares in the Boston - New York Market (CY 2000 to CY 2014)

Source: U.S. DOT, O&D Survey.

Demand in the Boston-New York market has fallen by approximately 49 percent from 2.6 million O&D passengers in 2000, while the average fare has increased by 36.5 percent (Exhibit 4-17) from \$128 to \$175. Several factors coalesced over this period to lower Boston-New York air passenger demand, including the availability of competitive rail and bus modes. Amtrak introduced high-speed Acela Express service along the Northeast Corridor in December 2000⁵³, and frequent low-cost bus services emerged as attractive alternatives to air travel. Greater levels of airline passenger security screening after 9/11 also decreased the relative attractiveness of air travel in short-haul markets, like Boston-New York. Demand declined further during the global economic downturn and credit crisis, which weakened business travel demand. Since 2009, passenger levels have stabilized at around 1.3 million, while average fares have shown a slight decrease in the last three years from \$170 in 2011 to \$156 in 2013. The New York-Washington, DC market has been similarly affected by these trends.

⁵³ In addition to the Acela Express service that is operated with new high-speed trains, Amtrak also provides regional service with conventional train sets.



The geographic distribution of Boston passenger demand has continued to evolve. As shown in Exhibit 4-18, the Southeast, which is dominated by the Florida markets, is the leading destination region, accounting for 27 percent of O&D passengers. The Pacific region is the fastest growing destination region and now accounts for 19 percent of domestic O&D passengers. The Mid-Atlantic region, once the largest region for Boston O&D passengers, has declined and now represents 22 percent of domestic demand compared to 34 percent in 1990. New England O&D passengers have declined from over 520,000 in 1990 to approximately 140,000 passengers in CY 2014.

Exhibit 4-18: Boston Logan Airport Domestic O&D Passengers by Region (CY 1990, CY 2000 and CY 2014)

	O&D Passengers			% of BC	t Share	CAGR	
Region	CY1990	CY2000	CY2014	CY1990	CY2000	CY2014	'90-'14
Great Lakes	1,882,610	2,125,420	2,750,670	11%	11%	12%	1.6%
Mid-Atlantic	5,664,050	5,842,080	5,215,100	34%	29%	22%	-0.3%
Midwest	618,650	829,440	934,730	4%	4%	4%	1.7%
Mountain	423,760	772,810	934,030	3%	4%	4%	3.3%
New England	523,750	315,350	138,960	3%	2%	1%	-5.4%
Pacific	2,296,240	3,072,410	4,476,640	14%	15%	19%	2.8%
Southeast	3,891,040	5,380,050	6,334,590	24%	27%	27%	2.1%
Southwest	957,130	1,356,350	2,054,170	6%	7%	9%	3.2%
US Territories	231,150	315,090	384,350	1%	2%	2%	2.1%
Total	16,488,380	20,009,000	23,223,240				1.4%

Source: U.S. DOT, O&D Survey.



4.4 Scheduled Airline Service

Airline service and aircraft operation at Logan can be grouped into three major market segments: domestic large jet, domestic regional and international. Domestic large jet service includes all domestic services operated by aircraft of 90 or more seats, including the Embraer EMB-190 aircraft operated by JetBlue. Domestic regional service includes domestic services operated by smaller regional jets of less than 90 seats. The domestic large jet and international segments have principally served O&D passengers, while domestic regional carrier services historically operated as feeder flights carrying passengers from small New England and upstate New York markets to Logan Airport for connecting services to other destinations

4.4.1 Domestic Large Jet Service

Nine U.S. airlines provide scheduled domestic large jet services at Logan as of July 2015 (Exhibit 4-19). The newly merged American and US Airways started to integrate operations in 2014 and became, combined, the second largest domestic carrier at Logan after JetBlue. Southwest and AirTran have completed their integration, and operate under the Southwest name. All major carriers with revenues over \$1 billion serve Logan except for Hawaiian Airlines and Frontier. Logan's current nonstop jet service is illustrated in Exhibit 4-20.

Exhibit 4-19: U.S. Large Jet Carriers Serving Logan (As of July 2015)

Alaska Airlines

American Airlines

Delta Air Lines

■ JetBlue

Southwest Airlines

Spirit Airlines

■ Sun Country*

United Airlines

Virgin America

Notes: The merger between AirTran and Southwest Airlines was approved by the U.S. Department of Justice in April 2011. The carriers began operating under one operating certificate in March 2012 and completed full integration in December 2014. The merger between American Airlines and US Airways was approved by the U.S. Department of Justice in December 2013. The carriers began integration in 2014 and obtained a single operating certificate from the FAA in April 2015.

Source: Official Airline Guide.



^{*} Sun Country is a hybrid charter-LCC carrier that operates mostly leisure routes seasonally

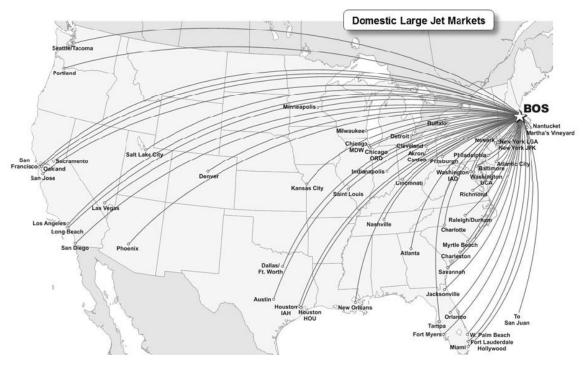


Exhibit 4-20: Domestic Nonstop Large Jet Markets Served from Boston Logan (July 2015)

Source: Official Airline Guide.

Changes in Logan's scheduled domestic airline services by the network carriers and LCCs over the past three years are shown in Exhibit 4-21. Domestic large jet services increased by 45 daily departures as carriers tentatively began to grow capacity in recent years. JetBlue added 21 daily departures over the last three years, the most of any carrier. After years of service reductions at Logan connected to rationalizing its network after merging with Northwest Airlines and the elimination of less profitable routes, Delta also increased its domestic large jet schedule—by 16 daily departures. Southwest and AirTran held domestic capacity largely flat over the last three years, as Southwest continued its integration with AirTran after the Southwest/AirTran merger.

According to the July 2015 schedules, the Airport's domestic large jet services are up by 20 daily departures over the prior year. The increase in domestic large jet operations by Delta was partly due to the shifting of regional jet to large jet service in some markets such as Detroit and New York-La Guardia. Delta also increased frequencies in the Atlanta, Minneapolis and New York-JFK markets. Delta's current 47 daily frequencies remain well below service levels prior to the Delta/Northwest merger and compare to 60 combined daily frequencies operated by Delta and Northwest at Logan in July 2008. In 2015, JetBlue increased frequencies in a few markets and added service to three new destinations: Cleveland, Martha's Vineyard and Sacramento. Increases were offset, however, by frequency cuts in other markets such as Buffalo, Dallas/Fort Worth, Houston and Washington Dulles. Calendar year 2014 marked the completion of



Southwest's integration of AirTran into its system, while American and US Airways also started the integration of their operations following their December 2013 merger.

Exhibit 4-21: Scheduled Large Jet Domestic Airline Service at Logan (July 2014 to July 2015)

	Nonstop Dai	Nonstop Daily Departures		
Reporting Carrier	July '14	July '15	'14-'15	
<u>Large Jets</u>				
Alaska	5	5	-	
American	96	96	-	
Delta	34	47	13	
JetBlue	117	118	1	
Southw est	35	36	1	
Spirit	5	8	3	
Sun Country	2	3	1	
United	41	42	1	
Virgin America	6	6	-	
Total Large Jets	341	361	20	

Notes: JetBlue and American mainline departures include operations with the Embraer-190 large regional jet. July 2015 schedules shown are for the week of July 13-19.

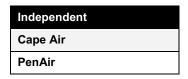
Source: Official Airline Guide.



4.4.2 Regional Domestic Service

Thirteen U.S. regional carriers are scheduled to provide domestic passenger services at Logan Airport as of July 2015 (see Exhibit 4-22). The U.S. regional carriers serving Logan are either wholly owned by a network carrier or operate under joint marketing agreements with network carriers. Two regional airlines, ExpressJet and Shuttle America, operate for more than one network carrier. The domestic services provided by these regional carriers are shown in Exhibit 4-23.

Exhibit 4-22: Domestic Regional Airlines (and Affiliates) Operating at Logan (July 2015)



Affiliated
Air Wisconsin (US Airways Express)
Compass Airlines (Delta Connection)
Endeavor Air (Delta Connection)
ExpressJet (Delta Connection and United Express)
GoJet (Delta Connection)
Mesa (United Express)
Piedmont (US Airways Express)
Republic (US Airways Express)
Shuttle America (Delta Connection and United Express)
SkyWest (United Express)
Transtates (United Express)

Note: Regional carriers providing domestic service only. Chautauqua was absorbed into Shuttle America in 2014. Cape Air includes Hyannis Air. Endeavor Air was renamed from Pinnacle Airlines.

Source: Official Airline Guide.



Regional Jet Markets

Bushalo

Bushalo

Chiaspo
One
One
One
One
Pittaburgh
Palaseighta
Now Yest
Juff
Raleigh/Durham
Nyrite Beach

Myrite Beach

Myrite Beach

Saranac Lake
Rutland

Augustal
Harrisburgh

Syracuse

Harrisburgh

Albanyo

Provincetown
Hyannis
Martha's
Nantucket
Vineyard

Exhibit 4-23: Regional Carrier Domestic Nonstop Markets Served from Logan (July 2015)

Source: Official Airline Guide.

Small regional jet services grew rapidly at Logan Airport at the beginning of the 2000s, when airlines deployed RJs to replace smaller turboprop aircraft and to compete with other airlines on short-haul high-density routes. Since the run-up in fuel prices in 2007, airlines have eliminated large numbers of smaller regional jets from their fleets because of high per seat operating costs. Between 2007 and 2014, the share of RJ departures at Logan on aircraft with 50 or fewer seats declined from 75 percent to just 19 percent.



Exhibit 4-24: Scheduled Regional Domestic Airline Service at Logan (July 2014 to July 2015)

	Nonstop Dai	Net Change	
Reporting Carrier	July '14	July '15	'14-'15
Regional Jets			
American	15	12	(3)
Delta	34	29	(5)
United	9	6	(3)
Subtotal	58	47	(11)
Turboprops/Pistons			
Cape Air	59	58	(1)
PenAir	2	-	(2)
American	4	3	(1)
Subtotal	65	61	(4)
Total RJs and Turboprops	123	108	(15)

Source: Official Airline Guide.

Overall RJ activity at Logan fell by 22 percent from 60 daily departures in July 2012 to 47 daily departures in July 2015 (see Exhibit 4-24). During 2014, RJ services decreased by 11 daily departures as compared to 2013. Delta shifted regional jet frequencies to large jet frequencies in the New York-La Guardia market and discontinued regional jet services to Charleston, Detroit and Jacksonville altogether. United cut regional jet service to Chicago O'Hare and Washington Dulles. US Airways discontinued regional jet service to Richmond and cut Philadelphia frequencies.

Regional carrier non-jet daily frequencies declined by 12 percent between 2012 and 2015. PenAir reduced services slightly, while US Airways maintained service levels and Cape Air even expanded slightly. Cape Air, which operates a homogenous fleet of nine-seat Cessna 206 aircraft at Logan, added six scheduled daily departures⁵⁴ to Nantucket and one daily flight to Rockland, Maine while reducing frequencies to Martha's Vineyard. PenAir, which entered the Logan market in 2012, discontinued service to Islip, New York. PenAir continues to provide service to three destinations in the Northeast, two of which (Presque Isle, Maine and Plattsburg, New York) are Essential Air Service ("EAS") subsidized routes.

⁵⁴ Cape Air frequently adds non-scheduled flights as demand warrants during peak travel periods.



4.4.3 International Service

Three U.S. and 21 foreign flag airlines will provide scheduled services from Logan Airport to international destinations as of July 2015 (Exhibit 4-25). The three major global airline alliance groups – Oneworld, SkyTeam and Star – are represented at Logan Airport by multiple carriers. Exhibit 4-26 shows the international markets served nonstop from Logan in July 2015.

Exhibit 4-25: U.S. and Foreign Carriers Providing International Service at Logan International Airport (*July 2015*)

U.S. Flag Airlines:	Foreign Fla	ng Airlines:
■ American Airlines (Oneworld)	■ Aer Lingus	■ Iberia (Oneworld)
■ Delta Air Lines (SkyTeam)	■ Aeroméxico (SkyTeam)	■ Icelandair
■ JetBlue	■ Air Canada (Star)*	■ Japan Airlines (Oneworld)
	■ Air France (SkyTeam)	■ Lufthansa (Star)
	■ Alitalia (SkyTeam)	Porter Airlines
	■ British Airways (Oneworld)	■ SATA
	Cathay Pacific (Oneworld)	■ SWISS (Star)
	■ Copa Airlines (Star)	■ Turkish Airlines (Star)
	■ El Al	■ Virgin Atlantic Airways
	■ Emirates	■ WOW Air
	■ Hainan Airlines	

^{*}Includes regional carriers Jazz Aviation and Sky Regional Airlines, both of which operate at Logan as part of Air Canada Express.

Note: Excludes U.S. regional airline affiliates serving the U.S. and Canada.

Source: Official Airline Guide.



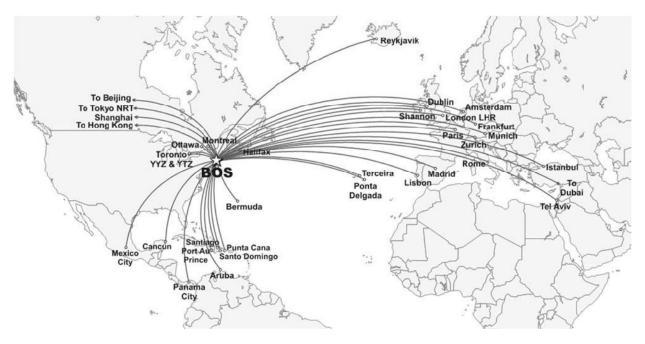


Exhibit 4-26: Nonstop International Service from Logan (July 2015)

Note: The following are operated on a seasonal basis: Grand Cayman, Liberia (November-April), Lisbon, Madrid, Montego Bay (November-April), Nassau (November-April), Port-au-Prince, Providenciales, Saint Lucia, Saint Maarten and Terceira.

Source: Official Airline Guide.

Exhibit 4-27 below shows international carrier service changes at Logan from July 2012 to July 2015. Logan has seen a significant expansion of international services in recent years. Following the launch of new nonstop services by Japan Airlines in April 2012 and Copa Airlines in July 2013, Logan continued to attract new foreign carrier service. In 2014, Logan received nonstop service to three new destinations: Dubai (Emirates, March 2014), Istanbul (Turkish, May 2014) and Beijing (Hainan, June 2014). Logan's expansion of international service continued in 2015 with the launch of new nonstop service by WOW Air to Reykjavik (March 2015), Cathay Pacific to Hong Kong (May 2015), Hainan Airlines to Shanghai (June 2015), Aeroméxico to Mexico City (June 2015), and El Al to Tel Aviv (June 2015).

Overall, international service levels at Logan increased by approximately 13 percent from 399 weekly departures in July 2012 to 451 weekly departures in July 2015. Much of the growth in international services over the past couple of years is due to the entry of new carriers described above. In addition, carriers like Aer Lingus, British Airways, Icelandair and Porter Airlines implemented some frequency increases, while JetBlue and Delta added several Caribbean routes. Notable service cuts include the discontinuation of American's London Heathrow and Delta's Toronto services in 2013, as well as the discontinuation of TACV Cabo Verde Airlines service to Praia (Cape Verde) starting June 2015.



Exhibit 4-27: Scheduled International Service at Logan International Airport (July 2014 to July 2015)

	Nonstop Weekly		Net Change	
Reporting Carrier	July '14	July '15	'14-'15	
Jets				
Aer Lingus	21	21	-	
Aeromexico	-	6	6	
Air Canada	18	20	2	
Air France	14	14	-	
Alitalia	7	7	_	
American Airlines	8	9	1	
British Airw ays	28	28	_	
Cathay Pacific	-	4	4	
Copa Airlines	7	7	_	
Delta	36	36	_	
∃AI	-	3	3	
Emirates	7	7	_	
Hainan Airlines	5	10	5	
Iberia	7	7	-	
Icelandair	20	21	1	
Japan Airlines	7	7	-	
JetBlue	41	35	(6	
Lufthansa German Airlines	21	21		
Sata Internacional	10	9	(1	
SWISS	7	7		
TACV-Transportes Aereos de Cabo Verde*	3	-	(3	
Turkish Airlines	7	7		
Virgin Atlantic Airw ays	7	7	_	
WOW Air	-	6	6	
Subtotal	281	299	18	
Regional Jets				
Air Canada	87	88	1	
Delta	1	-	(1	
Subtotal	88	88	-	
Jet and Regional Jet Departures	369	387	18	
Turboprops/Pistons				
Air Canada	14	14	-	
Porter Airlines	49	50	1	
Subtotal	63	64	1	
Total Weekly Departures	432	451	19	

^{*} TACV discontinued service in June 2015.

Note: Air Canada includes Air Canada Express.

Source: Official Airline Guide.



Logan's international services are still heavily oriented toward European destinations, making Boston the 7th busiest U.S. gateway for transatlantic air travel for the 12 months ended September 2014 (Exhibit 4-28). In July 2015, services to Europe are scheduled to account for 190 weekly departures and 64 percent of total international seat capacity at the Airport.

Exhibit 4-28: Top U.S. Gateways for Transatlantic Passengers (YE 3Q 2014)

Psgr. Rank	US Gateway	Total Psgrs. YE Sep 14	Percent Share	
1	New York	21,924,884	34.2%	
2	Chicago	5,489,845	8.6%	
3	Washington	4,875,340	7.6%	
4	Los Angeles	3,960,989	6.2%	
5	Atlanta	3,781,803	5.9%	
6	Miami	3,185,943	5.0%	
7	Boston	3,006,062	4.7%	
8	San Francisco	2,948,040	4.6%	
9	Philadelphia	2,476,540	3.9%	
10	Houston	2,305,681	3.6%	
11	Orlando	1,671,451	2.6%	
12	Detroit	1,492,224	2.3%	
13	Dallas/Fort Worth	1,433,033	2.2%	
14	Seattle/Tacoma	1,114,380	1.7%	
15	Charlotte	893,863	1.4%	
	Sub Total: Top 15	60,560,078	94.4%	
	Other	3,607,058	5.6%	
	Grand Total	64,167,136	100.0%	

Note: includes Atlantic international services only.

Source: U.S. DOT, T100 Database.



4.4.4 Significant Air Service Trends

The expansion of service by LCCs and international carriers has driven the majority of passenger and capacity growth at Logan, further solidifying the Airport's dominance in the New England market. An LCC (JetBlue) is now the largest carrier at the Airport in terms of seats and 21 international carriers now serve the Airport. These two major trends will be further discussed in the sections below.Low Cost Carrier Development

Logan Airport currently has five domestic LCCs: JetBlue, Southwest, Spirit Airlines, Sun Country and Virgin America. In addition to these domestic low cost carriers, Icelandic low cost carrier WOW Air launched nonstop service from Logan to Reykjavik in March 2015.

Since entering the Boston market in 2004, JetBlue has grown to become Logan's largest carrier, offering 872 weekly departures to 48 destinations for the summer 2015 season (Exhibit 4-29). JetBlue has significantly broadened its network at Boston to include transcontinental flights, business destinations and flights to the Caribbean in addition to its traditional Florida destinations. Since 2008, average annual growth of JetBlue's departures to domestic medium- and long-haul markets has outpaced that of departures to Florida and East Coast markets. Short-haul destinations along the busy northeast corridor now account for roughly 22 percent of JetBlue's flights from Logan, and Florida markets represent approximately 17 percent of JetBlue's flights, down from 28 percent seven years ago. Approximately 56 percent of JetBlue's services are to other domestic medium- and long-haul markets. JetBlue also offers extensive services to the Caribbean and Central America, which accounts for 35 weekly flights or four percent of the carrier's July 2015 scheduled flights.

Exhibit 4-29: Change in Low Cost Carrier Share of Weekly Departures and Seats at Logan (July 2013 to July 2015)

		2013			2014			2015	
Carrier	Deps.	Seats	Seat Share	Deps.	Seats	Seat Share	Deps.	Seats	Seat Share
JetBlue	821	100,350	67.0%	856	102,900	68.4%	872	105,250	65.7%
Southwest	262	35,346	23.6%	237	33,543	22.3%	247	35,909	22.4%
Spirit Airlines	35	5,306	3.5%	35	5,306	3.5%	56	8,351	5.2%
Virgin America	47	6,973	4.7%	46	6,674	4.4%	46	6,674	4.2%
Sun Country	13	1,882	1.3%	13	2,042	1.4%	20	2,880	1.8%
WOW Air							6	1,056	0.7%
Total	1,178	149,857	100.0%	1,187	150,465	100.0%	1,247	160,120	100.0%

Note: Includes weekly scheduled departures and seats to domestic, Caribbean and Mexican destinations.

Source: Official Airline Guide, July 2013 to July 2015.

Since 2013, JetBlue has grown from 821 weekly departures to 872 weekly (approximately 125 daily) departures at Logan. New markets added to its Logan network since 2013 include Cleveland; Detroit; Savannah; Philadelphia; Puerto Plata; St. Lucia; and Liberia, Costa Rica. Boston is a key focus city for JetBlue and is the carrier's second largest station in terms of



departures after New York – JFK. According to JetBlue management, the carrier plans to grow its Logan operations to 150 daily departures in 2015.

JetBlue has entered into more than 35 marketing partnerships with other U.S. and foreign airlines. These partnerships are primarily structured as interline agreements that allow passengers to book one itinerary on multiple carriers. JetBlue's partnerships with Aer Lingus, Cape Air, Emirates, Icelandair, Japan Airlines, Lufthansa and Turkish Airlines allow passengers flying to or from markets that JetBlue would otherwise not serve to connect to JetBlue flights at the Airport, further strengthening its position at Logan Airport. The partnerships with Aer Lingus, Cape Air, Japan Airlines, Lufthansa and Turkish Airlines are one-way code sharing agreements, where the partner airlines place their operating codes and flight numbers on flights operated by JetBlue creating a seamless travel experience for passengers connecting at Logan. JetBlue has a two-way codeshare partnership with Emirates and plans to establish a two-way codeshare partnership with Icelandair in 2015. The two-way code share agreements allow partner airlines to place their code on flights operated by JetBlue and vice versa.

Southwest introduced service to Logan Airport in August 2009 after having served the Boston market from the T.F. Green and Manchester-Boston airports since the late 1990s. Since 2013, Southwest has withdrawn from the Orlando and Fort Myers markets, but added service to three destinations: Houston Hobby, Kansas City and Indianapolis.⁵⁶ After merging with AirTran in May 2011, Southwest and AirTran have reduced duplicated services between Boston and Baltimore and eliminated service to Newport News, a former AirTran market. The combined Southwest and AirTran system at Logan is scheduled to provide 247 weekly nonstop departures serving 11 destinations (Akron/Canton, Atlanta, Baltimore, Chicago Midway, Denver, Houston Hobby, Indianapolis, Kansas City, Milwaukee, Nashville and St. Louis) as of July 2015.

Since 2010, ULCC Spirit Airlines has increased the number of destinations it serves from Logan from three to ten. Most recent new services launched in April 2015 include daily nonstop service to Las Vegas and seasonal service to Cleveland and Detroit. Spirit also provides year-round service to Fort Lauderdale and Myrtle Beach, as well as seasonal service to Atlantic City, Chicago O'Hare, Dallas/Ft. Worth, Fort Myers and West Palm Beach. Spirit is scheduled to operate 56 weekly flights as of the 2015 summer season.

Virgin America was a new entrant to Logan in August 2009. Focused primarily on long-haul point-to-point flying between major East Coast and West Coast cities, Virgin America is scheduled to operate 46 weekly flights to Los Angeles and San Francisco as of July 2015.

Sun Country Airlines and WOW Air both account for less than two percent of weekly seats at Logan Airport. Sun Country provides nonstop service to Minneapolis, recently upgrading its summer seasonal service to year-round service in 2013. Icelandic low cost carrier WOW Air

⁵⁶ Southwest has announced new service to Indianapolis starting June 2015.



⁵⁵ JetBlue also has codeshare relationships with El Al, Etihad, Hawaiian Airlines, Qatar Airways, Singapore Airlines and South African Airways, allowing their passengers to travel to/from Boston on JetBlue flights at select stations (such as New York JFK and Washington National) and then connect to their own operated flights.

launched Boston-Reykjavik nonstop service in March 2015. WOW Air plans to operate year-round 5-6 times weekly service to Reykjavik, with connecting flights on to European destinations such as London, Berlin, Copenhagen, Paris, Dublin and Amsterdam.

As of February 2015, LCCs provide 43.2 percent of the domestic seat capacity at Logan Airport, up from 5.3 percent in 2002 (Exhibit 4-30). The LCC market in New England has changed significantly since the early 2000s when LCCs had only a minimal presence at Logan. At that time, Southwest Airlines served the Boston market through the secondary airports T.F. Green and Manchester-Boston, intentionally bypassing Logan.

As shown in Exhibit 2-10, the LCC market share at Logan rose dramatically after JetBlue entered the market in 2004. JetBlue's entry increased the LCC domestic seat share from 6.2 percent in 2003 to 19.1 percent in 2004. From 2006 to 2008, there was a decline in the LCC market share, due largely to the cessation of Delta Song's operations in mid-2007 and other minor LCC contractions. Between 2009 and 2011, there was another noticeable increase in the LCC share as Southwest and Virgin America initiated services at Logan and as JetBlue expanded by entering markets where network carriers reduced services. Growth in LCC market share leveled off for a few years after 2011, but picked up again in 2015. Significant service expansion by JetBlue in 2015 and service increases by Southwest and Spirit contributed to the most recent LCC share increase.

45% 43.2% 39.0% 40.0% 40.5% 40.9% 40% 35% 32.8% 29.9% 30% 25.6% 25.2% 23.5% 25% 22.6% 19.1% 20% 15% 10% 7.8% 5% 2001 2002 2003 2004 2005 2006 2007 2008 2009 2010 2011 2012 2013 2014 2015 2000

Exhibit 4-30: Low Cost Carrier Share of Weekly Domestic Seats at Logan Airport (February 2000 to February 2015)

Source: Official Airline Guide, February 2000 to February 2015.

By way of comparison, the LCC share of total U.S. domestic scheduled seats grew steadily from 1990 through 2008. Since then, the U.S. LCC seat share has stabilized at approximately 30 percent and increased slightly to 30.7 percent in February 2015.



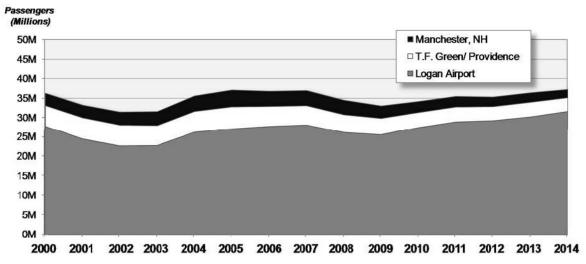
4.4.4.1 Market Shift Due to Rapid Growth of LCC Service at Logan

The rise of LCCs at Boston has changed the market dynamics between Logan and the secondary airports that provide overlapping service in the Greater Boston region: T.F. Green and Manchester-Boston. In the late 1990s, these secondary airports gained market share through a combination of increasing service levels and competitive airfares along with the major Central Artery/Tunnel construction project, which hampered access to Logan. Through 2003, T.F. Green and Manchester-Boston were attractive alternatives to Logan Airport. Southwest introduced low-fare services at T.F. Green in 1996 and at Manchester-Boston in 1998, and the incumbent network carriers responded by increasing their services. However, Southwest's presence at T.F. Green and Manchester-Boston was not enough to sustain growth at those airports in more recent years. Persistently high fuel prices led carriers to ensure high load factors and reduce operating expenses, and Southwest has shifted its focus to larger, business-oriented markets, like Logan, to capitalize on new opportunities.

The growth of LCC services at Logan and airline retrenchment from smaller, secondary markets have caused a substantial shift in the market dynamics between Logan, T.F. Green and Manchester. From 1995 to 2000, combined passenger traffic at the three airports grew by 5.9 percent annually. Most of the growth occurred at T.F. Green and Manchester-Boston, which grew their passenger bases by 20.1 and 28.6 percent, respectively, while Logan grew by just 2.8 percent per year. The secondary airports continued to grow at a faster pace than Logan through 2005. However, since 2005, this trend has reversed as traffic at the secondary airports declined at an average annual rate of 7.7 percent between 2005 and 2010, and dropped by 4.3 percent per year from 2010 to 2014. As travel choices became more limited at the secondary airports and they lost their low-fare advantage, Logan has increased its share of the regional market. Logan's share of the combined three-airport market has risen from approximately 76 percent in 2000 to 85 percent in 2014, remaining below but approaching its 89 percent share in 1995.



Exhibit 4-31: Passenger Shares at New England Regional Airports and Logan Airport (CY 2000 through CY 2014)



Source: Massport, T.F. Green and Manchester-Boston annual traffic reports.

Exhibit 4-32: Passenger Activity at New England Regional Airports and Logan Airport (In Millions)

	Airport Passengers					Compounded Annual Growth			
Airport	1995	2000	2005	2010	2014	CY95/00	CY00/05	CY05/10	CY10/14
Logan Airport	24.19	27.73	27.09	27.43	31.63	2.8%	-0.5%	0.2%	3.6%
T.F. Green/Providence	2.17	5.43	5.73	3.94	3.57	20.1%	1.1%	-7.2%	-2.4%
Manchester, NH	0.90	3.17	4.33	2.81	2.10	28.6%	6.4%	-8.3%	-7.1%
Total	27.26	36.33	37.15	34.18	37.30	5.9%	0.4%	-1.7%	2.2%
Boston Logan Airport	24.19	27.73	27.09	27.43	31.63	2.8%	-0.5%	0.2%	3.6%
Providence / Manchester Combined	3.07	8.60	10.06	6.75	5.66	22.9%	3.2%	-7.7%	-4.3%
Boston Logan Share	88.7%	76.3%	72.9%	80.2%	84.8%				
Providence / Manchester Share	11.3%	23.7%	27.1%	19.8%	15.2%				

Source: Massport, T.F. Green and Manchester-Boston annual traffic reports.



4.4.4.2 International Carrier Development

In the last two years, Logan has seen a rapid expansion of international service with the addition of nine new foreign carriers and eight new international destinations,⁵⁷ as outlined in Exhibit 4-33. The only international service cutback was the discontinuation of TACV Cabo Verde Airlines service to Praia (Cape Verde) in June 2015; TACV plans to switch its Praia service from flying out of Logan Airport to T.F. Green. As of July 2015, there are scheduled to be three U.S. carriers and 21 foreign carriers providing service to 44 international destinations from Logan.

Exhibit 4-33: New International Services at Logan Airport, 2013-2015

Carrier	Destination	Service Began
Copa Airlines	Panama City	July 2013
Emirates	Dubai	March 2014
Turkish Airlines	Istanbul	May 2014
Hainan Airlines	Beijing	June 2014
	Shanghai	June 2015
WOW Air	Reykjavik	March 2015
Cathay Pacific	Hong Kong	May 2015
Aeroméxico	Mexico City	June 2015
EI AI	Tel Aviv	June 2015

Source: Massport

Copa Airlines introduced daily nonstop service to Panama City in July 2013. Panama City is Logan's second destination in Central America after Liberia (Costa Rica). The new service to Copa's Panama City hub also provides extensive connectivity to onward destinations in Central and South America and the Caribbean.

Calendar year 2014 saw the arrival of three new foreign carriers to Logan. In March 2014, Emirates launched daily Boston-Dubai service, which was Logan's first nonstop service to the Middle East. The new Dubai service provides connections for passengers traveling to/from destinations in the Middle East, India, East Africa and Southeast Asia. Emirates' codeshare partnership with JetBlue, which allows passengers to travel on each airline's flights on a single ticket, is expected to strengthen further the operating performance of the Boston-Dubai service. Turkish Airlines and Hainan Airlines also initiated service to Istanbul and Beijing, respectively, in late spring 2014, enhancing Logan's connectivity to Asia and Europe. Hainan's Boston-Beijing service is operated with the 787 Dreamliner, which has the operating and seating capacity to serve economically thinner long-haul international routes. Hainan's Boston-Beijing service was Logan's second 787 service, after Japan Airlines first launched Boston-Tokyo service with the 787 in 2012.

⁵⁷ Reykjavik was already previously served by Icelandair from Logan Airport.



In 2015, Logan will see the launch of service by four new foreign carriers, as well as additional China service by Hainan Airlines. Icelandic low-cost carrier WOW Air introduced service from Boston to Reykjavik in March 2015, providing Logan passengers with low-cost transatlantic fares and a number of potential connections into Europe through Reykjavik. Cathay Pacific will launch four times weekly service from Boston to Hong Kong in May 2015. Hainan Airlines will add nonstop 787 service from Boston to Shanghai in June 2015; Shanghai will represent Logan's fourth nonstop destination in Asia, in addition to Tokyo, Beijing and Hong Kong. In June 2015, Aeroméxico and El Al will also launch service to Mexico City and Tel Aviv, respectively.

Bolstered by these new services, Logan was the 8th fastest growing U.S. large hub airport in terms of international seats between July 2013 and July 2015, as shown in Exhibit 4-34. Logan currently also ranks 6th among U.S. large hubs in terms of the number of foreign carriers providing service.



Exhibit 4-34: Growth of International Seats at U.S. Large Hub Airports (July 2013 – July 2015) and Number of Foreign Carriers Serving

Seats		W Id- Inda		-4- / 1	Seats Change	Percent	Foreign
Change Rank	Airport	2013	Weekly International Seats (July) 2013 2014 2015			Change ('13-'15)	Carriers Serving
Ralik	Airport	2013	2014	2013	('13-'15)	(13-15)	Serving
1	Salt Lake City	4,505	4,610	8,334	3,829	85.0%	0
2	Baltimore	4,725	4,725	7,945	3,220	68.1%	4
3	Fort Lauderdale	21,394	26,923	33,962	12,568	58.7%	10
4	Tampa	3,914	5,179	5,899	1,985	50.7%	5
5	Orlando	38,914	43,895	51,087	12,173	31.3%	17
6	Las Vegas	29,962	36,616	38,618	8,656	28.9%	13
7	Portland	6,769	7,042	8,612	1,843	27.2%	4
8	Chicago Midway	6,705	6,273	8,471	1,766	26.3%	2
9	Boston	58,273	66,086	69,919	11,646	20.0%	21
10	Seattle/Tacoma	49,052	51,099	58,068	9,016	18.4%	11
11	Houston - IAH	117,702	127,913	136,696	18,994	16.1%	17
12	New York - JFK	303,784	329,533	352,277	48,493	16.0%	65
13	San Francisco	126,520	134,324	145,488	18,968	15.0%	29
14	Los Angeles	234,174	256,186	266,589	32,415	13.8%	43
15	Phoenix	21,778	23,146	24,038	2,260	10.4%	4
16	Philadelphia	50,731	55,735	55,596	4,865	9.6%	4
17	Dallas/Fort Worth	92,217	99,051	100,090	7,873	8.5%	12
18	Atlanta	109,724	113,993	118,354	8,630	7.9%	7
19	Chicago O'Hare	152,558	167,829	159,046	6,488	4.3%	32
20	Minneapolis	28,838	29,158	29,595	757	2.6%	4
21	Miami	182,409	186,259	186,753	4,344	2.4%	31
22	Detroit	42,525	43,224	42,807	282	0.7%	5
23	Charlotte	27,586	33,564	27,607	21	0.1%	2
24	New York - EWR	140,005	142,559	139,551	-454	-0.3%	15
25	New York - LGA	26,335	26,228	26,061	-274	-1.0%	2
26	Washington Dulles	99,913	102,415	98,320	-1,593	-1.6%	25
27	San Diego	9,802	8,958	9,425	-377	-3.8%	5
28	Denver	26,114	25,730	24,504	-1,610	-6.2%	5
29	Washington National	5,044	4,294	4,094	-950	-18.8%	1
	Top Large Hubs	1,462,239	1,589,316	1,678,684	216,445	14.8%	

Note: Excludes the Caribbean. Ranked by '13-'15 percent change in weekly seats.

Source: OAG Schedules

The introduction of aircraft with new technology will continue to be a key enabler of new international services at Logan and around the world. New long-range, fuel efficient aircraft with fewer seats has made previously uneconomical long-haul routes possible. Long-range aircraft such as the Boeing 777 are sometimes too large for carriers to serve profitably non-hub markets that do not benefit from significant feeder traffic. However, the Boeing 787 and Airbus 350, which offer fewer seats, will allow carriers to bypass connecting hubs, thereby creating significant opportunities for international market pairings that do not include two hubs, such as Japan Airline's Boston-Tokyo route and Hainan Airlines' Boston to Beijing/Shanghai services. The trend in next generation aircraft especially benefits mid-size O&D markets like Boston. Use of new fuel-



efficient aircraft will allow airlines to open up new non-stop routes, introducing more service to non-hub markets that may lack significant feeder traffic from a hub carrier.

4.5 Aircraft Operations

There were approximately 337,000 commercial airline operations (excluding General Aviation) at Logan during 2014, up 0.8 percent from the previous year (Exhibit 4-35).⁵⁸ Since 2000, aircraft operations have fluctuated from a high of 453,000 in 2000 to a low of 327,000 in 2012. The sharp decline in aircraft operations reflects airline capacity cuts and aircraft up-gauging in response to economic downturns, industry consolidation, changes in operating strategy, the withdrawal of American Eagle and changes in the aircraft fleet.⁵⁹ Although aircraft operations increased by only 0.8 percent last year, Airport passengers grew by 4.7 percent, showing the trend of increasing average aircraft size and passenger load factors at Logan continued.

Prior to 2001, domestic regional carrier operations were the fastest growing segment of aircraft activity, averaging increases of 4.9 percent annually between 1970 and 2000. International operations grew at a similarly fast pace of 3.2 percent per year, while domestic large jet operations grew by just 0.9 percent per year over the same period. Since 2000, reductions have occurred across all three segments. The drop in domestic regional operations has been the sharpest at an average decline of 5.0 percent per year, compared to decreases of approximately 0.9 percent per year for both international operations and domestic large jet operations. The sharp decrease in regional carrier operations is attributed to RJs replacing smaller turboprops at the beginning of the decade and, more recently, RJs falling out of favor because of poor operating economics when fuel prices are high.

⁵⁹ "Up-gauging" refers to the substitution of larger capacity aircraft for smaller capacity aircraft on a specific route.



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⁵⁸ Including general aviation, Logan accommodated 363,797 operations in 2014.

Exhibit 4-35: Historical Aircraft Operations at Boston Logan Airport (1970 to 2014)

	Aircraft Takeoffs and Landings ¹				
Calendar	Domestic	Domestic			
Year	Large Jet ^{∖2}	Regional	International	Total	
1970	189,192	37,800	17,599	244,591	
1980	178,686	60,623	18,858	258,167	
1990	223,955	144,179	31,458	399,592	
2000	248,555	159,025	45,183	452,763	
2001	223,778	164,643	45,965	434,386	
2002	195,203	131,879	39,401	366,483	
2003	173,671	132,778	38,195	344,644	
2004	204,987	128,972	40,063	374,022	
2005	205,548	132,169	38,697	376,414	
2006	212,011	126,378	36,286	374,675	
2007	210,944	120,503	39,458	370,905	
2008	199,514	111,964	36,306	347,784	
2009	192,356	106,507	34,201	333,064	
2010	210,194	94,193	33,574	337,961	
2011	216,502	88,837	35,418	340,757	
2012	208,364	80,220	38,171	326,755	
2013	216,343	80,356	37,958	334,657	
2014	220,269	77,140	39,972	337,381	
Average Ar	nual Growth				
1970-80	-0.6%	4.8%	0.7%	0.5%	
1980-90	2.3%	9.1%	5.3%	4.5%	
1990-00	1.0%	1.0%	3.7%	1.3%	
2000-10	-1.7%	-5.1%	-2.9%	-2.9%	
2010-14	1.2%	-4.9%	4.5%	0.0%	
Percent Ch	Percent Change Over Prior Year				
2010	9.3%	-11.6%	-1.8%	1.5%	
2011	3.0%	-5.7%	5.5%	0.8%	
2012	-3.8%	-9.7%	7.8%	-4.1%	
2013	3.8%	0.2%	-0.6%	2.4%	
2014	1.8%	-4.0%	5.3%	0.8%	

^{1\} Excludes general aviation operations.

Note: Operations include arrivals and departures. International operations include scheduled and charter operations for U.S. certificated, U.S. regional, and foreign flag carriers.



^{2\} Includes charter operations.

Exhibit 4-36 below shows the current share of aircraft operations by segment at Logan. Domestic operations (large jet and regional aircraft combined) account for 88 percent of Logan's passenger airline operations, while international operations account for 12 percent. Domestic regional carriers accounted for 23 percent of Airport operations in 2014, down from a historical peak share of 43 percent in the 1990s.

International 12%

Domestic Large Jet 65%

Regional 23%

Exhibit 4-36: Aircraft Share of Operations at Logan (CY 2014)

Source: Massport.

Exhibit 4-37 shows the current share of Logan's passengers by segment for comparison. While regional carriers accounted for approximately 23 percent of the Airport's operations in 2014 (Exhibit 4-36), they carried only six percent of total commercial passengers. Domestic large jet operators accounted for 65 percent of operations but 78 percent of passengers at Logan in 2014.

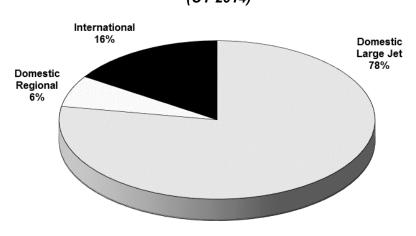


Exhibit 4-37: Aircraft Share of Passengers at Logan (CY 2014)



Over the recent past, the industry has experienced an increase in the average number of passengers per aircraft operation, a trend that has been even more pronounced at Logan. As illustrated in Exhibit 4-38, the average number of passengers per commercial airline operation at Logan increased from 61 passengers in 2000 to approximately 93.5 in 2014. This trend reflects the airlines' continued focus on maintaining high load factors, more effectively assigning appropriately sized aircraft to routes and fleet up-gauging. Regional carriers at Logan have increased average aircraft sizes and nearly doubled the average passengers per operation from 14 in 2000 to 26 in 2014. Domestic large jet carriers are operating at record high load factors and replacing older aircraft models with slightly larger ones. As a result, domestic large jet carriers at Logan have increased the average number of passengers carried per flight from 84 in 2000 to 111 in 2014. The average number of passengers per international flight has also grown from approximately 100 in 2000 to 125 in 2014.

Exhibit 4-38: Trend in Average Passengers per Operation at Logan (1970 to 2014)

	Avere	go Bossong	ers Per Operatio	n\1
Calendar	Domestic	Domestic	ers Per Operatio	
Year	Large Jet ^{∖2}	Regional	International	Total
1970	43.4	7.2	52.1	38.4
1980	67.7	7.7	114.5	57.0
1990	80.2	10.3	106.8	57.1
2000	84.2	13.7	99.9	61.0
2005	97.7	20.0	109.5	71.6
2006	98.4	21.3	111.6	73.7
2007	99.9	22.9	105.3	75.5
2008	97.4	23.1	109.5	74.8
2009	99.7	24.3	108.1	76.5
2010	101.7	24.5	109.7	81.0
2011	104.0	26.1	111.9	84.5
2012	108.9	25.7	114.8	89.1
2013	108.9	25.1	119.8	90.0
2014	111.3	26.4	124.9	93.5
Average Annu	ual Growth			
1970-1980	4.6%	0.7%	8.2%	4.0%
1980-1990	1.7%	2.9%	-0.7%	0.0%
1990-2000	0.5%	2.9%	-0.7%	0.7%
2000-2010	1.9%	6.0%	0.9%	2.9%
2010-2014	2.3%	1.9%	3.3%	3.7%
2000-2014	2.0%	4.8%	1.6%	3.1%

^{1\} Excludes general aviation passengers. 2\ Includes charter passengers.



4.6 Cargo Traffic

Logan Airport was the 20th largest U.S. airport in terms of cargo volume, including mail, for the year ended September 2014 (Exhibit 4-39). Of the top 30 airports based on cargo volume, 11 are primary or regional sorting hubs for all-cargo carriers⁶⁰. If all-cargo airline hubs are excluded, Logan ranks as the 9th largest airport in the nation in terms of cargo volume.

Exhibit 4-39: Top U.S. Airports Ranked by Cargo Volume (YE 3Q 2014)

YE 3Q 14 Rank	YE 3Q 13 Rank	Airport	Code	Total Cargo (Tons)
Name	Rank	All port	0000	(10113)
1	1	Memphis	MEM	4,517,185
2	2	Louisville	SDF	2,547,560
3	3	Miami	MIA	2,004,675
4	4	Los Angeles	LAX	1,880,254
5	5	Anchorage	ANC	1,655,637
6	6	Chicago	ORD	1,484,195
7	7	New York - JFK	JFK	1,342,272
8	8	Indianapolis	IND	1,055,923
9	9	New York - EWR	EWR	734,209
10	11	Dallas/Fort Worth	DFW	674,771
11	10	Atlanta	ATL	668,980
12	12	Cincinnati	CVG	656,874
13	13	Honolulu	HNL	594,650
14	14	Oakland	OAK	582,376
15	16	Philadelphia	PHL	494,499
16	17	Houston	IAH	493,805
17	15	Ontario	ONT	477,040
18	18	San Francisco	SFO	388,901
19	19	Seattle/Tacoma	SEA	346,463
20	22	Boston	BOS	302,794
21	20	Washington Dulles	IAD	301,446
22	21	Phoenix	PHX	295,632
23	23	Denver	DEN	274,916
24	24	Detroit	DTW	238,523
25	25	Minneapolis	MSP	235,994
26	26	Portland	PDX	230,219
27	27	Salt Lake City	SLC	195,943
28	28	Orlando	MCO	179,420
29	29	San Juan	SJU	163,038
30	30	San Diego	SAN	151,673

Source: U.S. DOT, T-100 Database.

⁶⁰ Includes FedEx hubs (Memphis, Miami Anchorage, Indianapolis, Newark and Oakland); UPS hubs (Louisville, Dallas/Fort Worth, Philadelphia and Ontario); and DHL superhub (Cincinnati).



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Three all-cargo airlines had operations at Logan in 2014 (Exhibit 4-40). In addition to the all-cargo carriers serving the Airport, passenger airlines also provide belly cargo capacity at the Airport and numerous charter carriers also transport cargo to and from Logan.

Exhibit 4-40: All Cargo Airlines Operating at Logan (CY 2014)

■ Atlas Air ■ UPS ■ FedEx

Note: Cargo airlines with over 50 operations in CY 2014 listed.

Source: Massport.

In 2014, Logan Airport handled 585 million pounds of cargo (freight plus small package/express), excluding mail. Since 2000, non-mail cargo volumes at Logan have fallen at an average annual rate of 2.6 percent. Both cargo market segments, express/small package and heavy freight, have been declining as a result of slower economic growth, greater use of trucking by the integrators, 61 the loss of 757 widebody capacity on transcontinental passenger airline routes, and the widespread use of electronic document delivery (See Exhibit 4-41). The express/small packages segment, now a mature market, has increased by 1.2 percent annually on average since 2010; freight increased by 2.5 percent annually on average over the same period.

⁶¹ Unlike traditional all-cargo airlines, which only provide air services for packages and freight shipments, the integrated cargo carriers (FedEx and UPS) provide door-to-door delivery including the air and ground portions of a cargo shipment.



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Exhibit 4-41: Historical Trends in Cargo Volume (CY 1990 to CY 2014)

	Total	Annual	Percent Cha	ange
	Pounds ^{∖1}	Express/Small		Total
Year	(000s)	Packages	Freight	Cargo ^{∖1}
1990 ^{\2}	633,435	-	-	-
2000	852,347	1.7%	5.8%	3.4%
2001	744,797	-11.6%	-13.9%	-12.6%
2002	789,610	8.7%	2.4%	6.0%
2003	744,838	1.5%	-16.0%	-5.7%
2004	759,275	1.3%	3.0%	1.9%
2005	741,517	-1.2%	-4.2%	-2.3%
2006	679,068	-10.7%	-4.5%	-8.4%
2007	632,450	-4.5%	-10.7%	-6.9%
2008	587,772	-4.7%	-11.2%	-7.1%
2009	517,557	-15.0%	-6.1%	-11.9%
2010	546,379	4.0%	8.3%	5.6%
2011	529,213	-2.0%	-5.1%	-3.1%
2012	531,831	-1.7%	4.2%	0.5%
2013	538,193	2.2%	-0.4%	1.2%
2014	585,460	6.7%	12.2%	8.8%
Average Ann	nual Growth			
1990-2000 ^{\3}		6.7%	-0.3%	3.0%
2000-2010		-3.5%	-3.5% -5.6% -	
2010-2014		1.2%	2.5%	1.7%

^{1\} Includes freight and express/small packages; excludes mail.



^{2\} Before 1991, freight and express/small packages were not reported individually.

^{3\ 1991} volumes used instead of 1990 volumes for express/small packages and freight.

4.7 General Aviation

Annual general aviation ("GA") activity at Logan Airport is shown in Exhibit 4-42. In 2014, Logan Airport accommodated more than 26,000 general aviation operations. While the larger general aviation sector encompasses a broad range of activity from pilot training to recreational and corporate use, the GA activity at Logan consists primarily of business and corporate aviation.

Exhibit 4-42: General Aviation Activity (CY 1985 to CY 2014)

Year	General Aviation Operations	Annual Percent Change
1990	24,976	
2000	35,233	-
2001	28,739	-18.4%
2002	25,596	-10.9%
2003	28,660	12.0%
2004	31,236	9.0%
2005	32,652	4.5%
2006	31,444	-3.7%
2007	28,632	-8.9%
2008	23,820	-16.8%
2009	12,242	-48.6%
2010	14,682	19.9%
2011	28,230	92.3%
2012	28,114	-0.4%
2013	26,682	-5.1%
2014	26,416	-1.0%
Average /	Annual Growth	
1990-200	0	3.5%
2000-201	0	-8.4%
2010-201	4	15.8%

Source: Massport.

GA activity at Logan closely follows national trends in the use of private jet transportation for business/corporate use and personal travel. General aviation operations fell sharply in 2008 and 2009 following the global credit crisis, the economic recession in the U.S. and a public backlash against corporate use of private air transportation that prompted many businesses to limit their use of general aviation. After bottoming out at approximately 12,240 operations in 2009, GA activity began to recover in 2010. Despite growth in 2010 and 2011, GA operations have declined in each of the last three years.

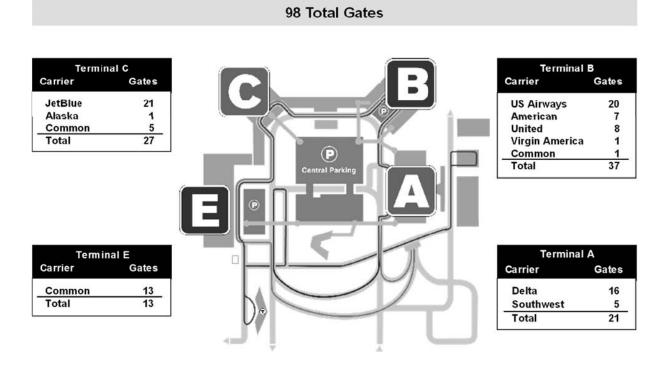


4.8 Massport's Ability to Ensure Efficient Gate Utilization

Massport has implemented several policies and tools that allow for effective reallocation of the Airport's facilities. These include an Airport-wide Preferential Gate Use Policy, greater use of short-term leases and gate recapture as well as forced sublet provisions that have been incorporated into all new long-term leases at the Airport. Massport has successfully used these policies during carrier bankruptcies and mergers to reassign quickly underused gates.

This section summarizes the current allocation of gates at Logan (see Exhibit 4-43) and the ability of Massport to exert control over underutilized facilities and ensure optimum utilization of the Airport's facilities. Exhibit 4-44 shows leaseholders with Massport by terminal.

Exhibit 4-43: Logan Airport Terminal Layout and Contact Gates by Leaseholders



Note: As of June 2015 Source: Massport

Delta currently leases 16 gates in Terminal A. On April 1, 2015, Southwest relocated from Terminal E to Terminal A leasing five gates. US Airways currently leases 20 contact gates at Terminal B and subleases six of these gates to other airlines: one to Spirit, three to Air Canada and two to Massport, which are re-leased to United. In addition, US Airways subleases its single remote position to PenAir. Other leaseholders in Terminal B include American (seven gates), Virgin America (one gate) and United (eight gates). In Terminal C, JetBlue leases 21 gates, subleasing one to Cape Air; Alaska leases one gate, and five gates are common use. All gates in



Terminal E are common use, which has allowed easy reconfiguration to accommodate new international carriers.

Exhibit 4-44: Logan Airport Airline Operators by Terminal as of June 2015

Terminal Building	Lease Holders with Massport	Other Carriers Operating in Terminal		
A	Delta Southwest			
В	American/US Airways* United Virgin America	Air Canada ⁺ PenAir ⁺ Spirit ⁺		
С	JetBlue Alaska	Cape Air** ** Sun Country		
E		Aer Lingus Iberia Aeroméxico Icelandair Air France Japan Airlines Alitalia JetBlue *** American*** Lufthansa British Airways Porter Airlines Cathay Pacific SATA Copa Airlines SWISS Delta *** Turkish Airlines EL AL Virgin Atlantic Emirates Hainan		

^{*} Although operating under one certificate, leases are held separately by American and US Airways

Source: Massport.

4.8.1 Airport-Wide Preferential Gate Use Policy

Massport's preferential use policy is applicable to all gates at Logan Airport. Under conditions specified in the policy, Massport may schedule arrivals and departures at a gate by carriers other than the tenant for any period that the tenant is not using the gate. The tenant carrier must permit the carrier being accommodated under the policy to use the hold room, loading bridge, baggage claim and other related facilities required for the functional use of the gate, and may assess reasonable fees for such use. If a tenant carrier fails to accommodate a carrier under the terms of the preferential use policy, then Massport may convert the gate to a common use gate.



^{**} Cape Air provides ramp operations only from its gate in Terminal C.

^{***} International arrivals only.

^{*} subleased from US Airways

⁺⁺ subleased from JetBlue

Massport prefers to lease space at the Airport on a short-term basis, which allows Massport the requisite flexibility to ensure the Airport's limited gate resources are optimally used. However, Massport has granted longer term leases to carriers that have made significant capital investments in terminal facilities. Currently only US Airways (now merged with American) holds a long-term lease (with a remaining term greater than five years) with Massport; Delta's lease will expire on June 30, 2016. American's lease agreement for seven gates in Terminal B expired on April 1, 2015 and is currently in a hold over month-to-month status. Massport's leases with JetBlue and United are each for one year, with provisions for annual extensions.

In order to ensure maximum utilization of the Airport's gates, all of Massport's lease agreements contain language that allows Massport to regain control of leased gates should the airline tenants fail to meet certain utilization thresholds. These gate recapture provisions allow Massport to maximize the Airport's gate utilization by redistributing gates from carriers shrinking their operations at Logan to those wanting to expand. These leases also contain provisions that allow Massport to require the airlines to sublease a certain number of gates. Over time, Massport has been successful in securing more stringent gate recapture and forced sublet provisions.

4.8.2 Previous Experience Recapturing Underutilized Gates

Historical experience at Logan Airport demonstrates that gate space abandoned as the result of a major carrier retrenchment or bankruptcy is rapidly re-absorbed by other airlines. In such cases, Massport has assumed an active role in ensuring liquidity in underutilized capacity. In 2003, Northwest Airlines gave up two of its gates to satisfy the U.S. DOT's request that they relinquish gates at their hub airports and at Logan following its marketing agreement with Delta and Continental. The two gates relinquished by Northwest were leased to JetBlue for the start-up of their operations at Logan. In 2006, while in bankruptcy, Delta reaffirmed its lease for Terminal A and relinquished under-utilized gates to Massport. The former Delta gates that reverted to Massport control allowed Continental to relocate from Terminal C to Terminal A and allowed JetBlue to expand its operations at Logan. In 2009, Northwest merged its operations with Delta and relocated to Terminal A and United Airlines gave up two of its underutilized gates, which Massport subsequently re-let to JetBlue allowing for JetBlue's continued expansion at Logan. In 2014, U.S. Airways gave up two of its gates to satisfy the U.S. DOT's request that they relinquish gates two gates at Logan following its merger with American Airlines.⁶²

⁶² These gates were subsequently leased to United.



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5. REVIEW OF MASSPORT ACTIVITY FORECASTS

5.1 Introduction

Massport utilizes two types of forecasts to manage the future requirements of the Airport:

- A planning forecast; and
- A financial forecast.

The planning forecast is used to anticipate future landside and airside infrastructure requirements at the Airport and to estimate the potential environmental impacts of future aviation activity. The financial forecast, which is normally more conservative than the planning forecast, is used for financial planning purposes. This section summarizes and reviews Massport's existing forecasts for Logan Airport and the FAA's most recent projections for the Airport.

Forecast passenger levels for Logan Airport are illustrated in Exhibit 5-1 below and shown in detail in Exhibit 5-2.

50,000,000 FAA TAF 45,000,000 40,000,000 Planning 35,000,000 2014-2035 CAGR **Forecast** 30,000,000 **Financial FAA TAF** 2.2% **BOS Planning** 1.7% 25,000,000 **BOS Financial** 1.1% 20.000.000 15 '16 '17 '18 '19 '20 '21 '22 '23 '24 '25 '26 '27 '28 '29 '30 '31 '32 '33 '34 '35

Exhibit 5-1: Boston Logan Passengers, Forecast (2015 to 2035)

Notes:

CAGR refers to compound annual growth rate.

 $\label{thm:massport} \mbox{Massport's financial and planning forecasts are on a calendar year basis.}$

The financial planning forecast is created for only 5-years at a time. ICF has held the growth rate constant beyond the 5-year period in order to show a graphical comparison.

Sources: Massport, FAA Terminal Area Forecasts 2011-2035, January 2015.



Exhibit 5-2: Boston Logan Passengers Actual (2011 to 2014) and Forecast (2015 to 2035)

Calendar Year	Massport Financial	Annual Change	Massport Planning	Annual Change	FAA TAF ^{\1}	YoY Change
Actual						
2011	28,909,267	_	28,909,267	-	28,255,876	-
2012	29,235,643	1.1%	29,235,643	1.1%	28,651,856	1.4%
2013	30,218,631	3.4%	30,218,631	3.4%	29,108,230	1.6%
2014	31,634,455	4.7%	31,634,455	4.7%	30,063,328	3.3%
Forecast						
2015	32,258,004	2.0%	32,825,415	3.8%	30,762,006	2.3%
2016	32,741,874	1.5%	33,875,828	3.2%	31,666,982	2.9%
2017	33,233,002	1.5%	34,146,835	0.8%	32,638,892	3.1%
2018	33,644,764	1.2%	34,420,009	0.8%	33,541,802	2.8%
2019	33,981,212	1.0%	34,695,369	0.8%	34,403,872	2.6%
2020	34,321,024	1.0%	35,044,886	1.0%	35,235,180	2.4%
2021	34,664,234	1.0%	35,629,187	1.7%	35,968,678	2.1%
2022	35,010,877	1.0%	36,225,966	1.7%	36,693,196	2.0%
2023	35,360,985	1.0%	36,833,287	1.7%	37,448,304	2.1%
2024	35,714,595	1.0%	37,458,370	1.7%	38,212,260	2.0%
2025	36,071,741	1.0%	38,101,441	1.7%	38,968,272	2.0%
2026	36,432,459	1.0%	38,771,198	1.8%	39,716,702	1.9%
2027	36,796,783	1.0%	39,444,443	1.7%	40,493,364	2.0%
2028	37,164,751	1.0%	40,143,487	1.8%	41,285,538	2.0%
2029	37,536,399	1.0%	40,856,658	1.8%	42,098,112	2.0%
2030	37,911,763	1.0%	41,594,496	1.8%	42,943,586	2.0%
2031	38,290,880	1.0%	42,343,247	1.8%	43,785,614	2.0%
2032	38,673,789	1.0%	43,102,850	1.8%	44,638,444	1.9%
2033	39,060,527	1.0%	43,881,906	1.8%	45,498,616	1.9%
2034	39,451,132	1.0%	44,682,469	1.8%	46,362,414	1.9%
2035	39,845,644	1.0%	45,501,450	1.8%	47,248,570	1.9%
Average A	Average Annual Growth					
2014-2035		1.1%		1.7%		2.2%

Note: Massport's forecasts include general aviation passengers.

\1 FAA TAF forecast is for Federal fiscal years ended September 30. TAF data is forecasted for 2014.

Sources: Massport and FAA, Terminal Area Forecasts 2011-2035, January 2015.



5.2 Massport Planning Forecasts

Massport uses long-term forecasts of Logan Airport activity to plan for facilities and operations, and to assess environmental impacts. Over the past decade, Massport has updated its long-term planning forecasts several times to account for fluctuations in Airport activity due to economic cycles, the events of 9/11, the growth of LCC services, and airline restructuring and consolidation.

The current long-term (through 2035) planning forecast was finalized in March 2015 by InterVISTAS Consulting LLC and reflects the effects of a moderate economic recovery, changes in airline operating strategies and fleets, next-generation aircraft technologies and shifting passenger preferences. Under the long-term planning forecast, the Airport is projected to reach 38.1 million passengers in 2025 and 45.5 million passengers in 2035. International passenger traffic is forecast to grow at a faster rate than domestic with the international share rising from approximately 16 percent in 2014 to 20 percent in 2035.

5.2.1 Planning Forecast Methodology

InterVISTAS divided the forecast timeline into two periods: short-term (2015-2016); and mediumand long-term (2017-2035). This division is useful to isolate brief trends experienced in recent years from trends materializing over a longer horizon. The short-term forecast was estimated by examining forward carrier schedules covering January-June 2015, the short-term economic outlook for Massachusetts, as well as recent trends in passenger growth and share within the region.

As shown in Exhibit 5-3 below, the long-term forecast was created by first estimating regional traffic (separated into domestic and international O&D markets) using regression analysis of socioeconomic variables. Boston's expected share of this regional market was then estimated for each forecast year, followed by the addition of connecting passengers.

Apply Boston Assemble Data Specify Incorporate Obtain 2015-2035 Drivers for Regressions and Logan Regional Estimated Long-Term Estimate Regional **Share Estimates** Connecting Regional Passenger **0&D** Passenger **Passengers** Forecast for Each Forecast for (Entire MARI/NH/ME Traffic for Passenger Type at Boston Boston Logan region) Domestic and International

Exhibit 5-3: InterVISTAS Long-Term Forecast Methodology

Source: Reproduced from InterVISTAS, "Long-Term Airport Traffic Forecast Report: Boston Logan International Airport", March 24, 2015.



5.2.2 Planning Forecast Assumptions

Aviation demand is a function of many factors including local, national and global economic growth; the price of airline travel, which is inextricably linked to fuel prices; and the financial health of the airline industry. Massport's planning forecast assumes that air travel demand for the Boston Service Area and surrounding region will increase over the long-term, but at a slower rate than the long-term historical trend. Specific assumptions are summarized below:

- The economies of Massachusetts and New England will experience long-term, positive population, real income and employment growth.
- The national and local economies will encounter and recover from periodic economic challenges and sustain moderate growth over the long-term.
- The Airport will continue to function primarily as an O&D airport. Potential airline consolidation will not substantially change the air service patterns at the Airport, as merged carriers or new entrants are expected to meet growing demand.
- International airline traffic at the Airport and for the industry as a whole will continue to grow faster than domestic traffic.
- The Airport will continue to operate without airside constraints over the planning horizon, whereby on an hourly basis the runways and taxiways will be able to accommodate all of the projected hourly operations.

5.2.3 Planning Forecast Results

In the short-term, total traffic at Logan Airport is expected to grow by 3.8 and 3.2 percent in 2015 and 2016, respectively. This growth will be driven by JetBlue expansion (the airline has stated it plans to grow to 150 daily departures at Logan by the end of 2015), continued new international service, strong underlying economic growth, and the expansion of JetBlue's international partnerships.

However, growth is expected to slow over the 2017-2020 period as the step change increases from new international service are completed and JetBlue's expansionary thrust is concluded. In addition, InterVISTAS estimates⁶³ that:

- Passenger shares among New England airports will become stable after Logan achieved a record high of 84 percent of all passengers in the New England region in 2014; and
- The share of connecting passengers at Logan will increase slightly, reflecting JetBlue's international partnerships.

As a result of the assumptions and methodology discussed above, InterVISTAS estimates long-term passenger growth at 1.7 percent per year on average, which is in line with expected state

⁶³ InterVISTAS, Long-Term Airport Traffic Forecast Report: Boston Logan International Airport, March 24, 2015.



personal income growth (1.8 percent per year over the same period). Faster growth is expected in the international passenger market due to expanded international service.

As explained in Section 4.3, recent passenger growth has not been accompanied by corresponding aircraft operations growth, indicating that increasing load factors and aircraft size are absorbing much of the passenger growth. InterVISTAS estimates that this trend will continue; passengers are projected to increase by 1.7 percent annually from 2014-2035 while aircraft operations are projected to increase by 1.2 percent.

5.3 Massport Financial Forecast

Massport's financial forecast, on a calendar year basis, is intended to be conservative and is based on actual passenger traffic for CY 2014 and for January-March 2015. For the remainder of CY 2015, 1.5 percent growth is assumed for April-June and 1.5 percent growth is assumed for July-December. The financial forecast assumes annual growth of 1.5 percent from CY 2015 through CY 2017, 1.2 percent growth in CY 2018 and one percent from CY 2019 through CY 2035. Under these growth assumptions, the Airport is forecast to reach 39.8 million passengers in CY 2035.

The five-year financial forecast, restated for Massport's fiscal year, is summarized in Exhibit 5-4. For financial planning purposes, Massport projects Airport passenger traffic to increase at an average annual rate of 1.8 percent reaching past 33.8 million passengers in FY 2019.

Exhibit 5-4: Massport Financial Forecast (FY 2015 to FY 2019)

Fiscal Year	Passengers (000s)	Annual Change			
Actual					
2011	28,382	-			
2012	29,298	3.2%			
2013	29,487	0.6%			
2014	30,850	4.6%			
Forecast	<u> </u>				
2015	32,009	3.8%			
2016	32,489	1.5%			
2017	32,977	1.5%			
2018	33,471	1.5%			
2019	33,806	1.0%			
Average Annual Growth					
2014-201	9	1.8%			

Note: Forecast includes general aviation passengers. Massport's financial forecast is for the fiscal year ended June 30.



5.4 FAA Aviation Forecasts

The FAA has developed extensive aviation forecasting models that are used to project passengers and aircraft operations for the U.S. airline industry and for individual airports. The FAA develops its national forecast annually. In March 2015, the FAA released its annual industry forecast – FAA Aerospace Forecasts, Fiscal Years 2015 – 2035 (the U.S. Federal Government fiscal year begins October 1). The national forecast serves as a major input to the development of the individual airport projections in the Terminal Area Forecasts ("TAF").

5.4.1 FAA U.S. Industry Projections

The FAA is cautiously optimistic that over the long-term airline passenger traffic will return to historical growth levels. After another year of slow growth in 2015, the FAA forecast calls for passenger growth to accelerate over the near term, buoyed by rapidly declining fuel prices, as the economic recovery in the U.S. solidifies.

The FAA forecast assumes that the economic recovery in the U.S. will continue to accelerate in 2015 as headwinds facing the economy appear to be diminishing. Real U.S. GDP growth is forecast to increase from 2.5 percent in FY 2014 to 2.6 percent in FY 2015 before returning to 2.4 percent in FY 2016. From FY 2016 to FY 2021, real U.S. GDP growth is assumed to average 2.6 percent before falling to 2.3 percent for the remainder of the forecast period. The FAA forecast assumes oil prices continue to decrease in FY 2015 by 38.1 percent (from approximately \$98 per barrel in FY 2014 to \$60 per barrel in FY 2015) before beginning to rebound in FY 2016, increasing by 7.5 percent to \$65 per barrel. It is assumed that oil prices will not return to FY 2014 levels until 2020 when prices will finally reach \$99 per barrel, after which prices are projected to grow closer to the rate of inflation. Over the long-term forecast period (FY 2014 to FY 2035), the FAA assumes that oil prices increase at an average annual rate of 2.4 percent.

After actual passenger growth of 0.8 percent in FY 2012 and 0.4 percent in FY 2013, the FAA forecast estimates that passenger enplanements at U.S. airports (including U.S. commercial carriers only) grew by 2.3 percent in FY 2014. Annual passenger growth is expected to accelerate to 2.6 percent in FY 2015 and then slow to 1.8 percent in FY 2016. Over the long-term forecast horizon (FY 2014 to FY 2035), the FAA projects U.S. air passengers to increase at an average annual rate of 2.0 percent.

The FAA forecasts international passenger traffic to grow at 3.6 percent per year compared to 1.7 percent for the domestic segment from FY 2014 to FY 2035. Within the international market segment, the Latin America market is projected to grow the fastest at 4.0 percent per year, followed by the Asia/Pacific market at 3.5 percent and the Atlantic market at 2.5 percent.

The FAA forecast assumes that the economy recovers from the recent downturn and sluggish growth rates and that there are no major external shocks such as additional sharp oil price spikes, unusual shifts in macroeconomic policy or global financial crises. While the FAA is "cautiously optimistic" that its most recent forecast can be achieved, it recognizes a number of uncertainties



surrounding the underlying assumptions. The risks to the forecast include: (1) weaknesses in the global economy that may threaten the strength and sustainability of the recovery; (2) a rise in fuel prices greater than forecast; (3) a terrorist incident aimed at aviation; (4) regional airline consolidation; (5) airline industry consolidation through global alliances that could lead to increased regulatory oversight, which may impede the evolution of anti-trust immunity for global alliance partners; (6) a buildup of congestion and delays that could limit growth over the forecast period; and (7) environmental regulations or restrictions, such as air emissions trading schemes, that could increase costs and reduce demand.

5.4.2 FAA Terminal Area Forecasts for Logan

After completing its industry level projections, the FAA translates the national forecast into airport level forecasts. The FAA's most recent Terminal Area Forecast (TAF) for fiscal years 2015-2040 was released in March 2015. The TAF projects Logan's airline passenger traffic to increase at an average annual rate of 2.2 percent and grow to 47.2 million passengers in FY 2035.

5.5 ICF Review of Massport Forecasts

ICF believes that the Massport financial forecast and the Massport planning forecast represent reasonable projections of future activity at the Airport, given the volatility facing the airline industry. The financial forecast assumes a long-term average growth rate of 1.1 percent and the planning forecast assumes slightly faster growth of 1.7 percent per year. The financial forecast assumes a slower growth rate than the Airport's long-term historical growth of 1.4 percent per year from 1995 to 2014.

The planning forecast, which assumes passenger growth of 1.7 percent per year, represents a reasonable upper bound and is appropriate for facility planning and environmental impact analysis. While the planning forecast growth rate is higher than the Airport's performance over the historical period (1995-2014), the period since 2000 has been marked by severe and unusual shocks, from the 9/11 terrorist attacks to the global financial crisis and Great Recession. Despite these shocks and their effects, the Boston air travel market has shown resiliency and the fundamental strengths of the market remain: Logan serves a region with higher than average personal income and wealth; Logan is a strong O&D market; the Boston service area is characterized by travel-intensive industries that generate business travel and also benefits from numerous attractions and cultural activities that draw leisure travelers; Logan serves as a major international gateway to Europe and has gained new international services to Asia, the Middle East and Central America in recent years; and, LCCs have established a strong presence at Logan and continue to expand.

ICF expects that over the long-term horizon, passenger growth at Logan will be lower than the national average, reflecting Boston's maturity as an air travel market. In ICF's opinion, over the long term, Massport's planning and financial forecasts represent reasonable upper and lower bounds of future passenger activity at Logan Airport.



5.5.1 Forecast Risks

Any forecast is subject to uncertainties. Inevitably, some assumptions will not be realized, and unanticipated events and circumstances may occur. Therefore, there are likely to be differences between the forecast and actual results, and those differences may be material. While the Massport forecasts are based on historical data and future assumptions that ICF believes are reasonable, some of the underlying assumptions that are detailed explicitly or implicitly may not materialize due to unforeseen events or circumstances. The main uncertainties to the forecasts are:

- Future fuel prices;
- Terrorist acts that could disrupt air travel demand;
- Short-term service disruptions at the Airport due to further airline restructuring activities (liquidations or consolidation);
- The ability of airlines to operate profitably;
- Weak global economic growth;
- Environmental regulations that could increase airline costs or restrict activity;
- Long-term changes in air travel propensities; and
- Congestion and delays in the national airspace system.





APPENDIX D



June 18, 2015

Mr. Thomas P. Glynn
Chief Executive Officer and Executive Director
Massachusetts Port Authority
One Harborside Drive, Suite 200S
East Boston, Massachusetts 02128

Re: Review of Airport Properties Net Revenues Forecast Massachusetts Port Authority

Revenue Bonds, Series 2015-A (Non-AMT) and Revenue Bonds, Series 2015-B (AMT)

Dear Mr. Glynn:

LeighFisher is pleased to submit this review of the Airport Properties Net Revenues forecast in connection with the proposed issuance of Revenue Bonds, Series 2015-A (Non-AMT) and Revenue Bonds, Series 2015-B (AMT) (collectively, the Series 2015 Bonds), by the Massachusetts Port Authority (the Authority). Capitalized terms not otherwise defined have the meanings given to such terms in the Trust Agreement by and between the Authority and U.S. Bank National Association, as trustee, dated as of August 1, 1978, as amended and supplemented (the 1978 Trust Agreement).

The Authority is a multipurpose agency that owns and operates, among other facilities, Boston-Logan International Airport (the Airport, or Logan Airport); Hanscom Field, a general aviation reliever airport; and Worcester Regional Airport (collectively, the Airport Properties). In FY 2014*, the Airport Properties generated 86.2% of total Authority operating revenues.

The Authority intends to issue the Series 2015 Bonds under the terms of its 1978 Trust Agreement to finance part of the costs of certain capital improvements to the Airport Properties. These improvements are part of the Authority's overall \$2.7 billion capital program for the period FY 2015 to FY 2019 (the FY 2015-FY 2019 Capital Program). The following projects will be partially funded with a portion of the proceeds of the Series 2015 Bonds (bond funded amounts are shown in parenthesis, and total \$181.3 million):

- Construction of 2,050 additional parking spaces (\$80.0 million)
- Property acquisition and parking improvements Braintree (\$30.0 million)
- Heating, ventilation and air conditioning (HVAC) equipment replacement (\$18.5 million)
- Central heating plant systems upgrades (\$17.0 million)
- Post security corridor between Terminals C and E (\$10.2 million)
- HVAC equipment distribution (\$9.0 million)
- Framingham Logan Express parking garage (\$5.6 million)
- Terminal A airline relocation (\$5.0 million)
- Roof replacements (\$3.5 million), and
- New remain overnight (RON) aircraft parking spaces (\$2.5 million)

^{*}The Authority's Fiscal Year (FY) ends June 30.



The Authority has prepared certain financial forecasts in connection with the issuance of the Series 2015 Bonds, which are included in the Official Statement for the Series 2015 Bonds, to which this study is attached as an appendix.

SCOPE OF STUDY

In conducting our study, we reviewed:

- The estimated costs and funding sources for Airport Properties capital improvements included in the FY 2015-FY 2019 Capital Program, as prepared by the Authority.
- The forecast sources and uses of funds for the Series 2015 Bonds, and associated forecast annual
 debt service requirements for the Series 2015 Bonds, as prepared by the Authority and its
 financial advisor (Public Financial Management, Inc.), as well as the Authority's preliminary plans
 for future bond issues during the period FY 2016 through FY 2019.
- The Authority's approved passenger facility charge (PFC) applications, the Authority's Board vote adopted on February 19, 2015, regarding the preparation and submission to the FAA of its tenth PFC Application during calendar year 2015, and drafts of the PFC Application document. We also reviewed the Authority's preliminary plans for future PFC applications during the period FY 2016 through FY 2019. PFC revenues of the Authority are not pledged to the payment of debt service on the Series 2015 Bonds.
- The Authority's Strategic Plan reflecting the Authority's current intentions regarding the long-term development of its Airport Properties as well as the Authority's non-aviation properties.
- The Authority's rental car customer facility charge (CFC) program, including its history of CFC collections since inception of the program in December 2008. CFC revenues of the Authority are not pledged to the payment of debt service on the Series 2015 Bonds.
- The Authority's business arrangements related to the development and operation of the Rental Car Center that opened for service in September 2013, as well as the concession agreements between the Authority and the rental car companies related to rental car operations at the Airport.
- The Authority's forecast of deposits to the Payment in Lieu of Taxes (PILOT), Self Insurance, Maintenance Reserve, Capital Budget, and Improvement and Extension funds or accounts.
- The Authority's policies and rate-making procedures relating to the calculation of airline terminal
 rents and landing fees, as documented in the Authority's computerized financial model for
 calculating annual airline rates and charges, the Authority's booklet titled "Preliminary FY15
 Commercial Aviation Rates", and documentation of Authority Board votes related to airline rates
 and charges.
- Contractual agreements relating to the use and occupancy of Airport Properties, focusing on those that materially contribute to Airport Properties revenue totals, including the operation of concession privileges, the Delta Air Lines lease for portions of Terminal A, the American Airlines,



US Airways, and United Airlines leases for portions of Terminal B, the JetBlue Airways lease for portions of Terminal C, and other significant leases.

- The Authority's procedure for allocating general and administrative expenses and PILOT costs as documented in the Authority's computerized financial model for calculating annual airlines rates and charges, and the Authority's booklet titled "Preliminary FY15 Commercial Aviation Rates".
- Historical correlations between and among operating revenues, operating expenses, and passenger enplanements at the Airport.
- The Authority's actual Airport Properties operating expenditures for FY 2014, the Authority's
 estimate of operating expenditures for FY 2015 based on trends in actual data for the first nine
 months of FY 2015, the Authority's budgeted operating expenses for FY 2016, and the Authority's
 forecast of operating expenses for FY 2017 through FY 2019.
- The Authority's actual Airport Properties operating revenues for FY 2014, the Authority's estimate
 of revenues for FY 2015 based on trends in actual data for the first nine months of FY 2015, the
 Authority's budgeted operating revenues for FY 2016, and the Authority's forecast revenues for FY
 2017 through FY 2019.
- The Authority's Comprehensive Annual Financial Report (CAFR) for FY 2014.
- The study, dated June 18, 2015, prepared by ICF International of the underlying market for airline traffic demand at the Airport, including trends in the population and economy of the geographic region served, historical trends in airline traffic, key factors affecting future airline traffic, and the Authority's forecasts of airline traffic used for facilities planning purposes and underlying its financial forecasts.
- The Authority's plans for protecting its aviation facilities against long term threats related to climate change such as storm surges, rising sea levels, and intense storm events.

We have relied upon the information listed above and other information provided to us without validating the accuracy, completeness, or reliability of such information. While we have no reason to believe that the information does not provide a reasonable basis for the financial forecasts set forth in this review, we offer no assurances as to the accuracy or reliability of such information.

We have relied upon the estimates of project costs and construction schedules prepared by the Authority. We did not conduct an independent review of the cost estimates or the construction schedules, and offer no opinion on the reasonableness of such costs or the achievability of such schedules.

We reviewed the key factors upon which the Airport Properties Net Revenues may depend, and assisted the Authority in formulating certain assumptions about those factors. Specifically, we assisted the Authority in formulating assumptions regarding passenger enplanements, airline revenues, and operating expenses including incremental operating expenses for new Airport facilities; and we reviewed the Authority's forecasts of parking, rental car, and terminal concession revenues.

We also assisted the Authority in formulating a preliminary plan of finance for implementing the FY 2015-FY 2019 Capital Program.



KEY FACTORS AFFECTING THE NET REVENUES FORECAST

The forecast of Airport Properties Net Revenues is set forth in the accompanying Exhibit A. Achievement of the financial forecast will depend particularly on achievement of the assumptions regarding the key factors described below.

Passenger Traffic

As the Airport predominantly serves origin and destination activity (and has limited airline hubbing operations), future growth in passenger traffic at the Airport will occur largely as a function of the growth in the population and economy of the Boston area. Additionally, several other factors will play a role in the growth in passenger traffic at the Airport, including:

- The type and extent of airline service provided at the Airport
- The type and extent of airline service provided at other regional airports, particularly Manchester-Boston Regional Airport in Manchester, New Hampshire (Manchester) and T. F. Green Airport in Warwick, Rhode Island (T.F. Green)
- National and international economic and political conditions
- Aviation safety, security, and public health concerns
- The financial health of the airline industry
- Airline industry consolidation and alliances
- Airline service, competition, routes and fares
- Availability and price of aviation fuel
- The capacity of the national air traffic control system, and
- Airport capacity provided at the Airport

The national economic recession experienced in 2008 and 2009 had a negative effect on passenger traffic at the Airport. Passenger numbers (enplaned plus deplaned passengers) for FY 2009 totaled 25.0 million, representing a 10.3% decline from the 27.9 million passengers who traveled through the Airport in FY 2007 (which at that time was a record number).

Starting in late 2009, traffic levels at the Airport began to recover. In FY 2014 passenger numbers reached 30.8 million, a new record high.

The Authority's financial forecast is based on the assumption that total passengers at the Airport will increase by 3.8% in FY 2015 compared to FY 2014 (based on nine months of actual data for FY 2015, during which period passenger numbers increased by 4.6%, and assuming a 1.5% increase for the remainder of FY 2015 compared to the same period in the prior year), reaching 32.0 million passengers for the full FY 2015. Further, the Authority's forecast reflects 1.5% annual increases thereafter to FY 2018 and a 1.0% increase in FY 2019 (the final year of the forecast period), reaching 33.8 million passengers in FY 2019.



General factors that will affect the level of passenger traffic at the Airport and other airports in general include the following:

Airline service at the Airport and other regional airports. The Airport had on average 410 scheduled daily nonstop departures to destinations throughout the United States during May 2015. Additionally, there are approximately 58 average daily international departures, primarily to Canadian and European destinations, but also including destinations in Central America, the Caribbean, Asia, and the Middle East. During 2014 and 2015, several foreign flag carriers commenced service at the Airport, including Aeromexico, Cathay Pacific, El Al, Emirates, Hainan, Turkish, and WOW Air.

There is no significant market share concentration among either domestic or foreign flag carriers at the Airport. JetBlue had the largest share of total Airport passengers with 26.5% in FY 2014, but four different airlines have market shares above 10% (inclusive of JetBlue). Additionally, four different airlines have more than 10% shares of the international market at the Airport. The Airport is primarily an origin-destination airport, with more than 94% of passengers beginning or ending their travel in Boston.

JetBlue has recently placed emphasis on routing international connecting traffic through its major east coast airports (New York-Kennedy and Logan Airport). JetBlue's strategy is to enter into alliances and agreements with foreign flag carriers to feed its domestic route network with international passengers. JetBlue has such agreements with Aer Lingus and Emirates Airlines, among others. While to date there has been no discernable impact on connecting passenger activity levels at Logan Airport resulting from these arrangements, there may be a resulting uptick in connecting passenger activity at Logan Airport in the future. The Authority's passenger traffic forecasts described in this report do not incorporate increases in passenger hubbing activity that could potentially occur in the future, which would likely be accretive to the forecast passenger numbers.

Of the three major airports serving the Boston area (T.F. Green and Manchester, in addition to Logan Airport), the Airport has always had by far the largest passenger market share in the region. However, during the period from approximately 1995 to 2005, the Airport's regional market share declined from 89% to 73% as low cost carriers (LCCs) aggressively built up their operations at Manchester and T.F. Green. Since 2005, however, the trend has reversed. A strong buildup of LCC activity at the Airport, combined with retrenchment at Manchester and T.F. Green, has driven the Airport's regional market share back up to almost 85% in calendar year 2014, according to traffic statistics reported by each airport.

National and international economic and political conditions. Historically, airline passenger traffic nationwide has correlated closely with the state of the U.S. economy and levels of real disposable income. Recession in the U.S. economy in 1990-1991, 2001, and 2008-2009 and associated high unemployment reduced discretionary income and contributed to reduced airline travel demand in those years. More recently, the significant improvement in economic conditions in the U.S. has contributed to the rebound in aviation activity levels nationwide.

Additionally, with the globalization of business and the increased importance of international trade and tourism, the state of the U.S. economy has become more closely tied to worldwide economic, political, and social conditions. As a result, international economics, trade balances, currency exchange rates, political relationships, and hostilities all influence passenger traffic at major U.S. airports. Sustained future increases in passenger traffic at the Airport will depend on stable international conditions as well as national and global economic growth.



Aviation safety, security, and public health concerns. Aviation safety and security concerns affect passengers' travel behavior and airline travel demand. Anxieties about the safety of flying and the inconveniences and delays associated with security screening procedures lead to both the avoidance of travel and the switching from air to surface modes of transportation for short trips.

Safety concerns in the aftermath of the September 2001 terrorist attacks were largely responsible for the steep decline in airline travel nationwide in 2002, and contributed to travelers shifting away from taking relatively short trips by air, to travel by other modes. Since 2001, government agencies, airlines, and airport operators have upgraded security measures to guard against changing threats and maintain confidence in the safety of airline travel.

Public health concerns, and climate and environmental concerns, have also affected air travel demand from time to time. In 2009, concerns about the spread of influenza caused by the H1N1 virus reduced certain international travel to and from certain areas, particularly Mexico and Asia. In April 2010, airspace and airports in much of Europe were closed for six days because of the threat to flight safety related to the ash cloud from the eruption of a volcano in Iceland. In March 2011, airline travel to and from Japan decreased following a destructive earthquake and tsunami. During 2014, airline travel to and from Africa was affected by the outbreak of the Ebola virus in certain West African countries.

Historically, airline travel demand has recovered after temporary decreases stemming from terrorist attacks or threats, hijackings, aircraft crashes, public health concerns, and international hostilities. Provided that precautions by government agencies, airlines, and airport operators serve to maintain confidence in the safety of commercial aviation without imposing unacceptable inconveniences for airline travelers, it can be expected that future demand for airline travel at the Airport will depend primarily on economic, not safety, security, or public health factors.

The financial health of the airline industry. The number of passengers using the Airport will depend partly on the profitability of the U.S. airline industry and the associated ability of the industry and individual airlines to make the necessary investments to provide service.

In 2008 and 2009, the U.S. passenger airline industry recorded net losses of approximately \$27 billion. The industry responded by grounding older, less fuel-efficient aircraft, adopting fuel-saving operating practices, hedging fuel requirements, reducing scheduled seat capacity, eliminating unprofitable routes and hubs, laying off employees, reducing employee compensation, reducing other non-fuel expenses, increasing airfares, and imposing ancillary fees and charges. Between 2007 and 2009, the U.S. passenger airlines collectively reduced domestic capacity (as measured by available seat-miles) by approximately 10%.

In 2010 through 2013, the U.S. passenger airline industry as a whole recorded net income of approximately \$8 billion, in spite of sustained high fuel prices, by controlling capacity and nonfuel expenses, increasing airfares, improving load factors (related to constrained capacity growth), and increasing ancillary revenues. Over the four years 2009 to 2013, the airlines collectively increased domestic seat-mile capacity by an average of just 1% per year. During late 2014 and early 2015, airline profitability was further boosted by the significant decline in fuel prices.

Sustained industry profitability will depend on, among other factors, economic growth to support travel demand, continued capacity control to allow increased airfares, and stable fuel prices. Consolidation of the airline industry has resulted in four airlines (American, Delta, Southwest, and United) now accounting for



approximately 84% of domestic capacity and is expected by airline industry analysts to contribute to industry profitability. However, any resumption of financial losses could cause U.S. airlines to seek bankruptcy protection or liquidate. The liquidation of any of the major network airlines (defined herein as American/US Airways, Delta, and United) would drastically affect airline service at certain connecting hub airports, present business opportunities for the remaining airlines, and change airline travel patterns nationwide.

Because the Airport is predominantly an origin and destination airport, with limited connecting passenger activity, it is expected that if JetBlue or another carrier serving the Airport were to liquidate or were to significantly reduce service at the Airport as a result of a merger with another airline, there would be no long-term reduction in the number of passengers using the Airport, because other airlines would increase service to accommodate passengers who would otherwise have traveled on the liquidated carrier. In the event of such an occurrence, however, there could be a material reduction in passenger numbers at the Airport in the short term, because the other airlines serving the Airport would require lead time to adjust their local operations and flight schedules.

Airline consolidation and alliances. In response to competitive pressures, the U.S. airline industry has consolidated. Most recently, in October 2010, United and Continental completed their merger; in May 2011, Southwest completed its acquisition of AirTran, and the two airlines fully integrated operations at the end of calendar year 2014; and in December 2013, American and US Airways completed their merger to create the world's largest airline by seat-mile capacity.

Any further airline consolidation could change airline service patterns, particularly at the connecting hub airports of the merging airlines. However, as previously noted, passenger traffic at Logan Airport is predominantly origin and destination, with minimal connecting activity.

Alliances, joint ventures, and other business arrangements provide airlines with many, but not all, of the advantages of mergers; all of the large U.S. network airlines are members of such alliances with foreign-flag airlines. Alliances typically involve marketing, code-sharing, and scheduling arrangements to facilitate the transfer of passengers between the airlines. Joint ventures involve even closer cooperation and the sharing of costs and revenues on certain routes. As noted earlier, JetBlue has entered into code-sharing and other forms of partnership agreements with a range of foreign flag carriers.

Airline service, competition, routes, and fares. The number of origin and destination passengers traveling through the Airport depends on the propensity of Boston region residents to travel by air and the intrinsic attractiveness of the region as a business and leisure destination. Although passenger demand at an airport depends primarily on the population and economy of the region served, airline service and the numbers of passengers enplaned also depend on the route networks of the airlines serving that airport. Major network airlines have emphasized the development of hub-and-spoke route networks as a means of increasing their service frequencies, passenger numbers, and profitability. Logan Airport almost exclusively serves origin-destination passengers. It does not serve as a hub for any airline and, consequently, is not dependent on connecting passengers.

Airline fares have an important effect on passenger demand, particularly for relatively short trips for which the automobile and other travel modes are potential alternatives, and for price-sensitive "discretionary" travel. The price elasticity of demand for airline travel increases in weak economic conditions when the disposable income of potential airline travelers is reduced. Airfares are influenced by airline capacity and



yield management; passenger demand; airline market presence; labor, fuel, and other airline operating costs; taxes, fees, and other charges assessed by the airlines themselves as well as governmental and airport agencies; and competitive factors. Future passenger numbers, globally, nationwide and at the Airport, will depend partly on the level of airfares.

Overcapacity in the industry, the ability of consumers to compare airfares and book flights easily via the internet, and other competitive factors combined to reduce airfares between 2000 and 2005. During that period, the average domestic yield for U.S. airlines decreased from 16.1 cents to 13.8 cents per passengermile. From 2006 through 2008, as airlines reduced capacity and were able to sustain fare increases, the average domestic yield increased to 15.9 cents per passenger-mile. In 2009, yields again decreased, but, beginning in 2010, as airline travel demand increased and seat capacity was restricted, yields increased, reaching 18.2 cents per passenger-mile by 2014. In addition, beginning in 2006, ancillary charges have been introduced by most airlines for services such as checked baggage, in-flight meals, and preferred seating, thereby increasing the effective price of airline travel more than these yield figures indicate.

While the major network airlines have suffered financially over the past decade (until the recent uptick in financial performance), the LCC carriers have aggressively expanded their operations throughout the nation. LCCs are carriers that take advantage of an operating cost structure that is significantly lower than the cost structure of the legacy carriers. These advantages can include lower labor costs, greater labor flexibility, a streamlined aircraft fleet (i.e., fewer different types of aircraft in a given airline's fleet), and a generally more efficient operation. These low costs suggest that the LCCs can offer a low fare structure to the traveling public while still maintaining profitability. In calendar year 2014, LCCs provided approximately 28% of the airline seat capacity in the U.S. market.

LCCs have significantly increased their service at the Airport, in common with many large hub airports* nationwide. Five domestic LCCs currently operate at the Airport—JetBlue, Southwest, Spirit, Sun Country and Virgin America. In addition, one foreign flag LCC (WOW Air) provides international service from the Airport to Reykjavik. Collectively, the six LCCs provided 163 daily departures as of May 2015 (according to published schedules) and account for 36% of Airport-wide scheduled departing seats in FY 2015, up from 27% in FY 2010. The LCCs collectively lease 28 gates at the Airport.

To some extent, there is a blurring of the distinction between the major network airlines and LCCs. As the LCCs have started to serve airports in major metropolitan areas (such as JetBlue at Logan Airport and New York-Kennedy; Southwest at Logan Airport and New York-LaGuardia, etc.), and some LCCs have faced increases in labor costs (e.g., JetBlue pilots recently unionized), the cost base of the traditional LCC has trended upwards. At the same time, the major network carriers have been striving to adopt some of the practices and operational norms of the LCCs, resulting in a general downtrend for major network airline costs.

Availability and price of aviation fuel. The price of aviation fuel is a critical and uncertain factor affecting airline operating economics. Fuel prices are particularly sensitive to worldwide political instability and economic uncertainty. In mid-2008, average fuel prices were three times higher than they were in mid-2004 and represented the largest item of airline operating expense, accounting for between 30% and 40% of expenses for most airlines. Fuel prices fell sharply in the second half of 2008 as demand declined

^{*}Large hub airports are defined by the FAA as those that represent at least 1% of total enplanements nationwide.



worldwide, but subsequently increased as global demand increased. Between early 2011 and mid-2014, fuel prices were relatively stable, partly as a result of increased oil supply from U.S. domestic production. During the second half of 2014, an imbalance between worldwide supply and demand resulted in a precipitous drop in the price of oil and aviation fuel. The average price of aviation fuel was approximately 33% lower than in mid-year. The reduction in fuel prices is having a positive effect on airline profitability as well as far-reaching implications for the global economy.

Airline industry analysts hold differing views on how oil and aviation fuel prices may change in the near term. However, there is widespread agreement that fuel prices are likely to increase over the long-term as global energy demand increases in the face of finite and increasingly expensive oil supplies.

Aviation fuel prices will continue to affect airfares, and therefore passenger numbers, airline profitability, and the ability of airlines to provide service. Airline operating economics will also be affected as regulatory costs are imposed the airline industry as part of efforts to reduce aircraft emissions contributing to global climate change.

Capacity of the national air traffic control system. Demands on the national air traffic control system have, in the past, caused delays and operational restrictions affecting airline schedules and passenger traffic. The FAA is gradually implementing its Next Generation Air Transport System (NextGen) air traffic management programs to modernize and automate the guidance and communications equipment of the air traffic control system and enhance the use of airspace and runways through improved air navigation aids and procedures. Since 2007, air traffic delays decreased as a result of reduced numbers of aircraft operations, but as airline travel demand increases in the future, flight delays and restrictions may be expected.

Capacity of Boston-Logan International Airport. In addition to any future constraints that may be imposed by the national air traffic control and airport systems, future growth in airline traffic at the Airport will depend on the capacity at the Airport itself. According to Authority management, the Airport has sufficient airfield and terminal capacity to accommodate the assumed level of passenger traffic that underlies the financial forecasts beyond FY 2019 (the final year of the forecast period).

Airline Rents and Fees

The Authority expects to continue to calculate airline rents and fees generally on the basis of existing ratemaking procedures, as documented in the Authority's computerized financial model for calculating annual airlines rates and charges, and the Authority's booklet titled "Preliminary FY15 Commercial Aviation Rates". Terminal rentals are calculated using a "commercial compensatory" methodology, with the Authority recovering a portion of the allocated operating expenses and capital costs for each terminal through terminal rental revenues. Where applicable, the Authority's lease agreements with air carriers for terminal space at the Airport state that the Authority may revise rental rates periodically, at the Authority's discretion, to recover the actual direct and indirect capital and operating costs for such leased space. The landing fee rate is calculated on a "cost center residual" basis, with the allocated operating and capital costs for the airfield area, net of certain revenues generated from miscellaneous activities on the airfield, divided by the scheduled airlines' landed weight.



Parking Facilities and Rates

Authoribile parking fees are a major source of operating revenue and in FY 2014 represented approximately 22.0% of total Authority operating revenues (or 25.5% of Airport Properties Revenues). The Authority's financial forecasts reflect an increase of \$3 in the maximum daily parking rates at all of the Authority's on-Airport parking lots (both the short-term terminal area lots and the long-term lot) effective July 1, 2016, with a further \$2 increase effective July 1, 2018. The Authority's Board has already approved the increase scheduled for July 1, 2016, but has not yet approved the increase assumed to occur on July 1, 2018. Parking rates are not expected to be adjusted at the Authority's off-Airport Logan Express lots during the forecast period.

Operating Expenses

The Authority incurs operating expenses when maintaining, repairing and operating the Airport Properties. Such expenses generally include salaries and benefits, materials and supplies, repair, maintenance, services, professional fees, utilities, insurance, and other miscellaneous expenses, as well as administrative expenses allocated to the Airport Properties. Operating expenses are allocated to each cost center, including airfield and terminal cost centers, for cost recovery purposes through the airline rentals and fees.

Implementation of the FY 2015-FY 2019 Capital Program

The forecast of Airport Properties Net Revenues incorporates the impact on Revenues and operating expenses of projects intended to be developed at the Authority's Airport Properties as part of the FY 2015-FY 2019 Capital Program (including projects that are proposed to be funded with a portion of the proceeds of the Series 2015 Bonds, and the Authority's planned Series 2016 Bonds and Series 2018 Bonds, which are expected to be issued under the terms of the 1978 Trust Agreement). Other funding sources for projects in the FY 2015-FY 2019 Capital Program include federal grants, PFCs, CFCs, the Authority's internally generated capital, and tenant and third party financing.

In the event that such FY 2015-FY 2019 Capital Program projects are not implemented, the associated Revenues and operating expenses would not be realized. See the section of Appendix A to the Official Statement titled "Capital Program" for a detailed discussion of the FY 2015-FY 2019 Capital Program costs and funding sources.

Tenant and Third Party Funded Projects

The Authority intends to fund certain capital projects using funds from tenants or third parties, or from revenue sources that are not included in Revenues, as defined in the 1978 Trust Agreement. There are nine such projects in the Authority's FY 2015-FY 2019 Capital Program related to the Airport Properties; two projects at Logan Airport – airline improvements in Terminal C related to the JetBlue expansion (\$100 million), and a vendor delivery inspection station (\$20 million) – and seven projects totaling \$64.4 million at the Authority's other airports (Worcester Regional Airport and Hanscom Field). There are also third party funded projects in the Authority's non-aviation properties. Generally, the Authority would not undertake tenant and third party projects if funding from those sources was not available.

Passenger Facility Charges

At various times since 1999, the Authority has issued PFC Revenue Bonds on a "stand alone" basis under the terms of its PFC Trust Agreement, which are secured only by PFC revenues. Subsequent to the payment



of its scheduled PFC Revenue Bond principal payment on July 1, 2015, the Authority will have \$75.2 million in principal amount of such bonds outstanding, in two separate series, with final maturity on July 1, 2017. Such bonds are not secured by Authority Revenues under the terms of the 1978 Trust Agreement. Debt service on the PFC Revenue Bonds is paid solely from the Authority's PFC revenue stream.

PFC revenues of the Authority are paid by passengers enplaned at the Airport (and interest income thereon) and are pledged to the payment of debt service on bonds issued under the terms of the Authority's PFC Trust Agreement. These PFC revenues are not Revenues of the Authority as defined in the Authority's 1978 Trust Agreement, and thus, PFCs are not pledged to the payment of debt service on the Series 2015 Bonds or any of the Authority's other currently outstanding Bonds issued under the 1978 Trust Agreement. (Conversely, Revenues of the Authority as defined in the 1978 Trust Agreement are not pledged to the payment of debt service on the Authority's PFC Revenue Bonds.)

The Authority has received approval from the FAA to levy a PFC at the \$4.50 level per PFC-eligible enplaned passenger at the Airport. The Authority currently has approvals to collect and spend a total of \$1.55 billion in PFC revenue under the terms of nine separate FAA-approved PFC applications (as amended), with a projected PFC charge expiration date of October 1, 2024. PFC revenues are used to fund capital project costs on a pay-as-you-go basis, to pay debt service on the PFC Revenue Bonds and a portion of the special facility bonds debt service related to Terminal A, and to pay interest and repay principal on commercial paper issued to fund PFC-eligible project costs. From inception of the Authority's PFC program in 1993 through March 31, 2015, a total of \$960.7 million in PFC revenue has been collected by the Authority, including interest income on certain funds and accounts established under the Authority's PFC Trust Agreement.

The Authority intends to file its tenth PFC application with the FAA by August 4, 2015. A Final Agency Decision from the FAA is expected by late 2015. The Authority is expecting to seek \$137.0 million in PFC collection and spending approval for certain projects as part of its tenth PFC application. One project that is proposed for partial funding with Series 2015 Bond proceeds (construction of a post-security corridor connecting Terminal C and Terminal E) is included in the Authority's tenth PFC application.

Rental Car Center and the CFC Program

A new Rental Car Center and associated facilities, located in the Southwest Service Area of the Airport, opened for service in September 2013. The primary source of funding for the Rental Car Center was the Authority's Special Facilities Revenue Bonds (ConRAC Project), Series 2011A and Series 2011B (collectively, the 2011 CFC Bonds), which were issued in the aggregate par amount of \$214.1 million. The 2011 CFC Bonds are not secured by a pledge of Authority Revenues under the 1978 Trust Agreement, but by a pledge of the Authority's CFC revenue stream. (Conversely, Revenues of the Authority as defined in the 1978 Trust Agreement are not pledged to the payment of debt service on the Authority's bonds issued under the terms of its CFC Trust Agreement entered into in connection with the issuance of the 2011 CFC Bonds.)

The CFC is \$6.00 per rental car transaction day paid by each rental car customer. The Authority collected \$30.0 million in CFC revenues during FY 2014.

CFCs are excluded from the Revenue totals forecast herein because the Authority excludes CFCs from Revenues, as defined in the 1978 Trust Agreement, under the terms of the 19th Supplemental Agreement to



the 1978 Trust Agreement. CFC revenues are pledged as special facility revenues under the Authority's CFC Trust Agreement.

Certain elements of the Rental Car Center development do, however, impact Net Revenues as defined under the 1978 Trust Agreement. The Authority is responsible for operating and performing routine maintenance on common use areas of the building, and for providing security in the building and surrounding areas. The rental car companies pay a building rental to cover those costs. Additionally, the rental car companies pay a Common Airport Transit System (CATS) fee for their allocated share of the costs of providing the Airport terminal area busing system. Both of these revenue sources, as well as the ground rentals that the rental car companies pay for the land under the Rental Car Center, are Revenues of the Authority under the terms of the 1978 Trust Agreement.

Similarly, the Authority's maintenance and operating costs incurred with respect to the Rental Car Center are operating expenses of the Authority in accordance with the 1978 Trust Agreement.

The Authority's Strategic Plan

The Authority recently completed a unified Strategic Plan for all of its facilities, which was adopted by the Board in November 2014. With respect to its Aviation Properties, the key goal of the Strategic Plan was to identify the necessary improvements to its airside, landside, and ground access facilities that would allow Logan Airport to accommodate 35 million passengers by calendar year 2022. The strategic initiatives identified as part of the planning process are consistent with improvements to be undertaken during the period FY 2015 through FY 2019. With respect to Logan Airport, key initiatives include, among others, the preparation of a Passenger Terminal Development Plan, which addresses both the configuration and timing of additional international gates and passenger processing facilities, and continuing to develop plans and programs for accommodating ground access needs at the Airport (including the provision of adequate parking facilities).

Authority management and staff are developing and will continue to work to develop specific business plans designed to address and implement the strategic initiatives across all of its properties. As detailed business plans for each strategic initiative are developed, refined, and approved in the context of the thencurrent operating environment and aviation activity levels, those projects will become part of future five-year rolling capital programs to be approved by the Authority's Board.

Worcester Regional Airport and Hanscom Field

The Authority has owned and operated Worcester Regional Airport, a commercial service airport located in Worcester, Massachusetts, since 2010. Prior to that, the Authority was responsible for operating the facility for a number of years, under the ownership of the City of Worcester. JetBlue commenced scheduled air service at the airport in November 2013, and is currently the sole commercial service airline operating at the airport.

Hanscom Field, located principally in the Town of Bedford, Massachusetts, is a general aviation reliever airport for Logan Airport. The Authority has owned and operated Hanscom Field since 1974.

Taken together, Worcester Regional Airport and Hanscom Field accounted for approximately 2.3% of the Authority's Airport Properties Revenues and 5.8% of its Airport Properties operating expenses in FY 2014.



SUMMARY OF FORECAST

Exhibit A presents forecast Airport Properties Revenues and operating expenses, the resultant forecast Airport Properties Net Revenues for FY 2015 through FY 2019, and the key assumptions that are significant to the forecasts, as prepared by Authority management. These forecasts assume that the airlines currently providing significant levels of service at the Airport will continue to provide uninterrupted service during the forecast period. The forecasts shown in Exhibit A are consistent with the sections of the table entitled "Forecasted Operating Results and Debt Service Coverage Under the 1978 Trust Agreement" (as included in the "Selected Financial Data" section of Appendix A of the Official Statement), which relate to Airport Properties Revenues and operating expenses. The information presented in Exhibit A is at a greater level of detail than that presented in the Official Statement, and separately presents information for the Airport, Hanscom Field, and Worcester Regional Airport. To the extent that line items differ between Exhibit A and the Authority's table, such variance is due to differences in the methods used to aggregate Revenues and operating expenses.

The Authority prepared these financial forecasts on the basis of information and assumptions that were assembled by the Authority. As discussed earlier, LeighFisher assisted the Authority in formulating certain assumptions and developing the forecasts of Airport Properties Net Revenues. The forecasts reflect the Authority's expected course of action during the forecast period and, in the Authority's judgment, based upon the assumptions described herein, present fairly the Authority's forecast financial results of the Airport Properties; however, there can be no assurance that such forecast results will be realized.

In addition to the payment of debt service on the Authority's Bonds issued under the terms of the 1978 Trust Agreement, the Authority is required to make deposits to the PILOT Fund and the Maintenance Reserve Fund and to pay subordinate debt service on private placement debt issued to fund the acquisition of certain parcels of land, as well as make principal and interest payments on the Authority's outstanding commercial paper notes. These amounts must be paid from the Net Revenues of the Airport Properties and other facilities. Our review does not address the amount of such payments nor assess the adequacy of the Authority's forecast Net Revenues to make such payments, as they are subordinate to the payment of debt service on the Series 2015 Bonds and the Authority's other Bonds issued under the terms of the 1978 Trust Agreement.

SENSITIVITY TEST

To test the sensitivity of the financial forecasts to hypothetical lower levels of air traffic activity, the Authority developed a sensitivity analysis projection in addition to the base forecast. The sensitivity analysis projection should not be considered a forecast of expected future results.

Exhibit B presents a summary of projected Aviation Properties Net Revenues under the hypothetical assumption that total passenger numbers for FY 2017 decrease by an amount proportionate to the decrease actually experienced at the Airport between calendar years 2001 and 2002 (i.e., 14.3%), with a subsequent rebound over the next two years – a 4.7% increase in FY 2018, followed by an 11.0% increase in FY 2019. Passenger activity at the Airport has followed this general trend of quickly rebounding following a sharp decline in each of the last three economic downturns – the economic recessions of the early 1990s and the early 2000s, and the downturn of 2008 and 2009.

All other assumptions under this sensitivity test are the same as for the base forecast, including the assumption that annual operating expenses are unchanged in the sensitivity test. It should be noted that,



in the eventuality that Airport passenger totals drop significantly, the Authority would likely undertake a program of operating cost reductions, as was the case in the aftermath of the September 11, 2001 terrorist attacks.

Under the sensitivity test, Airport Properties Net Revenues are projected to be 14.4% below the base forecast level in FY 2017, 12.0% below the base forecast level in FY 2018, and 3.9% below the base forecast level in FY 2019.

ASSUMPTIONS UNDERLYING THE FORECASTS

In our opinion, the assumptions underlying the Authority's base case financial forecasts provide a reasonable basis for the forecasts of Airport Properties Net Revenues and we believe that such forecasts appropriately reflect such assumptions. To the best of our knowledge, we believe that the Authority has taken into account all relevant factors material to the Airport Properties Net Revenues forecasts. We offer no opinion with regard to the forecasts of non-Airport Properties Net Revenues.

Any forecast is subject to uncertainties. Inevitably, some assumptions will not be realized and unanticipated events and circumstances may occur. Therefore, there are likely to be differences between the forecast and actual results, and those differences may be material. Neither LeighFisher nor any person acting on our behalf makes any warranty, expressed or implied, with respect to the information, assumptions, forecasts, opinions, or conclusions disclosed in this report. We have no responsibility to update this letter for events and circumstances occurring after the date of our review.

* * * * *

We appreciate the opportunity to serve the Authority as the Airport Properties financial consultant on these proposed financings.

Respectfully submitted,

FIGHEISHER

Massachusetts Port Authority

EXHIBIT A: BASE FORECAST

Passenger Traffic and Airline Operations

- 1. The total number of passengers at Boston-Logan International Airport (the Airport) was 29.4 million in FY 2013 and 30.9 million in FY 2014. Passengers are forecast to total 32.0 million in FY 2015 (based on actual data for the first nine months of FY 2015, and assuming a 1.5% increase for the remaining months of FY 2015 compared to the same period in the prior year). Passenger totals are forecast to increase by 1.5% in FY 2016, FY 2017, and FY 2018, and by 1.0% in FY 2019, to approximately 33.8 million passengers in FY 2019, the last year of the forecast period.
- 2. The airlines currently providing significant levels of service at the Airport (including American, Delta, JetBlue, Southwest, and United) will continue to provide significant service at the Airport. There will be no sudden, significant reduction in passenger levels at the Airport because of airline mergers or liquidations, or for other reasons.

Bond Issuance and Debt Service

- 3. The Authority's Series 2015 Bonds are assumed to be issued in the aggregate principal amount of \$201 million (yielding \$181.3 million of net proceeds available to fund project costs), at an interest rate of 4.4%, with no capitalized interest on the Series 2015-A Bonds and two years of capitalized interest on the Series 2015-B Bonds.
- 4. During the forecast period, two further bond issues under the terms of the 1978 Trust Agreement are assumed to occur to partially fund projects included in the FY 2015-FY 2019 Capital Program:
 - The Series 2016 Bonds are assumed to be issued on or about July 1, 2016, in the aggregate principal amount of \$326 million (yielding \$263.6 million of net proceeds available to fund project costs), with a 6.0% interest rate and two years of capitalized interest.
 - The Series 2018 Bonds are assumed to be issued on or about July 1, 2018, in the aggregate principal amount of \$54 million (yielding \$50.0 million of net proceeds available to fund project costs), with a 6.0% interest rate and no capitalized interest.

The Authority's debt management policy indicates that capitalized interest should be limited to two years unless the project construction period is for a longer time period.

(Page 2 of 4)

The PFC Program

- 5. The PFC Program will continue to be implemented in accordance with the Authority's nine approved PFC applications. The Authority will file its tenth PFC Application with the FAA by August 4, 2015, and expects to receive a Final Agency Decision from the FAA on this application by late in calendar year 2015.
- 6. PFC revenues generated during the forecast period will be sufficient to pay: (1) debt service as scheduled on the Authority's outstanding Series 2007 PFC Bonds and Series 2010 PFC Bonds, (2) interest on, and repay principal of, outstanding commercial paper notes issued to finance certain PFC projects, (3) certain PFC project costs on a pay-as-you-go basis, and (4) a portion of the debt service on the Series 2001 Special Facility Bonds issued to partially fund the construction of Terminal A (as provided for in the Authority's sixth PFC application approved by the FAA). The Series 2007 PFC Bonds and the Series 2010 PFC Bonds are the Authority's only bonds outstanding under the PFC Trust Agreement, and will fully mature by July 1, 2017. The Series 1999 PFC Bonds are no longer outstanding.
- 7. PFC revenues are not pledged to the payment of debt service on the Series 2015 Bonds or any other of the Authority's Bonds issued under the 1978 Trust Agreement. Such Bonds are payable from and secured by a pledge of the Authority's general revenues (which exclude PFC revenues). Conversely, general revenues of the Authority are not pledged to the payment of debt service on the Authority's bonds issued under the terms of its PFC Trust Agreement.

Grants

- 8. Based on discussions with the FAA, the Authority expects to receive AIP entitlement and discretionary funds, and Voluntary Airport Low Emissions (VALE) grants, for all three airports totaling approximately \$41.8 million during the FY 2015 to FY 2019 period. Of this amount, approximately \$8.8 million has already been awarded by the FAA.
- 9. The Authority will receive approximately \$121.1 million in Transportation Security Administration (TSA) Other Transaction Agreement (OTA) grant funding for comprehensive upgrades to the checked baggage inspection system at the Airport. This grant funding has already been awarded by the TSA in two parts, and \$93.3 million of the total will be spent during the FY 2015 to FY 2019 period.

Operating Expenses

10. Operating expenses at for the Airport Properties are projected to increase an average of approximately 5.8% per year during the forecast period – from FY 2014 (actual) through FY 2019. The operating expense forecasts account for the impact of projects included in the FY 2015-FY 2019 Capital Program that enter service prior to the end of FY 2019.

(Page 3 of 4)

Airline Revenues

- 11. The fees and charges paid by the airlines are primarily calculated on a cost recovery basis, reflecting both allocated capital and operating costs to facilities used by the airlines. The calculation of the landing fee, terminal rental rates for all four terminals, and the checked bag screening fee, will continue to reflect current rate-making practices. If the Authority's policy regarding peak-period pricing for the use of the airfield is triggered during the forecast period, it will have no impact on landing fee revenues or other revenues derived from rentals, fees, and charges paid by the airlines (i.e., the policy is "revenue neutral").
- 12. The Authority will include allocable asset amortization related to projects in the FY 2015-FY 2019 Capital Program in the airline cost basis for computing airline terminal rentals and landing fees.

Nonairline Revenues

- 13. An increase of \$3 in the maximum daily parking rate at all on-Airport facilities is assumed to be implemented on July 1, 2016 (the start of the Authority's FY 2017). The Authority's Board has already approved this increase. A further increase of \$2 in the maximum daily parking rate not yet approved by the Board is assumed to be implemented on July 1, 2018 (the start of the Authority's FY 2019). Parking rates at the Authority's off-Airport Logan Express parking lots are assumed to remain unchanged throughout the forecast period.
- 14. The rental car privilege fee will remain at 10% of annual gross rental car revenues and minimum annual guaranteed payments will remain unchanged.
- 15. Other concession revenues will generally increase in line with the increase in passenger enplanements and as a result of price increases, from the Authority's FY 2016 budgeted levels, with adjustments as applicable for concession agreements that will be expiring during the forecast period.

(Page 4 of 4)

Rental Car Center and the CFC Program

- 16. The Authority incurs operating and routine maintenance expenses associated with the day-to-day operation of the Rental Car Center. Pursuant to its lease agreements with the rental car companies associated with the development of the Rental Car Center, the Authority collects building and ground rental revenues from the rental car companies operating in the Rental Car Center. The rental car companies also pay Common Airport Transit System (CATS) fees associated with their allocated share of the Authority's terminal-area busing system. The building and ground rental revenues, CATS fees, and the Authority's operating expenses for the Rental Car Center are all Revenues and operating expenses, as the case may be, under the terms of the 1978 Trust Agreement.
- 17. CFC revenues are not pledged to the payment of debt service on the Series 2015 Bonds or any other of the Authority's Bonds issued under the 1978 Trust Agreement. Such Bonds are payable from and secured by a pledge of the Authority's general revenues (which exclude CFC revenues). Conversely, general revenues of the Authority are not pledged to the payment of debt service on the Authority's bonds issued under the terms of its CFC Trust Agreement.

EXHIBIT B: SENSITIVITY TEST

The underlying assumptions for Exhibit B (Projected Airport Properties Revenues and Operating Expenses under the sensitivity test) are identical to those underlying the forecast shown in Exhibit A; except that annual passenger numbers during FY 2017 to FY 2019 are lower under the sensitivity case. This results in lower Logan Airport annual revenues (and lower annual revenues for the Airport Properties in total) under the sensitivity test than in the base forecast case.

Exhibit A

(Page 1 of 2)

FORECAST AIRPORT PROPERTIES REVENUES AND OPERATING EXPENSES Massachusetts Port Authority

For Fiscal Years Ending June 30 (in thousands)

The forecasts presented in this exhibit were prepared using information from the sources indicated and assumptions provided by, or reviewed with and agreed to by, Authority management, as described in the accompanying text. Inevitably, some of the assumptions used to develop the forecasts will not be realized and unanticipated events and circumstances may occur. Therefore, there are likely to be differences between the forecast and actual results, and those differences may be material.

	Forecast					
	FY 2015	FY 2016	FY 2017	FY 2018	FY 2019	
AIRPORT PROPERTIES REVENUES					_	
Logan Airport total passengers	32,009	32,489	32,977	33,471	33,806	
Percentage change		1.5%	1.5%	1.5%	1.0%	
Boston-Logan International Airport						
Airline Revenues						
Scheduled Airline Landing Fees	\$ 95,113	\$ 98,807	\$ 103,137	\$ 107,034	\$ 109,684	
Non-Tenant Landing Fees	2,577	2,585	2,637	2,689	2,743	
Aircraft Parking	2,422	2,032	2,032	2,032	2,032	
Terminal Rentals and Fees (a)	136,802	145,038	153,308	166,045	187,382	
	\$ 236,914	\$ 248,462	\$ 261,113	\$277,800	\$ 301,842	
Commissions & Parking Revenues						
Terminal Concessions	\$ 35,240	\$ 31,995	\$ 32,550	\$ 32,925	\$ 32,086	
Automobile Parking	146,490	144,675	161,718	164,069	175,904	
Rental Car	29,335	27,940	28,080	28,220	28,361	
Ground Transportation	8,289	8,409	8,687	8,973	9,269	
Other Commissions	6,958	6,911	6,436	6,444	6,460	
Carior Commissions	\$226,311	\$219,930	\$237,470	\$ 240,631	\$ 252,080	
Oll - B						
Other Revenues	A 00 004	A 07.005	Ф 07.000	# 00.500	6 00 447	
Building and Ground Rentals	\$ 26,061	\$ 27,305	\$ 27,866	\$ 28,566	\$ 29,117	
Hanger and Cargo Rentals	20,291	19,126	19,503	19,894	20,296	
Shuttle Buses	14,901	16,564	17,022	17,492	17,976	
Sale of Utilities	17,882	21,853	23,601	25,961	26,481	
Miscellaneous (b)	8,921	7,726	7,315	7,390	7,467	
	\$ 88,056	\$ 92,574	\$ 95,306	\$ 99,304	\$101,338	
Subtotal - Logan Airport	\$ 551,282	\$ 560,965	\$593,890	\$617,736	\$655,260	
Percentage change		1.8%	5.9%	4.0%	6.1%	
Other airports in the Authority's system						
Hanscom Field	\$ 12,245	\$ 12,159	\$ 12,464	\$ 12,728	\$ 12,992	
Worcester Regional Airport	τ 12,243 1,583	1,580	۶ 12,404 1,694	1,724	٦ 12,992 1,754	
Subtotal - other airports	\$ 13,828			•		
Subtotal - other airports	φ 13,028	\$ 13,739	\$ 14,158	\$ 14,452	\$ 14,746	
Total Revenues	\$ 565,111	\$ 574,705	\$608,048	\$ 632,188	\$670,006	
Percentage change		1.7%	5.8%	4.0%	6.0%	

Exhibit A

(Page 2 of 2)

FORECAST AIRPORT PROPERTIES REVENUES AND OPERATING EXPENSES

Massachusetts Port Authority

For Fiscal Years Ending June 30 (in thousands)

			Forecast		
AIRPORT PROPERTIES OPERATING EXPENSES	FY 2015	FY 2016	FY 2017	FY 2018	FY 2019
AIN ON THOSENTED OF ENAMING EXPENSES					
Boston-Logan International Airport					
Landing Field	\$ 68,757	\$ 70,910	\$ 73,916	\$ 76,902	\$ 79,622
Terminal Building	125,478	129,582	137,851	147,620	155,782
Hangar and Cargo buildings	7,273	7,525	7,926	8,387	8,644
Automobile Parking	59,057	60,920	65,803	72,866	79,737
Non-aeronautical (c)	43,819	44,743	46,349	47,502	50,393
Rental Car Center	6,838	7,061	7,391	7,743	8,002
Regional Carrier and General Aviation Facilities	1,350	1,394	1,458	1,527	1,578
Subtotal - Logan Airport	\$312,573	\$ 322,136	\$ 340,695	\$ 362,546	\$ 383,758
Percentage change		3.1%	5.8%	6.4%	5.9%
Other airports in the Authority's system					
Hanscom Field	\$ 9,960	\$ 12,790	\$ 13,364	\$ 13,956	\$ 14,572
Worcester Regional Airport	8,555	8,929	9,345	9,776	10,202
Subtotal - other airports	\$ 18,515	\$ 21,719	\$ 22,709	\$ 23,733	\$ 24,775
Total Operating Expenses	\$331,088	\$ 343,855	\$ 363,404	\$ 386,279	\$408,532
Percentage change		3.9%	5.7%	6.3%	5.8%
AIRPORT PROPERTIES NET REVENUES	\$234,023	\$230,850	\$ 244,644	\$245,909	\$ 261,473
Percentage change		-1.4%	6.0%	0.5%	6.3%

⁽a) Includes charges for baggage screening facilities.

Note: Amounts in the columns may not add to the subtotals and totals because of rounding.

Source: Massachusetts Port Authority.

⁽b) Includes subtenant fees, conduit fees, operating grants and other items.

⁽c) Including expenses for other unrecoverable items, such as budget contingency.

Exhibit B

(Page 1 of 2)

PROJECTED AIRPORT PROPERTIES REVENUES AND OPERATING EXPENSES SENSITIVITY SCENARIO

Massachusetts Port Authority

For Fiscal Years Ending June 30 (in thousands)

The projections presented in this exhibit were prepared using information from the sources indicated and assumptions provided by, or reviewed with and agreed to by, Authority management, as described in the accompanying text. Inevitably, some of the assumptions used to develop the projections will not be realized and unanticipated events and circumstances may occur. Therefore, there are likely to be differences between the projected and actual results, and those differences may be material.

	Projection					
AIDDORT BRODERTIES DEVENUES	FY 2015	FY 2016	FY 2017	FY 2018	FY 2019	
AIRPORT PROPERTIES REVENUES						
Logan Airport total passengers Percentage change	32,009	32,489 1.5%	27,843 -14.3%	29,152 <i>4.</i> 7%	32,359 11.0%	
Boston-Logan International Airport Airline Revenues						
Scheduled Airline Landing Fees	\$ 95,113	\$ 98,807	\$103,137	\$ 107,034	\$ 109,684	
Non-Tenant Landing Fees	2,577	2,585	2,637	2,689	2,743	
Aircraft Parking	2,422	2,032	2,032	2,032	2,032	
Terminal Rentals and Fees (a)	136,802	145,038	153,308	166,045	187,382	
	\$236,914	\$ 248,462	\$ 261,113	\$277,800	\$ 301,842	
Commissions & Parking Revenues						
Terminal Concessions	\$ 35,240	\$ 31,995	\$ 27,569	\$ 28,770	\$ 30,916	
Automobile Parking	146,490	144,675	138,209	144,288	168,838	
Rental Car	29,335	27,940	23,730	24,608	27,192	
Ground Transportation	8,289	8,409	7,378	7,857	8,902	
Other Commissions	6,958	6,911	5,360	5,539	6,106	
	\$226,311	\$219,930	\$ 202,246	\$211,061	\$ 241,955	
Other Revenues	¢ 06.064	¢ 07.20E	¢ 07.066	Ф 00 FCC	¢ 20.447	
Building and Ground Rentals Hanger and Cargo Rentals	\$ 26,061 20,291	\$ 27,305 19,126	\$ 27,866 19,503	\$ 28,566 19,894	\$ 29,117 20,296	
Shuttle Buses	14,901	16,564	17,022	17,492	20,296 17,976	
Sale of Utilities	17,882	21,853	23,601	25,961	26,481	
Miscellaneous (b)	8,921	7,726	7,315	7,390	7,467	
Wildelian Godd (b)	\$ 88,056	\$ 92,574	\$ 95,306	\$ 99,304	\$101,338	
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Subtotal - Logan Airport	\$ 551,282	\$ 560,965	\$558,666	\$ 588,166	\$645,134	
Percentage change		1.8%	-0.4%	5.3%	9.7%	
Other airports in the Authority's system	f 40.045	Ф 40.4F0	¢ 40.404	e 40.700	# 40.000	
Hanscom Field	\$ 12,245	\$ 12,159	\$ 12,464	\$ 12,728	\$ 12,992	
Worcester Regional Airport Subtotal - other airports	1,583 \$ 13,828	1,580 \$ 13,739	1,694 \$ 14,158	1,724 \$ 14.452	1,754 \$ 14.746	
Subtotal - other airports	φ 13,028	φ 13,739	φ 14,138	φ 14,432	\$ 14,746	
Total Revenues	\$ 565,111	\$ 574,705	\$ 572,824	\$ 602,618	\$ 659.880	
Percentage change	, ,	1.7%	-0.3%	5.2%	9.5%	
J J.		, -		, .		

Exhibit B

(Page 2 of 2)

PROJECTED AIRPORT PROPERTIES REVENUES AND OPERATING EXPENSES **SENSITIVITY SCENARIO**

Massachusetts Port Authority

For Fiscal Years Ending June 30

(in thousands)

	Projection				
	FY 2015	FY 2016	FY 2017	FY 2018	FY 2019
AIRPORT PROPERTIES OPERATING EXPENSES					
Boston-Logan International Airport					
Landing Field	\$ 68,757	\$ 70,910	\$ 73,916	\$ 76,902	\$ 79,622
Terminal Building	125,478	129,582	137,851	147,620	155,782
Hangar and Cargo buildings	7,273	7,525	7,926	8,387	8,644
Automobile Parking	59,057	60,920	65,803	72,866	79,737
Non-aeronautical (c)	43,819	44,743	46,349	47,502	50,393
Rental Car Center	6,838	7,061	7,391	7,743	8,002
Regional Carrier and General Aviation Facilities	1,350	1,394	1,458	1,527	1,578
Subtotal - Logan Airport	\$312,573	\$322,136	\$ 340,695	\$ 362,546	\$ 383,758
Percentage change		3.1%	5.8%	6.4%	5.9%
Other airports in the Authority's system					
Hanscom Field	\$ 9,960	\$ 12,790	\$ 13,364	\$ 13,956	\$ 14,572
Worcester Regional Airport	8,555	8,929	9,345	9,776	10,202
Subtotal - other airports	\$ 18,515	\$ 21,719	\$ 22,709	\$ 23,733	\$ 24,775
Total Operating Expenses	\$331,088	\$ 343,855	\$ 363,404	\$ 386,279	\$408,532
Percentage change		3.9%	5.7%	6.3%	5.8%
AIRPORT PROPERTIES NET REVENUES	\$234,023	\$230,850	\$209,420	\$216,339	\$ 251,348
Percentage change		-1.4%	-9.3%	3.3%	16.2%

⁽a) Includes charges for baggage screening facilities.

Note: Amounts in the columns may not add to the subtotals and totals because of rounding.

Source: Massachusetts Port Authority.

⁽b) Includes subtenant fees, conduit fees, operating grants and other items.

⁽c) Including expenses for other unrecoverable items, such as budget contingency.

APPENDIX E

SUMMARY OF CERTAIN PROVISIONS OF THE 1978 TRUST AGREEMENT

The following summary does not purport to be complete and is subject to all of the terms and conditions of the 1978 Trust Agreement, to which reference is hereby made, the form of which is available for examination at the offices of the Authority and the Trustee. The summary makes use of terms defined in the 1978 Trust Agreement, certain of which are also defined below. The summary includes the effect of the issuance of the 2015-C Bonds on June 30, 2015, the redemption of the 2005-C Bonds on July 1, 2015 and the effectiveness of the amendments to the 1978 Trust Agreement on July 18, 2015 as set forth in the Twentieth Supplemental Agreement.

Pledge Effected by the 1978 Trust Agreement (Sections 701, 601, 507 and 507A)

Payment of the principal, interest and redemption premium on the Bonds is secured by a pledge of the Revenues, in the manner and to the extent set forth in the 1978 Trust Agreement. See "SECURITY FOR THE 2015 BONDS -- General." The Enabling Act provides that the Authority is authorized in the 1978 Trust Agreement to pledge its tolls and other revenues, over and above the amounts necessary to pay current expenses and to provide reserves therefor, to the payment of the interest on and principal of its Bonds. The Enabling Act further provides that such pledge is valid and binding when made, and that the revenues so pledged shall immediately be subject to the lien of such pledge without physical delivery thereof or further act, and such lien shall be valid and binding as against all parties having claims of any kind irrespective of whether such parties have notice thereof. The Bonds issued under the 1978 Trust Agreement are not a debt or obligation of the Commonwealth or of any political subdivision thereof but are payable solely from the Revenues pledged for their payment and certain Funds and Accounts created by the 1978 Trust Agreement.

The 1978 Trust Agreement provides that the moneys in all Funds and Accounts which are held by the Authority shall be subject to a lien and charge in favor of the Trustee and the holders of the Bonds to the same extent as provided with respect to moneys deposited with the Trustee. All moneys deposited with the Trustee as required by the 1978 Trust Agreement shall be held by the Trustee in trust and applied as provided in the 1978 Trust Agreement and, pending such application, shall be subject to a lien and charge in favor of the Trustee and the holders of the outstanding Bonds on the terms and conditions set forth therein until disbursed.

The 1978 Trust Agreement provides that amounts, if any, deposited in a separate account of the Operating Fund created under the 1978 Trust Agreement which represent payments in respect of pension obligations of the Authority will, upon the occurrence of an event of default under the 1978 Trust Agreement, first be applied to present and accrued pension benefits of the Authority's employees. The 1978 Trust Agreement further provides for the payment of the Authority's obligations in respect of post-retirement health benefits to a separate trustee or into a separate account of the Operating Fund. Amounts, if any, deposited in such separate account will, upon the occurrence of an event of default under the 1978 Trust Agreement, first be applied to present and accrued post-retirement health benefits of the Authority's employees.

Establishment of Funds and Accounts (Sections 503, 209 and 401)

The 1978 Trust Agreement creates a Revenue Fund, an Operating Fund (which includes a separate Self-Insurance Account, a separate pension account and a separate post-retirement health benefits account), an Interest and Sinking Fund (which includes three separate accounts, namely, a Bond Service Account, a Redemption Account and a Reserve Account, and may also include one or more Term Bond Investment Accounts established by resolution of the Authority for a subsequent Series of Bonds), a Maintenance Reserve Fund, a Payment in Lieu of Taxes Fund, a Capital Budget Fund and an Improvement and Extension Fund (which includes separate Rebate Funds pertaining to each Series of Bonds, separate principal, interest and escrow accounts relating to a subordinated debt financing of the Authority, payment and rebate accounts relating to the tax-exempt commercial paper program of the Authority, and such other accounts as the Authority may from time to time establish). The 1978 Trust Agreement also provides for a Construction Fund and for separate Project Accounts within such Fund.

The Authority holds and administers in trust the Revenue Fund, the Operating Fund (except the Self-Insurance Account, the pension account and the post-retirement health benefits account) and the Improvement and Extension Fund. All of the other Funds and Accounts are held and administered by the Trustee.

Application of Revenues

Under the 1978 Trust Agreement all Revenues are to be deposited, daily as far as practicable, into the Revenue Fund held by the Authority.

Operating Fund (Section 506) -- As often as practicable the Authority shall transfer from the Revenue Fund to the Operating Fund all Revenues on deposit therein. The Authority will pay when due all Operating Expenses from the Operating Fund.

On the seventh business day of each month the Authority is required to make transfers from the moneys on deposit in the Operating Fund as of the seventh business day of such month as follows:

- (i) to the trustee of the Authority's pension plan, one-twelfth (1/12) of the Authority's actuarially determined annual pension expense;
- (ii) to a separate trustee or to a special separate post-retirement health benefit account, one-twelfth (1/12) of the Authority's actuarially determined annual post-retirement health expense; and
- (iii) to the Trustee for deposit in the Self-Insurance Account, amounts substantially as recommended by the Authority's Risk Management Consultant.

After (x) paying Operating Expenses, (y) making any required transfers to the trustee of the Authority's pension fund, to the trustee for the Authority's post-retirement health benefit account and to the Trustee for deposit in the Self-Insurance Account, and (z) retaining in the Operating Fund such amount as the Authority may deem necessary (provided that the balance retained therein does not exceed 15% of annual Operating Expenses established in the Annual

Budget of the Authority), the Authority is required on the seventh business day of each month to transfer the balance in the Operating Fund to the Trustee for deposit in the following Funds and Accounts in the following order (no transfer to be made into any Fund or Account until there shall have been deposited in the next preceding Fund or Account the full amount required):

- (1) <u>Interest and Sinking Fund (Sections 510 and 522)</u> -- Amounts in this Fund will be applied to the payment of the Bonds and any additional Bonds which may be issued in the future. Such Bonds which may be issued in the future are hereinafter referred to as "Additional Bonds".
 - (i) Bond Service Account: There shall be deposited in this Account the amount needed to make the sum therein, together with any amounts transferred from the Construction Fund equal to (a) interest accrued and to accrue until the first day of the next month on all outstanding 2007 Bonds, 2008 Bonds, 2010 Bonds, 2012 Bonds, 2014 Bonds, 2015-C Bonds, 2015 Bonds and any Additional Bonds, plus (b) principal accrued and to accrue until the first day of the next month on all serial 2007 Bonds, serial 2008 Bonds, serial 2010 Bonds, serial 2012 Bonds, serial 2014 Bonds, serial 2015-C Bonds, serial 2015 Bonds and any serial Additional Bonds which will become payable within the next year.
 - (ii) Redemption Account: There shall be deposited in this Account the amount needed to make the amount deposited therein equal to the Amortization Requirements, if any, for such fiscal year on all outstanding term 2007 Bonds, term 2008 Bonds, term 2010 Bonds, term 2012 Bonds, term 2014 Bonds, term 2015-C Bonds, term 2015 Bonds and any term Additional Bonds accrued and to accrue until the first day of the next month, plus an amount equal to any premium which would be payable on any date commencing with July 2 in such fiscal year and ending with July 1 in the following fiscal year, both inclusive, accrued or to accrue until the first day of the next month. If the balance remaining after making the deposit to the Bond Service Account shall not be sufficient to make the deposits into the Redemption Account and the Term Bond Investment Account, described below, the amount to be deposited in each Account shall be pro-rated in accordance with the respective amounts required.
 - (iii) Term Bond Investment Account: The 1978 Trust Agreement allows the Authority to provide for the payment of the principal of Additional Bonds issued as term Bonds through establishment of a Term Bond Investment Account. If a Term Bond Investment Account is established, monthly amounts would be deposited therein and invested in Government Obligations in accordance with the resolution authorizing such term Additional Bonds. No Term Bond Investment Account was established for any Series of outstanding Bonds, and none will be established for the 2015 Bonds.
 - (iv) Reserve Account: Upon issuance of any Bonds there shall be deposited in the Reserve Account an amount at least equal to one-half of the difference between (a) the increase in the maximum annual Principal and Interest Requirements on such Bonds and all then-outstanding Bonds, and (b) the amount, if any, in the Reserve Account in excess of the maximum annual Principal and Interest Requirements on all then-outstanding Bonds. In addition, there shall be deposited in this Account each month a sum equal to one-sixtieth of the difference between (a) the maximum annual Principal

and Interest Requirements for any fiscal year thereafter on account of all Bonds then outstanding, less (b) the sum of (x) the amount so deposited into the Reserve Account upon the issuance of such Bonds, and (y) any amount in the Reserve Account in excess of the maximum annual Principal and Interest Requirements on all then-outstanding Bonds prior to the issuance of such Bonds. If the amounts held on deposit in the Reserve Account exceed the maximum Principal and Interest Requirements for any fiscal year on account of all Bonds then outstanding, the excess shall be transferred to the Improvement and Extension Fund.

In lieu of making deposits to the Reserve Account as and at the times required by the 1978 Trust Agreement, the Authority, at its option, may satisfy all or any portion of such deposit requirement by providing to the Trustee (a) an irrevocable, unconditional letter of credit issued by a bank, savings and loan association or other provider of such letters of credit whose long-term obligations are rated in one of the two highest rating categories by Moody's Investors Service and Standard & Poor's, or (b) an insurance policy providing substantially equivalent liquidity as an irrevocable, unconditional letter of credit and issued by a municipal bond or other insurance company that is of sufficient credit quality to entitle debt backed by its insurance policy or surety bond to be rated in one of the two highest rating categories by Moody's Investors Service and Standard & Poor's.

- (2) <u>Maintenance Reserve Fund (Section 510)</u> -- There shall be deposited each month in this Fund an amount equal to one-twelfth of 1% of the Replacement Cost of all Projects of the Authority as determined by the Consulting Engineer for the then current fiscal year, or such greater amount as may have been specified in the Annual Budget for such fiscal year; provided that the amount on deposit in the Maintenance Reserve Fund and not theretofore obligated shall not exceed 5% of the Replacement Cost of all Projects of the Authority. Such Replacement Cost as determined by the Consulting Engineers as of January 1, 2015 was \$5,248,453,000. The Authority's fiscal year 2015 annual budget includes \$68,437,000 to be deposited into this Fund.
- (3) Payment in Lieu of Taxes Fund (Section 510) -- There shall be deposited in this Fund the amount required to make the balance in this Fund equal to the cumulative amount which should then be on deposit therein assuming the amounts payable in lieu of taxes on the next following payment dates were paid in equal monthly installments from the preceding payment dates under any agreements entered into pursuant to authorizing legislation.
- (4) <u>Capital Budget Fund (Section 510)</u> -- There shall be deposited in this Fund amounts necessary to provide for the Capital Budget in each fiscal year as determined by the Authority, subject to increase or reduction by resolution of the Authority. Amounts may be withdrawn from the Capital Budget Fund for expenditure in accordance with the Capital Budget or as otherwise determined by the Authority.
- (5) <u>Improvement and Extension Fund (Section 510)</u> -- Any balance of moneys in the Operating Fund after making required transfers to the Trustee for the above Funds and Accounts will be transferred to the Improvement and Extension Fund. Amounts may be withdrawn from the Improvement and Extension Fund for any lawful purpose of the Authority.

Application of Funds and Accounts

Operating Fund (Section 506) -- Operating Expenses, as determined in the Authority's Annual Budget, are paid from this Fund. Amounts deposited in the Self-Insurance Account in the Operating Fund are to be used to pay uninsured or self-insured losses.

<u>Interest and Sinking Fund (Sections 511, 512, 514 and 519)</u> -- Moneys in the Bond Service Account shall be applied to the payment of interest on the Bonds and any Additional Bonds and the principal amount of any Bonds and any Additional Bonds as the same become due.

Moneys in the Redemption Account shall be applied to the purchase (at not more than the current redemption price unless another price is set by the Authority) or redemption of the Bonds and any Additional Bonds. Unless previously applied to purchase Bonds and any Additional Bonds, the Trustee shall apply moneys in such Account to meeting Amortization Requirements of the Bonds or any Additional Bonds on each July 1 when due. Moneys deposited in the Redemption Account shall be applied, first, to the purchase or redemption of term Bonds and any term Additional Bonds of each Series outstanding to the extent of their respective Amortization Requirements for the then current fiscal year plus the applicable premium, if any, and thereafter, at the option of the Authority, to the purchase or redemption of Bonds and any Additional Bonds.

Moneys in the Term Bond Investment Account, if such an account shall be created, shall be applied in the retirement of any applicable Series of term Additional Bonds required to be redeemed by either redemption or, at the direction of the Authority, by purchase at a price not exceeding the next applicable redemption price, or to the purchase of Government Obligations to be applied on the maturity date to payment of such Additional Bonds.

Moneys in the Reserve Account shall be used by the Trustee to pay interest, principal of any serial Bonds, and Amortization Requirements with respect to term Bonds, or to make deposits to a Term Bond Investment Account, whenever and to the extent that the Bond Service Account and the Redemption Account or the Term Bond Investment Account are insufficient for such purposes.

If at any time after so applying the Reserve Account, moneys held in the Bond Service Account or the Redemption Account of the Interest and Sinking Fund shall be insufficient for the payment of the principal or premium of, or interest or Amortization Requirements on the Bonds and any Additional Bonds as the same become due, such insufficiency shall be made up by transfers from the Improvement and Extension Fund, the Capital Budget Fund, the Payment in Lieu of Taxes Fund and the Maintenance Reserve Fund, in that order.

Maintenance Reserve Fund (Section 516) -- Moneys in this Fund are to be applied to pay for (i) renewals, reconstruction and replacement of any facilities of the Authority, (ii) acquiring and installing or replacing equipment, (iii) unusual or extraordinary maintenance or repairs, (iv) repairs or replacements for which the proceeds of insurance are inadequate, and (v) transfers to the Bond Service Account and Redemption Account when these Accounts are insufficient to pay the principal or premium, or interest or Amortization Requirements on the Bonds and any

Additional Bonds, or for making required deposits to any Term Bond Investment Account, as they become due.

<u>Payment in Lieu of Taxes Fund (Section 517)</u> -- Moneys in this Fund will be used to make payments in lieu of taxes pursuant to agreements entered into by the Authority pursuant to statute or, as provided in the 1978 Trust Agreement, payment of a shortfall in debt service on the Bonds.

<u>Capital Budget Fund (Section 517A)</u> -- Moneys in this Fund are to be disbursed in accordance with any Capital Budget adopted by the Authority. Amounts in this Fund may be withdrawn to the extent not previously obligated. The Authority may transfer amounts from the Improvement and Extension Fund to this Fund as it sees fit.

Improvement and Extension Fund (Section 518) -- Moneys in this Fund may be used by the Authority for any lawful purpose, including, without limitation, transfer to any other Fund or Account. The resolutions of the Authority pertaining to each outstanding Series of Bonds created within the Improvement and Extension Fund as segregated accounts separate Rebate Funds for such Bonds, each to be held for the sole benefit of the United States of America. Excess Earnings (as defined in such resolutions) will be deposited in Rebate Funds and used exclusively to make rebate payments to the United States of America. To the extent of any deficiency in any Rebate Fund, such payments will be made out of the Operating Fund and other available moneys of the Authority.

If then permitted by law, moneys held for the credit of the Improvement and Extension Fund may be pledged to the payment of principal of and interest on notes or other obligations issued for any purpose for which moneys in such Fund may be disbursed. The Improvement and Extension Fund or portions thereof have been and may be pledged to secure certain obligations of the Authority. See "APPENDIX A— Other Obligations—Subordinated Revenue Bonds" and "— Commercial Paper."

Covenants as to Fees and Charges (Section 501)

In the 1978 Trust Agreement the Authority covenants:

(i) To charge such tolls, rates, fees, rentals and other charges as from time to time may be necessary so that the Revenues in each fiscal year will at least equal in such fiscal year the greater of (a) an amount sufficient to provide funds for Operating Expenses for such fiscal year plus an amount equal to 125% of Principal and Interest Requirements on all outstanding Bonds during such fiscal year (excluding capitalized interest payable from the Construction Fund), or (b) an amount sufficient to provide funds for Operating Expenses for such fiscal year, to make required deposits to the Maintenance Reserve Fund, the Payment in Lieu of Taxes Fund and the Capital Budget Fund, and to provide amounts required to be deposited to the Improvement and Extension Fund pursuant to any supplement to the 1978 Trust Agreement which may be entered into by the Trustee and the Authority providing for the issuance of separately secured obligations.

If in any year the Revenues shall be less than the amounts required by the preceding paragraphs, the Authority will cause recognized experts, other than the Consulting Engineers, in the field of estimating revenues of a facility or element of a facility to which the recommendations relate, to recommend revised schedules of tolls, rates, fees, rentals and other charges; and if the Authority shall comply with all such recommendations, the failure of Revenues to equal the amounts specified in the preceding paragraph will not of itself constitute an event of default under the 1978 Trust Agreement.

- (ii) Before placing in operation any Additional Facilities financed by a Series of Bonds, to place in effect with respect thereto tolls, rates, fees, rentals and other charges in substantial conformity with those anticipated by the recognized experts in estimating the Revenues of such Additional Facilities in connection with the issuance of such Series of Bonds.
- (iii) Before placing in operation any Additional Improvements financed by a Series of Bonds for the use of which a charge would ordinarily be made, to place in effect with respect thereto tolls, rates, fees, rentals and other charges in substantial conformity with those anticipated by the recognized experts in estimating the Revenues of the Project to which such Additional Improvements relate in connection with the issuance of such Series of Bonds.
- (iv) To place in effect on the date or dates specified any increase in rates and charges that have been adopted by the Authority and taken into account by the recognized experts who estimated Revenues in connection with the issuance of an additional Series of Bonds, provided that such increase need not be imposed in the event that the Secretary-Treasurer certifies in writing, confirmed by certificates of such recognized experts, that such additional Series of Bonds could then be issued under the provision of the 1978 Trust Agreement that permitted the issuance of such additional Series of Bonds.

Issuance of Additional Bonds (Sections 209 and 210)

The 1978 Trust Agreement permits the issuance of Additional Bonds for the purpose of financing costs incident to any Additional Improvements or Additional Facilities and of refunding outstanding Bonds and subordinated obligations of the Authority. Such Additional Bonds may be issued only if, at the time of such issuance, there is no existing default under the 1978 Trust Agreement and certain projected or historical earnings tests are met. Such tests are to be based on information with respect to the Additional Improvements or Additional Facilities provided by recognized experts (as to estimated future Revenues), by the Consulting Engineers (as to cost and estimates of funds available to pay such cost, completion date, date on which such Additional Facilities or Additional Improvements will be placed in operation, and estimated future Operating Expenses), and by the Authority (as to historical financial information, estimated investment earnings and the Principal and Interest Requirements on the Additional Bonds). Certificates must be filed with the Trustee showing compliance with the following requirements:

- A. If the Additional Bonds are issued to finance all or the first portion of the estimated cost of Additional Improvements, (i) Net Revenues in any twelve consecutive months of the last 18 months were at least 125% of the Principal and Interest Requirements on all Bonds outstanding during such twelve months, and (ii) the estimated average annual Net Revenues for the three fiscal years commencing immediately following the latest estimated date of placing in operation any Additional Improvements or Additional Facilities for which any Series of Bonds has been or is then being issued will be at least 130% of the estimated maximum Principal and Interest Requirements in any year thereafter on account of all Bonds to be outstanding, including the estimated amount of Bonds to be issued in the future to complete such Additional Improvements or Additional Facilities.
- B. If the Bonds issued under Paragraph A were issued to finance only the first portion of the estimated cost of Additional Improvements, subsequent Bonds may be issued to finance the cost of such Additional Improvements upon compliance with a test comparable to that set forth in clause (ii) of Paragraph A modified by changing the percentage contained therein to 125%.
- C. If the Bonds are issued to finance all or the first portion of the estimated cost of Additional Facilities, the applicable test is comparable to that set forth in Paragraph A modified by changing the percentage in clause (ii) of Paragraph A to 140%.
- D. If the Bonds issued under Paragraph C are issued to finance only the first portion of the estimated cost of Additional Facilities, subsequent Bonds may be issued to finance the cost of such Additional Facilities upon compliance with a test comparable to that set forth in clause (ii) of Paragraph A modified by changing the percentage contained therein to 135%.
- E. Notwithstanding Paragraphs A, B, C and D, if the Additional Bonds are being issued to finance all or any portion of the estimated cost of Additional Improvements or Additional Facilities, they may be issued if Net Revenues in any twelve consecutive months of the last 18 months were at least 125% of the maximum annual Principal and Interest Requirements on all outstanding Bonds, the Bonds then being issued and any subsequent Additional Bonds estimated to be issued to complete Additional Improvements or Additional Facilities for which a Series of Additional Bonds has been issued under Paragraph A or C. In addition to the statement by the Consulting Engineers described above, the Authority is required to file the certificate of the Consulting Engineers described below under "Restrictions on Certain Additional Facilities".
- F. If Bonds are issued under Paragraph A or C to finance all of the then estimated cost of Additional Improvements or Additional Facilities, an additional Series of Bonds to complete such Additional Improvements or Additional Facilities may be issued without compliance with any of the tests in the paragraphs above.

With respect to any Additional Bonds which bear interest at a variable rate or a rate which is otherwise not subject to definite determination over the period of any calculation

required by the 1978 Trust Agreement, all provisions of the 1978 Trust Agreement which require use of a definite interest rate for purposes of any calculation shall be applied as if the interest rate for such Additional Bonds were the rate estimated by a nationally known investment banking firm, selected by the Authority (which firm may be an owner or underwriter of any Bonds), to be the rate at which such Additional Bonds would bear interest if they were issued at par and bore a fixed rate for the entirety of their term. The provisions of the 1978 Trust Agreement requiring any calculation shall be applied to Additional Bonds which accrue and compound interest for all or any portion of the term thereof as if interest accrued during such period in the manner provided in such Additional Bonds. Any Additional Bonds may accrue interest at such rate or rates as are determined in accordance with the resolution of the Authority providing for their issuance and such interest may be payable on such date or dates, which may be other than January 1 and July 1, as are set forth in such resolution.

Issuance of Refunding Bonds (Sections 209 and 212)

Under the 1978 Trust Agreement the Authority may issue Additional Bonds for the purpose of refunding all or any part of the outstanding Bonds of any one or more issues or series then outstanding and paying issuance costs.

Such refunding Bonds may be issued only if one of the following conditions is met: (i) the Principal and Interest Requirements on account of all Bonds for each fiscal year until the year following the fiscal year in which any non-refunded Bonds mature are not increased by reason of the refunding, (ii) the Net Revenues of the Authority during any twelve consecutive months out of the most recent 18-month period were not less than 125% of the maximum Principal and Interest Requirements for any fiscal year thereafter (giving effect to the refunding and any Bonds to be issued for the completion of Additional Improvements and Additional Facilities); or (iii) (a) the Net Revenues during any twelve consecutive months out of the most recent 18-month period were at least 125% of the Principal and Interest Requirements on all outstanding Bonds during such twelve months, and (b) the estimated average annual Net Revenues for the three fiscal years commencing immediately following the latest estimated date of placing in operation any Additional Improvements or Additional Facilities for which any series of Bonds has been issued will be at least 135% of the estimated maximum Principal and Interest Requirements for any year (giving effect to the refunding and any Bonds to be issued for the completion of Additional Improvements and Additional Facilities).

Issuance of Other Obligations (Section 216)

The 1978 Trust Agreement permits the Authority to issue obligations for any lawful purpose which are not secured by any pledge on, nor payable from, the Revenues or any of the Funds and Accounts created by the 1978 Trust Agreement.

The 1978 Trust Agreement permits the Authority, if permitted by law, to issue notes or other obligations for any purposes (as described above) for which Additional Bonds may be issued and to pledge moneys held for the credit of the Improvement and Extension Fund to the payment of principal and interest of such notes or other obligations which have been issued for any purpose for which the moneys held for the credit of such Fund may be disbursed. The Authority may also issue notes payable solely from the proceeds of the issuance of Additional

Bonds or other permitted borrowing. The 1978 Trust Agreement also provides that the Authority may issue obligations the principal of and redemption premium, if any, and interest on which is payable from and secured by a pledge of and lien on the Revenues junior and subordinate to those created by the 1978 Trust Agreement for the benefit of the Bondholders, provided that such obligations shall be payable solely from moneys in the Improvement and Extension Fund, from additional issues of such subordinate obligations, or, if such obligations were issued for purposes for which Additional Bonds could have been issued, from the proceeds of Additional Bonds thereafter issued.

Construction Fund (Article IV)

Under the 1978 Trust Agreement, the proceeds of all Additional Bonds or Notes issued to provide funds to pay the cost of Additional Improvements or Additional Facilities are to be deposited in separate Project Accounts within the Construction Fund. The Construction Fund is held by the Trustee. There may also be deposited in the appropriate Project Accounts other moneys received from any other source for the construction of Additional Improvements or Additional Facilities. Except for payments to cover interest on any Additional Bonds through the second interest payment date after completion of construction of the last of the Additional Improvements or Additional Facilities financed therewith (to the extent such interest payments are called for by the resolution of the Authority authorizing the issuance of such Additional Bonds), payments may be made only upon filing with the Trustee a requisition properly executed on behalf of the Authority and accompanied by an approving certificate of the Consulting Engineers and a certificate of the Authority to the effect that the obligations which are the subject of the requisition are due and payable. Any balance remaining in the appropriate Project Account in the Construction Fund upon completion of the Additional Improvements or Additional Facilities funded with a particular Series of Bonds not reserved by the Authority with the approval of the Consulting Engineers for the payment of any remaining cost thereof shall be transferred to the Improvement and Extension Fund.

Completion of Projects (Section 702)

The Authority covenants that forthwith after the issuance of any Series of Additional Bonds to finance Additional Improvements or Additional Facilities it will proceed with the construction or acquisition of such Additional Improvements or Additional Facilities. Such construction will be in accordance with plans approved by the Consulting Engineers. If the Authority determines not to construct or acquire, or to reduce the scope of, any such Additional Improvements or Additional Facilities, it may construct other improvements or facilities or broaden the scope of such improvements or facilities if the recognized experts certify that there will be no overall cost increase and that the changes will not impair the operating efficiency of the Project or materially adversely affect estimated Net Revenues. However, in the case of the improvements or facilities financed with Bonds issued pursuant to Paragraph E under "Issuance of Additional Bonds" above, construction or acquisition may be suspended or abandoned without compliance with the preceding sentence and any unexpended Bond proceeds will be transferred to another Project Account in the Construction Fund or to the Redemption Account. In any event, if the Authority determines that changes in financial, economic or other conditions since the issuance of any Additional Bonds make it imprudent to continue construction or acquisition of the Additional Improvements or Additional Facilities financed therewith, then construction or

acquisition may be suspended or abandoned and any unexpended Bond proceeds may be transferred to another Project Account in the Construction Fund or the Redemption Account, as the Authority may determine.

No Liens (Section 704)

The Authority covenants not to create or suffer to be created any lien upon any Project or any of the Revenues except the lien created by the 1978 Trust Agreement and the liens described under "Issuance of Other Obligations" above. The Authority is required to pay or cause to be discharged all claims and demands which if unpaid might become such a lien, but is not required to provide for the payment and discharge of liens which are being contested in good faith and by appropriate legal proceedings.

Accountants, Consultants and Engineers (Section 706)

The 1978 Trust Agreement provides that the Authority (i) will, for the purpose of performing and carrying out the duties imposed on the Accountants by the 1978 Trust Agreement, employ a firm of independent certified public accountants of recognized ability and standing nationwide, (ii) will, for the purpose of performing and carrying out the duties imposed upon the Consulting Engineers, the Airport Consultants and the Traffic Engineers by the 1978 Trust Agreement, employ independent engineers or engineering firms having a nationwide and favorable repute for skill and experience in such work, and (iii) for the purpose of determining its annual pension expense and its annual post-retirement health benefit expense, may employ as Pension Consultants an independent actuarial consulting organization having a nationwide and favorable repute for skill and experience in such work. Other experts must be independent experts or firms of recognized ability and standing in their fields. The Consulting Engineers must prepare an annual report regarding maintenance of each Project and recommendations, including estimated costs, for maintenance and repair. Such reports are furnished to the Trustee and each Bondholder of Record. The Pension Consultants must submit annual reports setting forth the amount required to be transferred to the trustee for the Authority's pension plan in the next succeeding fiscal year.

Insurance (Sections 706 and 707)

The Authority covenants in the 1978 Trust Agreement that it will employ a Risk Management Consultant of recognized ability and standing nationwide to make recommendations with respect to insurance against direct physical damage and hazards, including the amounts thereof, with deductibles and exclusions and a program of self-insurance. The Risk Management Consultant will submit an annual report setting forth the insurance recommended to be carried or the program of self-insurance recommended to be undertaken. The Authority covenants that it will substantially comply with the recommendations of the Risk Management Consultant or with additional recommendations with respect to a reduced program of self-insurance if the Authority requests the Risk Management Consultant to make such additional recommendations. The Authority also covenants to carry insurance against loss of revenues due to physical loss or damage to its facilities and excess liability insurance substantially as recommended by the Risk Management Consultant. The 1978 Trust Agreement also provides that the Authority will provide such workers' compensation benefits or such

employer's liability protection as may be required by law but may provide the same through self-insurance.

No Impairment of Tax Exemption (Section 709)

The Authority covenants that it will not take any action adversely affecting the federal income tax exemption of interest on the Bonds (except Bonds issued as taxable Bonds the interest on which is subject to federal income taxation) and will seek to preserve the exemption of interest on the Bonds from state income taxation. The Authority also will take or require to be taken such acts as may be reasonably within its ability and as may be required under applicable law to preserve the exemption from federal income taxation of interest on the Bonds (except any Bonds issued as taxable Bonds the interest on which is subject to federal income taxation).

Restrictions on Certain Additional Facilities (Section 710)

The Authority covenants that it will not construct, acquire, or operate any building, structure or other facility, other than facilities financed by Additional Bonds issued under Paragraphs A through D under "Issuance of Additional Bonds" above, unless the Consulting Engineers file a statement to the effect that in their opinion the operation of such facility will not materially adversely affect the Net Revenues or impair the operating efficiency of the Projects taken as a whole.

Restrictions on Disposition of Property (Section 714)

The Authority covenants that it will not dispose of or encumber any Project or part thereof except that it may sell machinery, fixtures and other movable property if they are no longer needed or useful and the proceeds are applied to replacement or are deposited in the appropriate Project Account in the Construction Fund or in the Maintenance Reserve Fund, the Improvement and Extension Fund or the Redemption Account, as the Authority may determine. Subject to the provisions of the Authority's Enabling Act, real estate which the Authority, with the approval of the Consulting Engineers, determines is no longer needed or useful may be sold or may be exchanged for real estate if the Authority and Consulting Engineers declare such exchange advantageous. No approval of the Consulting Engineers is required for the sale or exchange of real estate where the aggregate value of the real estate and contiguous parcels sold or exchanged within two years is no more than \$500,000.

Notwithstanding the preceding paragraph, the Authority may, if permitted by law, sell or exchange all or any part of a Project other than any property necessary for the efficient operation of the Airport, provided that certificates are filed with the Trustee showing compliance with the following requirements:

- (A) no event of default is then existing under the 1978 Trust Agreement;
- (B) the amount on deposit in the Reserve Account is at least equal to the maximum annual Principal and Interest Requirements for any fiscal year on account of all Bonds then outstanding; and

(C) pro forma estimates confirmed by recognized experts show that the average annual Net Revenues for the two preceding fiscal years after giving effect to such sale or exchange would be at least 140% of the maximum annual Principal and Interest Requirements in any fiscal year thereafter on all Bonds then outstanding.

The proceeds of any such sale are not Revenues. See "Certain Definitions" below. Such proceeds may be deposited in the Improvement and Extension Fund or the Redemption Account as the Authority may direct. The Authority may also lease and grant licenses to use all or parts of its Projects. The Enabling Act requires the approval of the Governor of the Commonwealth for the sale of any Airport Properties or Port Properties originally acquired from the Commonwealth and provides that any proceeds of such sale be paid to the Commonwealth.

Annual Budget (Section 505)

Under the 1978 Trust Agreement, the Authority agrees to adopt an Annual Budget prior to each fiscal year, setting forth expected Operating Expenses and Revenues of the Authority and deposits in the various Funds and Accounts described above, and to furnish copies thereof to the Trustee, Consulting Engineer and each Bondholder of Record. The Authority may at any time adopt an amended Annual Budget for the remainder of the then current fiscal year which shall be treated as the Annual Budget. The Authority agrees that except for amounts payable from the Maintenance Reserve Fund it will not expend any amount or incur any obligations for maintenance, repair and operation in excess of the amounts provided for Operating Expenses in the Annual Budget, unless the excess is derived from a source other than Revenues. The Authority is also required to adopt a capital budget annually.

Investments in Funds and Accounts (Section 602)

Moneys held in the various Funds and Accounts, not currently needed for the purposes of such Funds and Accounts, will be invested by the Authority, or the Trustee upon direction of the Authority, in Investment Securities, except that moneys held in a Term Bond Investment Account may be invested only in Government Obligations. See "Certain Definitions—Investment Securities" and "-- Government Obligations" below. Securities purchased as an investment of moneys in any Fund or Account created under the 1978 Trust Agreement shall be valued at their amortized cost. The income received from such investment shall, in the case of the Construction Fund and the Self-Insurance Account, be applied as provided in the resolution creating such Account.

Events of Default and Remedies of Bondholders (Article VIII)

The 1978 Trust Agreement defines events of default to include, among others, failure to pay principal or redemption price when due or any installment of interest within 30 days after due, failure to make a required deposit in a Term Bond Investment Account relating to Additional Bonds as will permit the purchase of Government Obligations in accordance with the resolution authorizing such Additional Bonds, failure to carry on with reasonable dispatch the construction of any Additional Improvements or Additional Facilities (except as described above under "Completion of Projects"), a determination of receivership or insolvency, and failure to

perform the covenants contained in the 1978 Trust Agreement after notice. Certain grace periods, not exceeding 60 days in any case, are permitted for remedying certain defaults.

Upon the occurrence and continuance of an event of default the Trustee may, on its own initiative, and shall, upon the request of the holders of not less than 25% in principal amount of the Bonds then outstanding, declare the entire principal amount of all outstanding Bonds to be immediately due and payable. The Trustee may, and upon the request of not less than 25% in principal amount of all Bonds not then due by their terms shall, annul such declaration at any time before final judgment or decree in any suit instituted on account of the default or before completion of any other remedy, if all amounts then due on all outstanding Bonds by their terms and all other charges and liabilities of the Trustee and amounts payable by the Authority under the 1978 Trust Agreement have been paid or deposited with the Trustee and every other known default shall have been remedied.

Upon the happening and continuance of an event of default the Trustee may, on its own initiative, and shall, upon the request of the holders of not less than 25% in principal amount of the Bonds then outstanding and upon being indemnified to its satisfaction, proceed either at law or in equity to protect and enforce its rights and the rights of bondholders under the Enabling Act or the 1978 Trust Agreement. No holder of any Bonds shall have any right to institute any suit, action or other proceeding for the enforcement of any right under the 1978 Trust Agreement unless such holder shall give to the Trustee written notice of the event of default on account of which such suit, action or proceeding is to be instituted, and unless the holders of 25% in principal amount of the Bonds then outstanding shall have made written request of the Trustee and shall have afforded the Trustee a reasonable opportunity to institute such suit, action or proceeding and unless there shall have been offered to the Trustee reasonable security and indemnity against the costs, expenses and liabilities to be incurred, and the Trustee shall have refused or failed to comply with such request within a reasonable time. However, these provisions shall not limit or impair the right of any bondholder to take any action to enforce the payment of the principal of, premium, if any, and interest on its Bond.

The Trustee shall mail to all registered owners of Bonds then outstanding at their addresses as they appear on the registration books, and all other Bondholders of Record, written notice of the occurrence of any event of default set forth above within 30 days after the Trustee shall have notice pursuant to the 1978 Trust Agreement that any such event of default has occurred.

Concerning the Trustee (Article IX)

Under the 1978 Trust Agreement, the Trustee is not obliged to institute any suit or proceeding or to defend any suit until indemnified against liabilities and expenses. Under the 1978 Trust Agreement, the Trustee is indemnified by the Authority from Revenues for any liabilities incurred in acting under the 1978 Trust Agreement. The Trustee is entitled to reasonable compensation for acting under the 1978 Trust Agreement and to reimbursement for any litigation expenses and other reasonable expenses by the Authority. If the Authority fails to make payment pursuant to such provisions for indemnity by the Authority or payment of compensation or expenses, the Trustee may obtain such payment from moneys held under the 1978 Trust Agreement and is entitled to a preference therefor over any of the Bonds. The 1978

Trust Agreement provides that the Trustee and its directors, officers, employees or agents, either for its or their own accounts or fiduciary accounts, may buy and sell and hold Bonds.

The Trustee may at any time resign upon at least 60 days' written notice. The Trustee may be removed at any time (a) by the holders of not less than a majority in principal amount of the outstanding Bonds, or (b) for breach of trust or failure to act in accordance with the 1978 Trust Agreement by a court upon application of the Authority or the holders of not less than 25% in principal amount of the outstanding Bonds. Any removal of the Trustee shall take effect upon the appointment of a new Trustee. If the position of Trustee shall become vacant for any reason, the Authority shall appoint a successor trustee, subject to the right of the holders of a majority in aggregate principal amount of the Bonds then outstanding to appoint a successor Trustee which shall supersede the appointee of the Authority. Any trustee must be a bank or trust company with at least \$50,000,000 in aggregate capital and surplus.

The 1978 Trust Agreement also authorizes the Authority to replace the Trustee acting under the 1978 Trust Agreement, but only at five-year intervals and so long as no Event of Default exists under the 1978 Trust Agreement, upon 120 days written notice to the Trustee by filing with the Trustee an instrument signed on behalf of the Authority by its Secretary-Treasurer or other authorized officer.

Certain Rights of Bond Insurers (Section 1002)

With respect to any Series of Bonds or any maturity within a Series of Bonds all of the principal of and interest on which is insured by a bond insurance policy, if so provided in the resolution of the Authority authorizing the issuance of such Series, the terms "holder" and "owner" of Bonds and the term "bondholder", each as used in the 1978 Trust Agreement, for purposes of all consents, directions and notices provided for in the 1978 Trust Agreement shall mean, with respect to the Bonds of such Series or maturity, as the case may be, the issuer of such bond insurance policy as long as such policy issuer has not defaulted under such policy; provided, however, that unless it actually is the beneficial owner of the Bonds in respect of which a consent is requested, the policy issuer shall not have the power to act on behalf of the registered owners of any Bonds to consent to amendments, supplements or waivers that would (a) extend the stated maturity of or time for paying the interest on such Bonds, (b) reduce the principal amount of, purchase price for or redemption premium or rate of interest payable on such Bonds or (c) result in a privilege or priority of any Bond over any other Bond.

Modifications of the 1978 Trust Agreement (Article XI)

Under the terms of the 1978 Trust Agreement, the Authority and the Trustee, without consent of the holders of the Bonds, are authorized to enter into a supplemental agreement or agreements to cure any ambiguity or formal defect or omission or to correct any inconsistent provisions or obvious mistake in the 1978 Trust Agreement, to grant to the Trustee for the benefit of the holders of the Bonds any additional lawful rights to security, to add to the conditions, limitations and restrictions on the issuance of Bonds, to add to the covenants of the Authority, to provide for the issuance of subordinated obligations or to provide for the issuance of obligations under a supplemental agreement which are not payable from Revenues. In addition, the 1978 Trust Agreement may be modified, altered, amended, added to or rescinded

with the consent of the holders of not less than 51% in aggregate principal amount of the Bonds then outstanding or, if less than all Series of Bonds then outstanding are affected, the consent of the holders of not less than 51% in aggregate principal amount of each affected Series of Bonds. Notwithstanding the foregoing, without the consent of the holders of not less than 100% in aggregate principal amount of the Bonds then outstanding or, in case less than all of the several Series of Bonds then outstanding are affected thereby, the holders of not less than 100% in aggregate principal amount outstanding of each Series so affected, no such modification or amendment shall permit (a) an extension of the maturity of the principal of or the interest on any Bond issued thereunder, or (b) a reduction in the principal amount or redemption premium of any Bond or the rate of interest thereon, or (c) the creation of a lien upon or pledge of Revenues ranking prior to or on a party with the lien or pledge created by the 1978 Trust Agreement, or (d) a preference or priority of any Bond or Bonds except as permitted by the 1978 Trust Agreement, or (e) a reduction in the aggregate principal amount of the Bonds required for consent to such modification or amendment.

Defeasance (Article XII)

If the Authority shall pay or cause to be paid the principal, premium, if applicable, and interest to the holders of all outstanding Bonds, then the pledge of any Revenues and other moneys pledged under the 1978 Trust Agreement and all covenants, agreements and other obligations to the holders of Bonds shall terminate and be discharged and satisfied.

Bonds for the payment or redemption of which sufficient moneys, or sufficient Government Obligations the principal of and interest on which when due will provide moneys, to pay when due the principal, Amortization Requirements and interest on such Bonds have been irrevocably deposited with the Trustee for the sole purpose of paying or redeeming such Bonds will be deemed to have been paid within the meaning of the foregoing paragraph, provided that if any of such Bonds are to be redeemed prior to maturity, notice of such redemption must be duly given or irrevocable instructions to publish a notice to the bondholders, the form and content and substance of which are specified in the 1978 Trust Agreement, must have been given in form satisfactory to the Trustee.

Capital Appreciation Bonds (Section 1311)

Bonds of any Series may be issued with interest payable (i) only at their stated maturity date (or upon earlier redemption, purchase or acceleration) or (ii) in part at their stated maturity date (or upon earlier redemption, purchase or acceleration) and in part on stated interest payment dates, as set forth in the resolution authorizing the issuance of the Bonds.

Certain Definitions

Certain terms used in this Official Statement have the following meanings:

Additional Facilities -- Any revenue-producing facility which serves a public purpose and the acquisition or construction and the financing of which by the Authority may hereafter be authorized by the legislature of the Commonwealth, excluding, however, any extension, enlargement or improvement of a project then under the control of the Authority and any

building, structure or other facility financed or refinanced by the Authority by obligations not issued under the provisions of the 1978 Trust Agreement.

Additional Improvements -- Any extension, enlargement or improvement of a Project, other than the extension, enlargement or improvement of any building, structure or other facility financed or refinanced by the Authority by obligations not issued under the provisions of the 1978 Trust Agreement.

<u>Amortization Requirements</u> -- The amounts for the respective fiscal years as determined by the Authority for the retirement of term Bonds of a Series.

Bondholder of Record -- The registered owner of outstanding fully registered Bonds or Bonds registered as to principal alone (in either case in an aggregate principal amount of at least \$500,000) or any holder of outstanding Bonds who shall have filed with the Secretary-Treasurer of the Authority a request in writing setting forth his name and address and the particular reports, notices or other documents which he desires to receive and which are required to be mailed to bondholders of record under the provisions of the 1978 Trust Agreement. So long as the 2015 Bonds are in book-entry only form, the Bondholder of Record thereof for the purposes of the 1978 Trust Agreement shall be DTC or DTC's partnership nominee (or a successor securities depository). See "THE 2015 BONDS -- Book-Entry Only Method."

<u>Designated Debt</u> -- Any Series of Bonds, or portion thereof, with respect to which there shall be in effect a Qualified Hedge Facility.

<u>Government Obligations</u> -- The securities referred to in clause (i) of the definition of Investment Securities. See below.

<u>Investment Securities</u> -- Any of the following which at the time of investment are legal investments under the laws of the Commonwealth for the moneys proposed to be invested therein:

- (i) Direct obligations of, or obligations the principal of and interest on which are unconditionally guaranteed by, the United States of America;
- (ii) Bonds, indentures or notes or other evidences of indebtedness issued or guaranteed by any of the following agencies: Bank for Cooperatives; Federal Intermediate Credit Banks; Federal Home Loan Mortgage Corporation; Federal Home Loan Banks; the Federal National Mortgage Association; the United States Postal Service; the Government National Mortgage Association; the Federal Financing Bank; or any other agency or instrumentality of the United States of America now existing or hereafter created;
- (iii) New Housing Authority Bonds or project notes issued by public agencies or municipalities and fully secured as to the payment of both principal and interest by, respectively, a pledge of annual contributions under an annual contributions contract or contracts or requisition or payment agreements with the United States of America;

- (iv) Negotiable or non-negotiable bank time deposits evidenced by certificates of deposit issued by banks, trust companies, national banking associations or savings and loan associations (which may include the Trustee) provided that such time deposits are fully insured by the Federal Deposit Insurance Corporation or secured by obligations described in clauses (i), (ii) or (iii) of this definition or by full faith and credit obligations of (a) the Commonwealth or (b) any state of the United States rated in the three highest grades by a nationally recognized rating agency, provided such obligations at all times have a market value at least equal to the maturity value of the deposits so secured, including accrued interest on such deposits;
- (v) Repurchase agreements with banks described in clause (iv) of this definition (which may include the Trustee) or government bond dealers reporting to, trading with, and recognized as primary dealers by, a Federal Reserve Bank, the underlying securities of which are obligations described in clauses (i) and (ii) of this definition, provided that the underlying securities are required to be continuously maintained at a market value not less than the amount so invested;
- (vi) Any bonds or other obligations of any state of the United States of America or of any local government unit of any such state which (1) are rated in the highest rating category by Moody's Investors Service and Standard & Poor's, without regard to gradations within categories, (2) are not callable unless irrevocable instructions have been given to the trustee for such bonds to give due notice of redemption and to call such bonds for redemption on the date(s) specified in such instruments, and (3) are secured by cash and Government Obligations;
- (vii) Direct and general obligations of any state of the United States of America, to the payment of the principal of and interest on which the full faith and credit of such state is pledged, provided such obligations are rated in either of the two highest rating categories without regard to gradations within categories by Moody's Investors Service and Standard & Poor's;
- (viii) Obligations of any state of the United States of America or any political subdivision thereof which shall be rated in one of the two highest rating categories by Moody's Investors Service and Standard & Poor's without regard to gradations within categories;
- (ix) Certificates that evidence ownership of the right to payments of principal of or interest on Government Obligations, provided that (1) such obligations shall be held in trust by a bank or trust company or a national banking association meeting the requirements for a successor Trustee under the 1978 Trust Agreement, (2) the owner of the investment is the real party in interest and has the right to proceed directly and individually against the obligor of the underlying Government Obligations, and (3) the underlying Government Obligations are held in a special account separate from the custodian's general assets, and are not available to satisfy any claim of the custodian, any person claiming through the custodian, or any person to whom the custodian may be obligated;

- (x) Commercial paper rated at the time of purchase in the highest rating category, without regard to gradations within such category, by Moody's Investors Service and Standard & Poor's:
 - (xi) Investments or deposits in the Massachusetts Municipal Depository Trust;
- (xii) Money market funds rated in the highest rating category, without regard to gradations within such category, by Moody's Investors Service and Standard & Poor's;
- (xiii) Investment contracts with banks (which may include the Trustee) or other financial institutions whose long-term unsecured debt or claims-paying ability is rated in one of the two highest rating categories by Moody's Investors Service and Standard & Poor's:
- (xiv) Banker's acceptances rated at the time of purchase in the highest short-term rating category, without regard to gradations within such category, of Moody's Investors Service and Standard & Poor's;
- (xv) Advance-refunded municipal bonds rated in the highest rating category, without regard to gradations within such category, by Moody's Investors Service ("Moody's") and Standard & Poor's Ratings Services, a Division of the McGraw-Hill Companies, Inc. ("S&P");
- (xvi) U.S. dollar denominated debt offerings of a multilateral organization of governments rated in the highest rating category, without regard to gradations within such category, by Moody's and S&P;
- (xvii) U.S. dollar denominated corporate bonds, notes or other debt obligations issued or guaranteed by a domestic or foreign corporation, financial institution, non-profit or other entity rated in one of the three highest rating categories, without regard to gradations within such categories, by Moody's Investors Service and S&P;
- (xviii) Negotiable bank certificates of deposit, deposit notes or other deposit obligations issued by a nationally or state chartered bank, credit union or savings association, or by a federally or state-licensed branch of a foreign bank or financial institution, in each case rated in one of the three highest rating categories, without regard to gradations within such categories, by Moody's or S&P; and
- (xix) Any other investment authorized pursuant to an amendment or supplement to the 1978 Trust Agreement pursuant to Section 1101(g) of the 1978 Trust Agreement.

Section 1101(g) of the 1978 Trust Agreement authorizes modification of the definition of Investment Securities as directed by the Authority, provided that the Authority shall have provided evidence to the Trustee that the details of such modification have been provided in writing to each of Moody's Investors Service (if Moody's Investors Service is then assigning a rating to any outstanding Bonds), Standard & Poor's (if Standard & Poor's is then assigning a rating to any outstanding Bonds) and each other nationally recognized rating agency, if any, then assigning a rating to any outstanding Bonds and that each such rating agency has either

(i) confirmed in writing that such modification will not adversely affect the rating it assigns to outstanding Bonds or (ii) issued a rating on a Series of Bonds to be issued which is not lower than the rating assigned by such rating agency to outstanding Bonds prior to such modification, or any other evidence satisfactory to the Trustee that such modification will not adversely affect the then current ratings, if any, assigned to the Bonds by any nationally recognized rating agency.

Operating Expenses -- The Authority's reasonable and necessary current expenses of maintaining, repairing and operating the Projects, including administrative expenses, insurance premiums and payments into the Self-Insurance Account, fees and expenses of the Trustee, engineering expenses relating to operation and maintenance, legal expenses, charges of Paving Agents, payments of annual pension expense and post-retirement health benefits expense, any taxes of general applicability which may be lawfully imposed on the Authority or its income or operations or the property under its control and reserves for such taxes, ordinary and usual expenditures for maintenance and repair, which may include expenses not annually recurring, including such expenditures necessary to maintain the then useful life and operational status of any Project or to keep any Project in its present operational status and all such other costs of maintenance and repair as the Authority may determine to include in Operating Expenses in accordance with sound business practice applied on a consistent basis and any other expenses required to be paid by the Authority under the provisions of the 1978 Trust Agreement or by law on account of the operation or ownership of the Projects, but excluding reserves for operation, maintenance or repair, depreciation allowances or any deposits or transfers to the credit of any of the Funds or Accounts created under the 1978 Trust Agreement except the Self-Insurance Account, pension account and post-retirement health benefits account.

Principal and Interest Requirements -- With respect to any Series of Bonds, the sum during any fiscal year of (a) interest payable on all Bonds of such Series outstanding which accrues in such fiscal year (less capitalized interest and interest paid or to be paid for such period from moneys in the Construction Fund), (b) principal payable on serial Bonds of such Series on any date commencing with July 2 in such fiscal year and ending with July 1 of the next fiscal year, both inclusive, (c) the Amortization Requirements of term Bonds of such Series, if any, for such fiscal year, plus an amount equal to the premium, if any, which would be payable on any date referred to in subparagraph (b) of this definition on a like principal amount of Bonds if such principal amount of Bonds should be redeemed on such date from moneys in the Interest and Sinking Fund, and (d) the amount required to be deposited in the Term Bond Investment Account (if such an Account is established for such Series of Bonds), if any, for such fiscal year; less income to be accrued during the year on investments in such a Term Bond Investment Account to the extent such income is required to be retained in such Account or deposited in the Bond Service Account or into the Redemption Account.

Regarding the calculation of Principal and Interest Requirements on variable-rate debt, see "SECURITY FOR THE 2015 BONDS -- Additional Bonds". In computing the Principal and Interest Requirements, Designated Debt which bears interest at a variable rate and with respect to which there exists a Qualified Hedge Facility obligating the Authority to pay a fixed interest rate or a different variable interest rate shall be deemed (for the period during which such Qualified Hedge Facility is reasonably expected to remain in effect and notwithstanding the third paragraph of this definition) to bear interest at the fixed interest rate or different variable rate

payable by the Authority pursuant to the Qualified Hedge Facility relating thereto. In computing Principal and Interest Requirements, Designated Debt which bears interest at a fixed rate and with respect to which there exists a Qualified Hedge Facility obligating the Authority to pay a floating rate shall be deemed (for the period during which such Qualified Hedge Facility is reasonably expected to remain in effect) to bear interest equal to the interest payable on the Designated Debt, minus the fixed amounts received or to be received by the Authority under the Qualified Hedge Facility, plus the amount of the floating payments made or to be made by the Authority under the Qualified Hedge Facility (such floating payments not yet made to be determined as provided in the third paragraph of this definition).

Qualified Hedge Facility -- Any interest rate exchange, interest rate cap or other transaction which is intended to convert or limit the interest rate payable with respect to all or part of a particular Series of Bonds and which (a) is with a Qualified Hedge Provider and (b) has been designated in writing to the Trustee by the Authority as a Qualified Hedge Facility with respect to all or part of a particular Series of Bonds;

Qualified Hedge Provider -- A financial institution (a) whose senior long-term obligations are rated not lower than "A1" or the equivalent by Moody's Investors Service and not lower than "A+" or the equivalent by Standard & Poor's or (b) whose obligations under each Qualified Hedge Facility (i) are guaranteed by a financial institution, or subsidiary of a financial institution, whose senior long-term debt obligations are rated not lower than "A1" or its equivalent by Moody's Investors Service and not lower than "A+" or its equivalent by Standard & Poor's or (ii) are fully secured by investments described in clause (i) or (ii) of the definition of "Investment Securities" which (A) are valued not less frequently than monthly and have a fair market value, exclusive of accrued interest, at all times at least equal to 100% of the Authority's exposure in respect of such Qualified Hedge Facility, (B) are held by the Trustee or a custodian other than the Qualified Hedge Provider and (C) are subject to a perfected lien in favor of the Authority or the Trustee free and clear of all third-party liens.

<u>Project</u> -- Any of the Airport Properties, the Port Properties or any Additional Facility financed in whole or in part under the provisions of the 1978 Trust Agreement, either from the proceeds of Bonds or other available funds, including in the case of each such Project all equipment, appurtenances, extensions, enlargements, improvements, renewals and replacements thereof, but shall not include any land, building, structure or other facility financed or refinanced by the Authority by obligations not issued under the provisions of the 1978 Trust Agreement.

Replacement Cost -- As of any date of calculation the then present-day cost to replace or reconstruct all or any of the physical facilities of the Authority to their current use or operational status with materials then used in accordance with sound construction practice but shall exclude (a) the cost to reconstruct or replace all below-ground or below-water foundations and utility improvements and the cost of land, landfill and site improvements and (b) if and to the extent that the Authority shall have so notified the Trustee in writing, the cost to reconstruct or replace any facility financed with the proceeds of obligations other than Bonds, which obligations are not secured by any pledge, lien or charge on, nor payable from, the Revenues or any of the Funds and Accounts created by the 1978 Trust Agreement.

Revenues -- All moneys derived or to be derived by the Authority in payment of tolls, rates, fees, rentals and other charges for the use of, and for the services and facilities furnished by, the Projects, any proceeds of use and occupancy and liability insurance (but not casualty insurance proceeds or awards for damages), the proceeds of leases, licenses, permits and concessions, and other income from the ownership or operation of the Projects, including income from investments except those in the Construction Fund, the Self-Insurance Account, any pension or post-retirement health benefit account in the Operating Fund and the Term Bond Investment Account; but excluding (i) moneys derived from facilities financed with the proceeds of obligations not secured by or payable from Revenues to the extent such moneys are pledged to the payment of such obligations, (ii) proceeds of casualty insurance or awards for damages, (iii) proceeds of sales of Bonds, (iv) proceeds of the sale or other disposition of property pursuant to the 1978 Trust Agreement and (v) except to the extent from time to time provided by the Authority by resolution, the proceeds of any passenger facility charge or similar tax levied by or on behalf of the Authority pursuant to the Federal Aviation Safety and Capacity Act of 1990 as from time to time amended, and any successor thereto, and the proceeds of any other charge or tax from time to time levied by or on behalf of the Authority pursuant to any federal statute or regulation enacted or promulgated after May 15, 2003 which restricts the use of such proceeds to purposes identified in or pursuant to such statute or regulation. The Authority has excluded from Revenues the proceeds of PFCs and CFCs. See "SECURITY FOR THE 2015 BONDS – Other Revenues of the Authority Not Pledged as Security for the Bonds – Passenger Facility Charges" and "—Customer Facility Charges."

Term Bond Investment Account -- For a Series of Bonds shall mean each Account so designated which is established in the Interest and Sinking Fund for the term Bonds of such Series pursuant to the resolution of the Authority authorizing the issuance of such Series of Bonds. (No such Account will be established for any of the 2015 Bonds.)

FORM OF CONTINUING DISCLOSURE CERTIFICATE

This Continuing Disclosure Certificate (the "Disclosure Certificate") is executed and delivered by the Massachusetts Port Authority (the "Issuer") in connection with the issuance of one or more series of bonds by or on behalf of the Issuer and designated by duly adopted resolution of the Issuer as subject to and having the benefits of this Disclosure Certificate (such bonds referred to herein collectively as the "Bonds"). The Issuer covenants and agrees as follows:

- SECTION 1. <u>Purpose of the Disclosure Certificate</u>. This Disclosure Certificate is being executed and delivered by the Issuer for the benefit of the owners of Bonds and in order to assist Participating Underwriters in complying with the Rule (as defined below).
- SECTION 2. <u>Definitions</u>. In addition to terms defined elsewhere in this Disclosure Certificate, the following capitalized terms shall have the following meanings:
- "Annual Filing" shall mean any Annual Filing provided by the Issuer pursuant to, and as described in, Sections 3 and 4 of this Disclosure Certificate.
- "Dissemination Agent" shall mean Digital Assurance Certification, L.L.C., acting in its capacity as dissemination agent for the Issuer pursuant to the Disclosure Dissemination Agent Agreement dated as of January 8, 2010, between the Issuer and Digital Assurance Certification, L.L.C., or any successor thereto designated in writing by the Issuer as its agent for purposes of satisfying the filing and notice requirements assumed by the Issuer under this Disclosure Certificate, and which successor has filed with the Issuer a written acceptance of such designation.

"Listed Events" shall mean any of the events listed in Section 5(a) of this Disclosure Certificate.

"MSRB" means the Municipal Securities Rulemaking Board established pursuant to Section 15B(b)(1) of the Securities Exchange Act of 1934, or any successor thereto or to the functions of the MSRB contemplated by this Disclosure Certificate. Until otherwise designated by the MSRB or the Securities and Exchange Commission, filings with the MSRB are to be made through the Electronic Municipal Market Access (EMMA) website of the MSRB, currently located at http://emma.msrb.org.

"Owners of the Bonds" or "Owners" shall mean the registered owners, including beneficial owners, of the Bonds.

"Participating Underwriters" shall mean the original underwriters of any Bonds required to comply with the Rule in connection with the offering of such Bonds.

"Rule" shall mean Rule 15c2-12 adopted by the Securities and Exchange Commission under the Securities Exchange Act of 1934, as the same may be amended from time to time.

"Trust Agreement" shall mean the Trust Agreement dated as of August 1, 1978, as amended and supplemented, between the Issuer and State Street Bank and Trust Company, as Trustee.

SECTION 3. Provision of Annual Filings.

(a) The Issuer shall, or shall cause the Dissemination Agent to, not later than January 1 of each year, commencing January 1, 2013, provide to the MSRB an Annual Filing that is consistent with the requirements of Section 4 of this Disclosure Certificate. The Annual Filing may be submitted as a single document or as separate documents comprising a package, and may cross-reference other information as provided in Section 4 of this Disclosure Certificate; provided that the audited financial statements of the Issuer may be submitted, when available, separately from the balance of the Annual Filing.

APPENDIX F

- (b) If the Issuer is unable to provide the Annual Filing to the MSRB by the date required in subsection (a), the Issuer shall send, or cause the Dissemination Agent to send, a notice in a timely manner to the MSRB in substantially the form attached as Exhibit A.
- SECTION 4. <u>Content of Annual Filings</u>. The Issuer's Annual Filing shall contain or incorporate by reference the following:
- (a) operating data for, or as of the end of, the preceding fiscal year of the type presented in the Issuer's most recent official statement, including data relating to (i) the market shares of total Airport passenger traffic, (ii) the percentage of passengers traveling on U.S. air carrier airlines between the Airport and other final domestic destinations, (iii) general Airport traffic statistics and (iv) cargo and passenger activity relating to the Port Properties;
- (b) financial information for, or as of the end of, the preceding fiscal year of the type presented in the Issuer's most recent official statement, including a summary of operating results and debt service coverage; and
- (c) the most recently available audited financial statements of the Issuer, prepared in accordance with generally accepted accounting principles. (If audited financial statements for the preceding fiscal year are not available when the Annual Filing is submitted, the Annual Filing will include unaudited financial statements for the preceding fiscal year.)

Any or all of the items listed above may be incorporated by reference from other documents, including official statements of debt issues of the Issuer or related public entities, which (i) are available to the public on the MSRB's Internet Web site or (ii) have been filed with the Securities and Exchange Commission. The Issuer shall clearly identify each such other document so incorporated by reference.

SECTION 5. Reporting of Significant Events.

- (a) The Issuer shall give notice, or shall cause the Dissemination Agent to give notice, in accordance with subsection 5(b) below, of the occurrence of any of the following events with respect to any Bonds:
 - (i) Principal and interest payment delinquencies.
 - (ii) Non-payment related defaults, if material.
 - (iii) Unscheduled draws on debt service reserves reflecting financial difficulties.
 - (iv) Unscheduled draws on credit enhancements reflecting financial difficulties.
 - (v) Substitution of credit or liquidity providers, or their failure to perform.
 - (vi) adverse tax opinions, the issuance by the Internal Revenue Service of proposed or final determination of taxability, Notices of Proposed Issue (IRS Form 5701-TEB) or other material notices or determinations with respect to the tax status of the Bonds, or other material events affecting the tax status of the Bonds.
 - (vii) Modifications to rights of any Owners of the Bonds, if material.
 - (viii) Optional, contingent or unscheduled calls of Bonds, if material, and tender offers.
 - (ix) Defeasance of any Bonds or any portion thereof.
 - (x) Release, substitution or sale of property securing repayment of any Bonds, if material.
 - (xi) Rating changes.

- (xii) Bankruptcy, insolvency, receivership or similar event of the Issuer.*
- (xiii) The consummation of a merger, consolidation, or acquisition involving the Issuer or the sale of all or substantially all of the assets of the Issuer, other than in the ordinary course of business, the entry into a definitive agreement to undertake such an action or the termination of a definitive agreement relating to any such actions, other than pursuant to its terms, if material.
- (xiv) Appointment of a successor or additional trustee or the change of name of the Trustee, if material.
- (b) Upon the occurrence of a Listed Event, the Issuer shall, in a timely manner not in excess of ten (10) business days after the occurrence of the event, file, or cause the Dissemination Agent to file, a notice of such occurrence with the MSRB.
- (c) Anything in this Section 5 to the contrary notwithstanding, the Issuer shall have no obligation to give notice of or otherwise report any Listed Event with respect to any series of Bonds as to which another obligated person (as such term is defined in the Rule) has entered into an undertaking to provide such notice in accordance with the Rule.
- SECTION 6. <u>Transmission of Information and Notices</u>. Unless otherwise required by law, all notices, documents and information provided to the MSRB shall be provided in electronic format as prescribed by the MSRB and shall be accompanied by identifying information as prescribed by the MSRB.
- SECTION 7. <u>Termination of Reporting Obligation</u>. The Issuer's obligations under this Disclosure Certificate shall terminate upon the defeasance, prior redemption or payment in full of all of the Bonds.

SECTION 8. <u>Amendment; Waiver</u>. Notwithstanding any other provision of this Disclosure Certificate, the Issuer may amend this Disclosure Certificate and any provision of this Disclosure Certificate may be waived, if such amendment or waiver is permitted by the Rule, as evidenced by an opinion of counsel expert in federal securities laws to the effect that such amendment or waiver would not, in and of itself, cause the undertakings herein to violate the Rule if such amendment or waiver had been effective on the date hereof but taking into account any subsequent change in or official interpretation of the Rule.

If the amendment provides for a change in the accounting principles to be followed in preparing financial statements, the Annual Filing for the year in which the change is made shall present a comparison between the financial statements or information prepared on the basis of the new accounting principles and those prepared on the basis of the former accounting principles. The comparison shall include a qualitative discussion of the differences in the accounting principles and the impact of the change in the accounting principles on the presentation of the financial information in order to provide information to investors to enable them to evaluate the ability of the Issuer to meet its obligations. To the extent reasonably feasible, the comparison shall also be quantitative. A notice of the change in the accounting principles shall be sent to the MSRB.

SECTION 9. <u>Default</u>. In the event of a failure of the Issuer to comply with any provision of this Disclosure Certificate, any Owner of any Bonds may seek a court order for specific performance by the Issuer of its obligations under this Disclosure Certificate. A default under this Disclosure Certificate shall not be deemed an event of default under the Trust Agreement, and the sole remedy under this Disclosure Certificate in the event of any failure of the Issuer to comply with this Disclosure Certificate shall be an action to compel performance of the Issuer's obligations hereunder and not for money damages in any amount.

authority having supervision or jurisdiction over substantially all of the assets or business of the Issuer.

^{*} As noted in the Rule, this event is considered to occur when any of the following occur: (i) the appointment of a receiver, fiscal agent or similar officer for the Issuer in a proceeding under the U.S. Bankruptcy Code or in any proceeding under state or federal law in which a court or governmental authority has assumed jurisdiction over substantially all of the assets or business of the Issuer, or if such jurisdiction has been assumed by leaving the existing governing body and officials or officers in possession but subject to the supervision and orders of a court or governmental authority, or (ii) the entry of an order confirming a plan of reorganization, arrangement or liquidation by a court or governmental

APPENDIX F

SECTION 10. <u>Beneficiaries</u>. This Disclosure Certificate shall inure solely to the benefit of the Issuer, Participating Underwriters and Owners from time to time of the Bonds, and shall create no rights in any other person or entity.

SECTION 11. <u>Governing Law</u>. This instrument shall be governed by the laws of The Commonwealth of Massachusetts.

[Remainder of page intentionally left blank.]

IN WITNESS	WHEREOF,	the Issuer ha	s caused	this Disclosure	Certificate to	be duly	executed	under	seal a	as
of the date hereof.						•				

Date: July 19, 2012

MASSACHUSETTS PORT AUTHORITY

EXHIBIT A

NOTICE OF FAILURE TO FILE ANNUAL FILING

Name of Issuer: Massachusetts Port Authority	
NOTICE IS HEREBY GIVEN that the Issuer has not Disclosure Certificate of the Issuer dated as of July 19, 2012. by	t provided an Annual Filing as required by the Continuing The Issuer anticipates that the Annual Filing will be filed
Dated:	
	[DISSEMINATION AGENT], on behalf of the Issuer
	By

cc: Massachusetts Port Authority





ATTORNEYS AT LAW

111 HUNTINGTON AVENUE BOSTON, MASSACHUSETTS 02199 617.342.4000 TEL 617.342.4001 FAX WWW.FOLEY.COM

WRITER'S DIRECT LINE 312.832.4921 mbrooks@foley.com EMAIL

CLIENT/MATTER NUMBER 071193-0128

July 15, 2015

Massachusetts Port Authority One Harborside Drive, Suite 200S East Boston, Massachusetts 02128

Re: Massachusetts Port Authority \$104,480,000 Revenue Bonds,

Series 2015-A (Non-AMT) and \$67,005,000 Revenue Bonds,

Series 2015-B (AMT)

Ladies and Gentlemen:

We have acted as bond counsel to the Massachusetts Port Authority (the "Authority") in connection with the issuance by the Authority of its Revenue Bonds, Series 2015-A (Non-AMT) (the "2015-A Bonds") and its Revenue Bonds, Series 2015-B (AMT) (the "2015-B Bonds" and, together with the 2015-A Bonds collectively, the "2015 Bonds"). The 2015 Bonds are issued pursuant to Chapter 465 of the Massachusetts Acts of 1956, as amended (the "Act"), the Trust Agreement dated as of August 1, 1978, as supplemented and amended (the "Trust Agreement"), by and between the Authority and U.S. Bank National Association, as successor-in-interest to State Street Bank and Trust Company, as trustee (the "Trustee"), and the Issuance Resolution adopted by the Members of the Authority on June 18, 2015 (the "Resolution"). All capitalized terms used herein and not otherwise defined shall have the respective meanings set forth in the Trust Agreement.

As bond counsel, we have examined the law, the Trust Agreement, the Resolution, the by-laws of the Authority, and a certified copy of the proceedings relating to the issuance of the 2015 Bonds. As to questions of fact material to our opinion, we relied upon those certified proceedings and certifications of Authorized Officers (as defined in the Resolution) of the Authority and others without independently undertaking to verify them.

Neither The Commonwealth of Massachusetts (the "Commonwealth") nor any political subdivision thereof, other than the Authority, is obligated to pay any of the 2015 Bonds or the interest thereon, and neither the faith and credit nor the taxing power of the Commonwealth or any political subdivision thereof is pledged to the payment of the principal of or interest on the 2015 Bonds. The 2015 Bonds are secured on a parity with other Bonds heretofore and hereafter issued pursuant to the Trust Agreement and are secured by and payable solely from Revenues available therefor under the Trust Agreement. The Authority has no taxing power.



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Based on the foregoing, we are of the opinion that, under existing law:

- 1. The Authority is a body politic and corporate and public instrumentality of the Commonwealth duly created by the Act, with all necessary power and authority to adopt the Resolution, perform its obligations under the Resolution, and issue the 2015 Bonds.
- 2. The 2015 Bonds have been duly authorized, executed, and delivered by the Authority, and, assuming that the 2015 Bonds have been authenticated as provided in the Act and the Trust Agreement, the 2015 Bonds constitute legal, valid, and binding obligations of the Authority, enforceable in accordance with their terms and entitled to the benefits and security of the Resolution and the Trust Agreement.
- 3. The Resolution and the Trust Agreement are authorized by the Act, the Trust Agreement has been duly authorized, executed and delivered by the Authority, and the Resolution and the Trust Agreement constitute legal, valid and binding obligations of the Authority, enforceable against the Authority in accordance with their respective terms.
- 4. The interest on the 2015 Bonds is excluded from gross income for federal income tax purposes, except for interest on any 2015-B Bond for any period during which such 2015-B Bond is held by a person who is a "substantial user" of the facilities financed with proceeds of the 2015-B Bonds or a "related person" of such a substantial user within the meaning of Section 147(a) of the Internal Revenue Code of 1986, as amended (the "Code"). In addition, interest on the 2015-A Bonds is not a specific preference item for purposes of the federal individual or corporate alternative minimum taxes; however, such interest is included in adjusted current earnings in calculating federal alternative minimum tax imposed on certain corporations. Interest on the 2015-B Bonds is a specific preference item for purposes of the federal individual or corporate alternative minimum taxes. The opinions set forth in this paragraph are subject to the condition that the Authority comply with various requirements imposed by the Code that must be complied with after the 2015 Bonds are issued for interest on the 2015 Bonds to be, or continue to be, excluded from gross income for federal income tax purposes and for interest on the 2015-A Bonds not to be, or continue not to be, a specific preference item for purposes of the federal alternative minimum tax. The Authority has covenanted in the Trust Agreement and the Resolution that it will not take or permit to be taken on its behalf any action that would adversely affect the exemption from federal income taxation of the interest on the 2015 Bonds and that it will take or require to be taken such actions as may be reasonably within its ability and as may be required under applicable law to continue the exemption from federal income taxation of the interest on the 2015 Bonds. The Authority's failure to comply with such covenants may result in the inclusion of interest on the 2015 Bonds in gross income for federal income tax purposes, or treatment of interest on the 2015-A Bonds as an item of tax preference for alternative minimum tax purposes, in some cases retroactively to the date the 2015 Bonds were issued. We have not undertaken to determine (or to inform any person) whether any actions taken (or not taken) or events occurring (or not occurring) after the date of issuance of the



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2015 Bonds may adversely affect the tax status of interest on the 2015 Bonds. We express no opinion regarding any other federal tax consequences arising with respect to the 2015 Bonds.

5. The 2015 Bonds, their transfer, and the income therefrom (including any profit made on the sale thereof) are exempt from taxation by the Commonwealth. We express no opinion as to whether the 2015 Bonds or the interest thereon are included in the measure of Commonwealth estate and inheritance taxes and certain Commonwealth corporation excise and franchise taxes. We express no opinion regarding other Commonwealth tax consequences arising with respect to the 2015 Bonds or regarding the tax consequences under the laws of states other than the Commonwealth.

The rights of the owners of the 2015 Bonds and the enforceability of the 2015 Bonds, the Trust Agreement, and the Resolution may be limited by bankruptcy, insolvency, reorganization, moratorium, and other similar laws affecting creditors' rights, and by equitable principles (which may be applied in either a legal or an equitable proceeding). We express no opinion as to the availability of any particular form of judicial relief.

Except as set forth in our supplemental opinion of even date, we have not been engaged or undertaken to review the accuracy, completeness, or sufficiency of the Official Statement dated July 8, 2015 or other offering material relating to the 2015 Bonds (except to the extent, if any, stated in the Official Statement), and we express no opinion as to those matters (except only the matters set forth as our opinion in the Official Statement). We have not passed on any matters relating to the business, affairs, or condition (financial or otherwise) of the Authority and no inference should be drawn that we have expressed any opinion on matters relating to the ability of the Authority to perform its obligations under the Trust Agreement or the Resolution.

This letter speaks as of its date. We assume no duty to change this letter to reflect any facts or circumstances that later come to our attention or any changes in law. We express no opinion as to laws other than the laws of the Commonwealth and the federal laws of the United States of America. In acting as bond counsel, we have established an attorney-client relationship solely with the Authority.

Very truly yours,







