

NEW ISSUE – BOOK-ENTRY ONLY

Ratings: Fitch: AA-
 Moody's: Aa3
 Standard & Poor's: AA-
 (See "Ratings" herein)

In the opinion of Co-Bond Counsel, under existing statutes, regulations, rulings and court decisions, and assuming continuing compliance by the Commonwealth of Pennsylvania with certain covenants to comply with provisions of the Internal Revenue Code of 1986, as amended (the "Code") and all applicable regulations thereunder, now or hereafter enacted, interest on the Bonds (as defined herein) is excludable from gross income under Section 103(a) of the Code and interest on the Bonds is not an item of tax preference for purposes of the federal individual and corporate alternative minimum taxes. However, such interest is includable in adjusted current earnings for purposes of the federal alternative minimum tax imposed on certain corporations (as defined in the Code). Other provisions of the Code may affect the purchasers of the Bonds. See "TAX EXEMPTION AND OTHER TAX MATTERS" herein for a brief description of these provisions. Co-Bond Counsel is also of the opinion that under the laws of the Commonwealth of Pennsylvania as presently enacted and construed, the Bonds are exempt from personal property taxes in the Commonwealth of Pennsylvania and the interest on the Bonds is exempt from the Commonwealth of Pennsylvania Personal Income Tax and the Commonwealth of Pennsylvania Corporate Net Income Tax.



\$613,145,000*
Commonwealth of Pennsylvania
General Obligation Bonds
Second Refunding Series of 2016

Dated: Date of Issuance and Delivery

Due: As shown on inside cover

The Bonds (hereafter defined) will be issued only in book-entry only form and initially registered in the name of Cede & Co., as nominee for The Depository Trust Company ("DTC"), New York, New York. DTC will act as securities depository for the Bonds. Interest on the Bonds will be payable semi-annually on January 15 and July 15, commencing January 15, 2017 for the Second Refunding Series of 2016 Bonds (the "Bonds"). Manufacturers and Traders Trust Company, a New York banking corporation, Harrisburg, Pennsylvania, is the Loan and Transfer Agent for the Bonds. Principal of and interest and redemption premium, if any, on the Bonds are payable to Cede & Co. See "THE BONDS – Book-Entry Only System."

The Bonds are subject to redemption as set forth herein. See "THE BONDS – Redemption."

The Bonds are direct and general obligations of the Commonwealth and the full faith and credit of the Commonwealth are pledged for the payment of principal of and interest on the Bonds.

This cover page contains certain information for quick reference only. It is not a summary of the issue. Investors must read the entire Official Statement to obtain information essential to the making of an informed investment decision regarding the Bonds.

The Bonds are offered when, as and if issued, and are subject to the receipt of the legal opinions of the Office of Attorney General of the Commonwealth of Pennsylvania and, McNees Wallace & Nurick LLC, Harrisburg, Pennsylvania and Turner Law, P.C., Philadelphia, Pennsylvania. The Commonwealth expects that the Bonds will be available in definitive form for delivery through the facilities of DTC on or about December 16, 2016.

Electronic bids will be received by the Commonwealth until 11:00 A.M., Prevailing Eastern Time, on Wednesday, December 7, 2016, in accordance with the Notice of Sale, dated November 30, 2016. See Appendix H – "Notice of Sale."

Dated: December ___, 2016

* Preliminary, subject to change.

THIS IS A PRELIMINARY OFFICIAL STATEMENT AND IS NOT YET FINALLY ADOPTED. The sale of the Bonds is subject to the terms and conditions specified in the Official Notice of Sale. All information contained herein is subject to completion and amendment. Under no circumstances shall this Preliminary Official Statement constitute an offer to sell or the solicitation of an offer to buy, nor shall there be any sale of the Bonds in any jurisdiction in which such an offer, solicitation or sale would be unlawful.

\$613,145,000*
Commonwealth of Pennsylvania
General Obligation Bonds
Second Refunding Series of 2016

MATURITY SCHEDULE

<u>Due</u> <u>January 15</u>	<u>Principal</u> <u>Amount*</u>	<u>Interest</u> <u>Rate</u>	<u>Yield</u>	<u>CUSIP</u> <u>Number</u>	<u>Due</u> <u>January 15</u>	<u>Principal</u> <u>Amount*</u>	<u>Interest</u> <u>Rate</u>	<u>Yield</u>	<u>CUSIP</u> <u>Number</u>
2017	\$12,515,000				2024	\$45,710,000			
2018	6,640,000				2025	29,145,000			
2019	15,310,000				2026	165,000			
2020	43,970,000				2027	52,925,000			
2021	108,925,000				2028	80,335,000			
2022	138,795,000				2029	15,945,000			
2023	62,765,000								

* Preliminary, subject to change.



THE ISSUING OFFICIALS

GovernorTOM WOLF
State Treasurer.....TIMOTHY REESE
Auditor General.....EUGENE A. DePASQUALE

OFFICE OF THE BUDGET

Secretary.....RANDY ALBRIGHT

Attorney General of the Commonwealth of Pennsylvania:

Bruce R. Beemer

Co-Bond Counsel:

McNees Wallace & Nurick LLC
Harrisburg, Pennsylvania

Turner Law, P.C.
Philadelphia, Pennsylvania

Special Disclosure Counsel:

Obermayer Rebmann Maxwell & Hoppel LLP
Philadelphia, Pennsylvania

No dealer, broker, salesperson or other person has been authorized to give any information or to make any representations, other than as contained in this Official Statement, in connection with the offering contained herein, and, if given or made, such other information or representations must not be relied upon as having been authorized by the Commonwealth of Pennsylvania. This Official Statement does not constitute an offer to sell, or a solicitation of an offer to buy, nor shall there be any sale of the Bonds by any person in any jurisdiction where such sale would be unlawful.

Except as otherwise noted, the information herein speaks as of its date and is as of the date of this Official Statement and is subject to change without notice and neither the delivery of this Official Statement nor any sale made hereunder shall, in any circumstances, create any implication that there has been no change in the affairs of the Commonwealth of Pennsylvania since the date hereof.

The order and placement of the information this Official Statement, including the Appendices hereto and the information incorporated herein by reference, are not to be deemed to be a determination of relevance, materiality or importance, and this Official Statement, including the Appendices, and the information incorporated herein by reference, must be considered in its entirety.

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SUMMARY INFORMATION

THIS SUMMARY STATEMENT IS SUBJECT IN ALL RESPECTS TO THE MORE COMPLETE INFORMATION CONTAINED IN THIS OFFICIAL STATEMENT. OFFERING OF THE BONDS TO THE POTENTIAL PURCHASERS IS MADE ONLY BY MEANS OF THIS ENTIRE OFFICIAL STATEMENT, INCLUDING THE COVER AND APPENDICES HERETO AND THE INFORMATION INCORPORATED BY REFERENCE.

Issuer	Commonwealth of Pennsylvania	
Offering	\$613,145,000* Commonwealth of Pennsylvania, General Obligation Bonds, Second Refunding Series of 2016 (the “Bonds”).	
Dated Date	Date of Issuance and Delivery	
Security	General Obligation of the Commonwealth of Pennsylvania; full faith and credit pledged	
Use of Proceeds	The Commonwealth of Pennsylvania is issuing the Bonds for the following purpose:	
	<u>Purpose</u>	<u>Principal Amount</u>
	Refunding	\$613,145,000*
Redemption	The Second Refunding Series Bonds maturing on and after January 15, 2028 are subject to optional redemption in whole or in part (and if in part, in part within one or more maturities) at any time on and after January 15, 2027 at a redemption price equal to the principal amount thereof, plus accrued interest to the date fixed for redemption. [The Second Refunding Series Bonds maturing January 15, ___ are subject to mandatory sinking fund redemption as described herein, see “THE BONDS – Redemption – Mandatory Sinking Fund Redemption” herein].	
Authorized Denominations	\$5,000 or integral multiples thereof.	
Form of Bonds	The Bonds are issued in fully registered form through a book-entry only system.	
Loan & Transfer Agent	Manufacturers and Traders Trust Company, Harrisburg, Pennsylvania.	
Legal Opinions	McNees Wallace & Nurick LLC and Turner Law, P.C., Co-Bond Counsel. Bruce R. Beemer, Attorney General of the Office of Attorney General of the Commonwealth of Pennsylvania.	
Bond Ratings	Fitch Ratings.....	AA-(outlook “Stable”)
	Moody’s Investors Service	Aa3 (outlook “Stable”)
	Standard & Poor’s Rating Services.....	AA- (outlook “Negative”)
	(a division of the McGraw-Hill Companies)	
	See “RATINGS” herein.	

* Preliminary, subject to change.

Official Statement
\$613,145,000*
Commonwealth of Pennsylvania
General Obligation Bonds
Second Refunding Series of 2016

INTRODUCTION

This Official Statement of the Commonwealth of Pennsylvania (the “Commonwealth”), including the cover page, inside front cover page and appendices hereof, presents certain information in connection with the issuance of \$613,145,000* Commonwealth of Pennsylvania, General Obligation Bonds, Second Refunding Series of 2016 (the “Bonds”). The Bonds are being issued to refund certain outstanding bond issues of the Commonwealth. See “USE OF PROCEEDS.”

The Bonds are general obligations of the Commonwealth to which the full faith and credit of the Commonwealth are pledged. See “SECURITY AND SOURCE OF PAYMENT FOR BONDS.” Principal of and interest payments on the Bonds will be paid from the General Fund. See “COMMONWEALTH FINANCIAL PERFORMANCE” and “COMMONWEALTH FINANCIAL STRUCTURE AND PROCEDURES.”

The Bonds will be initially registered in the name of Cede & Co., as nominee for The Depository Trust Company, securities depository for the Bonds under a book-entry only registration system. See “THE BONDS — Book-Entry Only System” and Appendix D.

The Bonds are authorized investments for fiduciaries and personal representatives, as defined in the Probate, Estates and Fiduciaries Code within the Commonwealth; are legal investments for Pennsylvania banks, trust companies, bank and trust companies, savings banks, and insurance companies; and are acceptable as security for deposits of the funds of the Commonwealth. See “LEGALITY FOR INVESTMENT.”

Except where otherwise expressly noted, the financial and other information provided in this Official Statement is generally derived from the records of the Commonwealth. All financial information should be considered as unaudited unless otherwise specifically identified. All estimates and assumptions are based on the best information available to the Commonwealth but do not constitute factual information. All estimates of future performance or events constituting “forward-looking statements” may or may not be realized because of a wide variety of economic and other circumstances. Included in such forward-looking statements are numbers and other information from budgets for current and future fiscal years. The references to, and summaries of, constitutional and statutory provisions of the Commonwealth and to bond resolutions and other documents are qualified in their entirety by reference to the complete text of such documents and to any judicial interpretations thereof.

THE BONDS

Description of the Bonds

The Bonds will be dated their date of issuance and delivery, will bear interest from such date, at the rate per annum for each maturity as specified on the inside front cover page hereof. Such interest will be payable semi-annually on each January 15 and July 15, commencing January 15, 2017, calculated on the basis of a 360-day year of twelve 30-day months, and will mature in the amounts and on the dates as set forth on the inside cover page hereof.

The Resolutions (as defined in Appendix F attached hereto) and all provisions thereof are incorporated by reference in the text of the Bonds, including, without limitation, those provisions setting forth the conditions under which the Resolutions may be modified. The Bonds provide that each registered owner, Beneficial Owner, DTC Participant or Indirect Participant (as hereinafter defined) in DTC, by acceptance of a Bond (including receipt of a book-entry credit evidencing an interest therein), assents to all of such provisions as an explicit and material portion of the consideration running to the Commonwealth to induce it to adopt the Resolutions and to issue such Bonds.

*Preliminary, subject to change.

Copies of the Resolutions, including the full text of the forms of the Bonds, are on file at the designated office in Harrisburg, Pennsylvania of Manufacturers and Traders Trust Company (“Loan and Transfer Agent”).

Interest on the Bonds will be payable by check or draft mailed or other transfer made to the persons in whose names the Bonds shall be registered at the close of business on the first day (whether or not a business day) of the calendar month in which occurs each interest payment date (the “Record Date”). Any interest on any Bond not timely paid or duly provided for shall cease to be payable to the person who is the registered owner as of the regular Record Date, and shall be payable to the person who is the registered owner at the close of business on a special record date for the payment of such defaulted interest. A special record date shall be a date not more than fifteen nor less than ten days prior to the date of the proposed payment and shall be fixed by the Loan and Transfer Agent whenever moneys become available for payment of the defaulted interest. Notice of a special record date shall be given to registered owners of the Bonds not less than fifteen days prior thereto.

Whenever the due date for payment of interest on or principal of the Bonds or the date fixed for redemption of any Bond shall be a Saturday, a Sunday, a legal holiday or a day on which banks in the Commonwealth are required or authorized by law (including by executive order) to close, then payment of such interest, principal or redemption price need not be made on such date, but may be made on the next succeeding day which is not a Saturday, a Sunday, a legal holiday, or a day upon which banks in the Commonwealth are required or authorized by law (including by executive order) to close, with the same force and effect as if made on the due date for such payment of principal, interest or redemption price, and no interest shall accrue thereon for any period after such due date.

Book-Entry Only System

The Depository Trust Company, New York, New York (“DTC”) will act as securities depository for the Bonds pursuant to a book-entry only system. Information regarding DTC and its book-entry system, provided by DTC, appears as Appendix D. Such information has been provided by DTC, and the Commonwealth does not assume any responsibility for the accuracy or completeness of such information. The Commonwealth may decide to discontinue use of the system of book-entry transfers through DTC (or another securities depository). In that event, Bond certificates will be printed and delivered.

For so long as the Bonds are registered in the name of DTC, or its nominee Cede & Co., the Commonwealth and the Loan and Transfer Agent will treat Cede & Co. as the registered owner of the Bonds for all purposes, including payments, notices and voting.

Neither the Commonwealth nor the Loan and Transfer Agent shall have any responsibility or obligation to any Direct or Indirect Participant or Beneficial Owner (as defined in Appendix D) with respect to (i) the accuracy of any records maintained by DTC or any Direct or Indirect Participant with respect to any beneficial ownership interest in any Bonds; (ii) the payment by any Direct or Indirect Participant of any amount due to any Beneficial Owner in respect of the principal of, premium, if any, and interest on the Bonds; (iii) the delivery or timeliness of delivery by any Direct or Indirect Participant of any notice to any Beneficial Owner with respect to the Bonds, including, without limitation, any notice of redemption; or (iv) other action taken by DTC or Cede & Co., including the effectiveness of any action taken pursuant to an Omnibus Proxy.

Payments made by or on behalf of the Commonwealth to DTC or its nominee shall satisfy the Commonwealth’s payment obligations with respect to the Bonds to the extent of such payments.

REDEMPTION

Optional Redemption

The Bonds, or portions thereof in integral multiples of \$5,000, maturing on and after January 15, 2028 are subject to redemption at the option of the Commonwealth prior to scheduled maturity on and after January 15, 2027, as a whole or in part (and if in part, within one or more maturities) at any time and from time to time, in any order of maturity determined by the Commonwealth and by lot within a maturity in such manner as the Commonwealth in its discretion may determine, on at least 30 days (but not more than 60 days) notice, at a redemption price equal to par (100% of stated principal amount) plus accrued interest to the date fixed for redemption.

Mandatory Sinking Fund Redemption*

The Bonds maturing on January 15, _____ are subject to mandatory sinking fund redemption prior to maturity, as drawn by lot by the Loan and Transfer Agent, in the following years at a redemption price equal to 100% of the principal amounts set forth in the table below.

Bonds Maturing January 15, _____	
<u>Year</u> <u>(January 15)</u>	<u>Principal Amount</u>
	\$
	*

* Final maturity.

The principal amount of the Bonds to be redeemed on each mandatory sinking fund redemption date may be reduced by the principal amount of Bonds theretofore redeemed (otherwise than by mandatory sinking fund redemption) or delivered to the Loan and Transfer Agent for cancellation, and not theretofore applied as a credit against any mandatory sinking fund redemption obligation. Any such reduction will be applied as a credit against the mandatory sinking fund redemption obligation for the year or years selected by the Commonwealth.

Notice of Redemption

As long as the Bonds are registered pursuant to a book-entry only system, notice of redemption will be given, as required by DTC’s (or any successor depository’s) procedures, to DTC, its nominee, or successor securities depository, as registered owner of the Bonds. So long as Cede & Co. is the registered owner of the Bonds, the Commonwealth will not be responsible for mailing notices of redemption to anyone other than DTC or its nominee.

Notice of redemption shall be given by the Loan and Transfer Agent via first-class mail not less than 30 days, nor more than 60 days, prior to the date fixed for redemption to the persons in whose names the Bonds to be redeemed are registered at the close of business on the fifth (5th) business day prior to such mailings; provided, however, that any defect in the notice or in the mailing thereof with respect to any registered owner shall not affect the validity of the proceedings for such redemption as to any other registered owner. Deposit of any such notice in the United States mail shall constitute constructive receipt of such notice by the registered owner to whom such notice is sent. Notice having been given as aforesaid and provision having been made for redemption from funds on deposit with the Loan and Transfer Agent, no interest on the Bonds, or portions thereof, called for redemption shall accrue after the date fixed for redemption, and the registered holders of the Bonds, or portions thereof, called for redemption shall thereafter have no further right except to receive payment of the redemption price plus accrued interest to the redemption date.

In addition to the notice of redemption to the registered owners of the Bonds, the Loan and Transfer Agent shall cause copies of the original redemption notice to be sent by facsimile transmission, overnight delivery or certified mail with return receipt requested (or other similar means that can provide evidence of receipt) to all registered securities depositories then in the business of holding obligations similar to the Bonds, and to two or more national information services that disseminate redemption information; provided however, that failure to send such copies of the original redemption notice or any defect therein shall not affect the validity of the redemption proceedings.

SECURITY AND SOURCE OF PAYMENT FOR BONDS

The Bonds are direct and general obligations of the Commonwealth to which the full faith and credit of the Commonwealth have been pledged for the payment of the interest thereon as it becomes due and the payment of the principal thereof at maturity or prior redemption. The various acts authorizing the incurrence of debt by the Commonwealth require the General Assembly to appropriate annually the moneys necessary to pay such interest and principal for which other provisions are not made. See the statutes described in the subsection “Authorization” below. Principal of and interest payments on the Bonds will be made from the General Fund.

The Constitution of the Commonwealth of Pennsylvania (the “Constitution”) places a claim on certain revenues of the Commonwealth for the payment of principal of and interest on all debt of the Commonwealth. Article VIII, Section 7(d) of the Constitution provides that, if sufficient funds are not appropriated for the timely payment of the interest on and principal of all Commonwealth debt, the State Treasurer shall set apart from the first revenues thereafter received applicable to the appropriate fund, a sum sufficient to pay such interest and principal, and shall so apply the money so set apart.

The State Treasurer may be required to set aside and apply such revenues at the suit of any holder of Commonwealth obligations.

For a description of the constitutional provisions relating to the Bonds, see Appendix E. The proposed form of the opinion of the Office of Attorney General is set forth in Appendix F and the proposed form of the opinion of Co-Bond Counsel is set forth in Appendix G.

Authorization

The Bonds are authorized and issued pursuant to and in full compliance with the provisions, restrictions and limitations of Section 7 of Article VIII of the Constitution; the laws of the Commonwealth, including but not limited to the Capital Facilities Debt Enabling Act, Act No. 1999-1, approved February 9, 1999, as amended by: Act No. 2002-130, approved October 28, 2002; Act No. 2003-49, approved December 23, 2003; Act No. 2004-67, approved July 4, 2004; Act No. 2005-87, approved December 22, 2005; Act No. 2008-48, approved July 4, 2008; Act No. 2010-48, approved July 7, 2010; Act No. 2013-77, approved October 25, 2013 (as so amended, the “Capital Facilities Debt Enabling Act”); Act No. 2004-10, approved February 12, 2004 (the “Water and Wastewater Treatment Project Bond Act”), and, annual capital budget bills and various bond authorization bills enacted by the General Assembly.

Debt Limits

The Constitution (Article VIII, Section 7(a)) permits debt to be incurred (i) for purposes itemized in law and approved by voter referendum, (ii) without approval of the electorate for the rehabilitation of areas affected by man-made or natural disasters, and (iii) without approval of the electorate for capital facilities projects specifically itemized in a capital budget if such debt does not cause the amount of all net debt outstanding (as defined for purposes of that Section) to exceed one and three quarters times (1.75x) the average of the annual tax revenues of the Commonwealth deposited in all funds in the previous five fiscal years, as certified by the Auditor General (the “Constitutional Debt Limit”). The most recent semi-annual computation of the Constitutional Debt Limit and the amount of net debt outstanding subject to such limit are shown in Table 1 below:

Table 1
Constitutional Debt Limit^(a)
August 31, 2016
(In Millions)

Average Annual Tax Revenues FYs ended June 30, 2012-2016..	\$ 37,326.6
Times 1.75.....	65,321.6
Less: Net Debt Outstanding ^(b)	<u>10,427.9</u>
Debt Issuable Within Limit	<u>\$ 54,893.7</u>

^(a) As certified by the Auditor General on August 31, 2016 (Appendix A).

^(b) After credit for refunded debt.

USE OF PROCEEDS

The Commonwealth is issuing the Bonds for the following purposes:

- (i) The proceeds of the Bonds will be used to refund prior issues of bonds of the Commonwealth. See “Plan of Refunding” herein; and
- (ii) to pay all or a portion of the costs of issuance for the Bonds.

Plan of Refunding

The Refunded Bonds* are as follows:

<u>Principal Amount to be Refunded</u>	<u>Designated Name</u>	<u>Issue Date</u>	<u>Bonds Maturing On</u>	<u>Date of Redemption</u>
\$42,300,000	“Second Series of 2006”	December 21, 2006	March 1, 2022	March 1, 2017
\$106,870,000	“First Refunding Series of 2006”	December 21, 2006	September 1, 2019-2021	January 18, 2017
\$5,610,000	“First Series B of 2007”	June 7, 2007	November 1, 2017, 2018, 2020, 2021	November 1, 2017
\$3,660,000	“Second Series B of 2007”	December 20, 2007	August 1, 2018, 2020, 2021	August 1, 2017
\$59,385,000	“First Series of 2008”	June 5, 2008	May 15, 2018, 2023, 2028	May 15, 2018
\$74,470,000	“Second Series of 2008”	December 18, 2008	February 15, 2018-2022	February 15, 2019
\$147,145,000	“First Series of 2009”	March 19, 2009	March 15, 2020-2024, 2027-2029	March 15, 2019
\$197,315,000	“Second Series of 2009”	June 2, 2009	April 15, 2021-2025, 2027, 2028	April 15, 2019
\$520,000	“Third Series C of 2010”	December 23, 2010	July 15, 2017	July 15, 2017

The refunding of the Refunded Bonds to be advanced refunded will be accomplished by applying a portion of the proceeds from the sale of the Bonds to the purchase of certain direct obligations of the U.S. Government to be held in escrow (the “Escrow Obligations”) together with a cash deposit, in an aggregate principal amount which at all times shall be sufficient, together with the interest to accrue thereon, to pay the principal of such Refunded Bonds, the redemption premium, if any, and the interest due and to become due thereon before and on the respective redemption dates as shown above (the “Required Deposit”). Such Escrow Obligations will be deposited with the State Treasurer of the Commonwealth of Pennsylvania, to be applied solely to the payment of the principal and interest on such Refunded Bonds on the redemption dates shown above. Initially, the Escrow Obligations are expected to consist of United States Treasury obligations. Applicable law and the Resolutions permit the State Treasurer to substitute new Escrow Obligations meeting the requirements of the Required Deposit at the time of any such substitution upon fulfillment of certain conditions, including the receipt of an opinion of Bond Counsel and certain certifications. The refunding of the Refunded Bonds will occur as described above only if the Bonds are issued.

The Commonwealth will send out required notices of redemption as provided in the documentation relating to the Refunded Bonds, as appropriate, and holders of the Refunded Bonds should rely solely on such redemption notices.

COMMONWEALTH GOVERNMENT

The Commonwealth is organized into three separate branches of government — executive, legislative and judicial — as defined in the Pennsylvania Constitution. Five officials of the Commonwealth’s executive branch are elected in statewide elections for four-year terms expiring on the dates shown below.

<u>Name</u>	<u>Office</u>	<u>Term Expires</u>
Tom Wolf	Governor	January 15, 2019
Mike Stack	Lieutenant Governor	January 15, 2019
Bruce R. Beemer	Attorney General	January 17, 2017
Timothy Reese	State Treasurer	January 17, 2017
Eugene A. DePasquale	Auditor General	January 17, 2017

On November 8, 2016, Josh Shapiro and Joseph Torsella won the general election for Attorney General and Treasurer, respectively. Eugene A. DePasquale won re-election for Auditor General.

Commonwealth Employees

Employees are permitted to organize and bargain collectively. As of July 1, 2016, 81.5 percent of full-time salaried employees under the Governor’s jurisdiction were covered by collective bargaining agreements or memoranda of understanding, with approximately 41 percent of state employees represented by the American Federation of State, County and Municipal Employees (AFSCME). Approximately 60 percent of these state employees were covered by one-year contracts which expired on June 30, 2016. As of the date of this Preliminary Official Statement, the Commonwealth has reached tentative agreements with AFSCME and the majority of the other unions having expired pacts on three-year contracts running from July 1, 2016 through June 30, 2019. Said pacts provide general pay increases totaling 7.25% over the term of the contracts while concurrently requiring employees to assume a greater

*Preliminary, subject to change.

contribution toward their health care. The Commonwealth seeks similar terms in its negotiations with other unions whose contracts/memoranda expired on June 30, 2016.

Interest arbitration awards typically dictate the salary increase to be provided to employees covered by five public safety unions who possess the right to have a neutral arbitrator decide the terms of a contract upon reaching negotiation impasse. The Commonwealth is currently awaiting an interest arbitration award, and is in the process of concluding hearings for another, that will dictate the terms of successor contracts for two of these Act 111 (defined below)-covered unions (the PA State Rangers Association and the PA Capitol Police - FOP Lodge 85) whose contracts expired on June 30, 2015. Act 111 of 1968 (“Act 111”) provides binding arbitration for police and firefighters in lieu of their being able to strike. A tentative agreement for a one-year contract has been reached with another Act 111-covered public safety union, the PA Wildlife Conservation Officers - FOP Lodge 114, whose contract expired on June 30, 2016. Said tentative agreement was reached prior to interest arbitration and it provides a 2.25% longevity increase. The remaining two interest arbitration units have contracts which expire on June 30, 2017. One of these units, the PA State Corrections Officers Association, was awarded a three year contract that commenced on July 1, 2014 and provides for 8% in general pay increases over the term of the contract. The other unit, the PA State Troopers Association, was awarded a five year contract that commenced on July 1, 2012, and provides for general pay increases totaling 11% over the term of the contract.

Table 4
Filled Salaried Positions and Employees
Under the Governor’s Jurisdiction^(a)
2011-2015

As of July 1	Total Full and Part Time Filled Salaried Positions	Total Full Time Salaried Employees	Civil Service Salaried Positions	Civil Service As a % of Total Filled Salaried Positions
2011	74,086	73,874	50,991	68.8
2012	75,540	74,336	51,226	68.7
2013	72,768	72,574	49,898	68.6
2014	72,650	72,347	49,619	68.5
2015	72,830	72,622	49,746	68.5

^(a) Excludes employees of the legislative and judicial branches, the Department of the Auditor General, the Treasury Department, the State System of Higher Education and independent agencies, boards and commissions.
Source: Office of Administration, 2016 State Government Workforce Statistics.

COMMONWEALTH FINANCIAL STRUCTURE AND PROCEDURES

The Pennsylvania Constitution and the laws of the Commonwealth require all payments from the State Treasury, with the exception of refunds of taxes, licenses, fees and other charges, to be made only by duly enacted appropriations. Amounts appropriated from a fund may not exceed its actual and estimated revenues for the fiscal year plus any unappropriated surplus available. Appropriations from the principal operating funds of the Commonwealth (the General Fund, the Motor License Fund and the State Lottery Fund) are generally made for one fiscal year and are returned to the unappropriated surplus of the fund (a lapse) if not spent or encumbered by the end of the fiscal year. The Commonwealth’s fiscal year begins July 1 and ends June 30. (Fiscal year 2016 refers to the fiscal year ended June 30, 2016.) See Appendix C for a further description of the fiscal administration of the Commonwealth.

Description of Funds

The Commonwealth utilizes the fund method of accounting. For purposes of governmental accounting, a “fund” is defined as an independent fiscal and accounting entity with a self-balancing set of accounts. Each fund records the cash and/or other resources together with all related liabilities and equities that are segregated for the purpose of the fund. In the Commonwealth, funds are established by legislative enactment or in certain limited cases by administrative action. Over 150 funds have been established and currently exist for the purpose of recording the receipt and disbursement of moneys received by the Commonwealth. Annual budgets are adopted each fiscal year for the principal operating funds of the Commonwealth and several other special revenue funds. Expenditures and encumbrances against

these funds may be made only pursuant to appropriation measures enacted by the General Assembly and approved by the Governor.

The General Fund, the Commonwealth's largest operating fund, receives all tax revenues, non-tax revenues and federal grants and entitlements that are not specified by law to be deposited elsewhere. The majority of the Commonwealth's operating and administrative expenses are payable from the General Fund. Debt service on all bond indebtedness of the Commonwealth, except that issued for highway purposes or for the benefit of other special revenue funds, is payable from the General Fund.

The Motor License Fund receives all tax and fee revenues relating to motor fuels and vehicles. All revenues relating to motor fuels and vehicles are required by the Constitution to be used only for highway purposes. Most federal aid revenues designated for transportation programs and tax revenues relating to aviation fuels are also deposited in the Motor License Fund. Operating and administrative costs for the Department of Transportation and other Commonwealth departments conducting transportation related programs, including the highway patrol activities of the Pennsylvania State Police, are also paid from the Motor License Fund. Debt service on certain bonds issued by the Commonwealth for highway purposes is payable from the Motor License Fund.

Other special revenue funds have been established by law to receive specified revenues that are appropriated to departments, boards and/or commissions for payment of their operating and administrative costs. Such funds include the Game, Fish, Boat, Banking Department, Milk Marketing, State Farm Products Show, Environmental Stewardship, State Racing, and Tobacco Settlement Funds. Some of these special revenue funds are required to transfer excess revenues to the General Fund, and some receive funding, in addition to their specified revenues, through appropriations from the General Fund.

The Tobacco Settlement Fund is a special revenue fund established to receive tobacco litigation settlement payments paid to the Commonwealth. The Commonwealth is one of forty-six states that settled certain smoking-related litigation in a November 1998 master settlement agreement with participating tobacco product manufacturers (the "Tobacco MSA"). Under the Tobacco MSA, the Commonwealth is entitled to receive a portion of payments made pursuant to the Tobacco MSA by tobacco product manufacturers participating in the Tobacco MSA. Most revenues to the Tobacco Settlement Fund are subject to annual appropriation by the General Assembly and approval by the Governor.

The Budget Stabilization Reserve Fund is a special revenue fund designated to receive a statutorily determined portion of the budgetary basis fiscal year-end surplus of the General Fund, as was its predecessor fund, the Tax Stabilization Reserve Fund. The Budget Stabilization Reserve Fund was established in July 2002 after the Tax Stabilization Reserve Fund was abolished and its balance transferred to the General Fund for the 2002 fiscal year budget. The Budget Stabilization Reserve Fund is to be used for emergencies threatening the health, safety or welfare of citizens or during downturns in the economy that result in significant unanticipated revenue shortfalls not able to be addressed through the normal budget process. Assets of the Budget Stabilization Reserve Fund may be used upon recommendation by the Governor and an approving vote by two-thirds of the members of each house of the General Assembly. For GAAP (as defined below) reporting purposes, the Budget Stabilization Reserve Fund (previously designated the Tax Stabilization Reserve Fund) has been reported as a fund balance reservation in the General Fund (governmental fund category) since fiscal year 1999. Prior to that fiscal year, the Tax Stabilization Reserve Fund was reported, on a GAAP basis, as a designation of the General Fund unreserved fund balance. See "Budget Stabilization Reserve Fund and Tax Stabilization Reserve Fund" below.

The Commonwealth maintains trust and agency funds that are used to administer funds received pursuant to a specific bequest or as an agent for other governmental units or individuals.

Enterprise funds are maintained for departments or programs operated like private enterprises. Two of the largest of such funds are the State Stores Fund and the State Lottery Fund. The State Stores Fund is used for the receipts and disbursements of the Commonwealth's liquor store system. Sale and distribution of all liquor within Pennsylvania is a government enterprise. The State Lottery Fund is also an enterprise fund for the receipt of all revenues from lottery ticket sales and lottery licenses and fees. Its revenues, after payment of prizes and all other costs, are dedicated to paying the costs of programs benefiting the elderly and handicapped in Pennsylvania.

In addition, the Commonwealth maintains funds classified as working capital, bond, and sinking funds for other specified purposes.

Accounting Practices

Financial information for the principal operating funds of the Commonwealth is maintained on a budgetary basis of accounting. The Commonwealth also prepares annual financial statements in accordance with generally accepted accounting principles (“GAAP”). Annual financial statements prepared in accordance with GAAP are audited jointly by the Department of the Auditor General and an independent public accounting firm.

Budgetary Basis

A budgetary basis of accounting is used for ensuring compliance with the enacted operating budget and is governed by applicable statutes of the Commonwealth and by administrative procedures. The Constitution provides that operating budget appropriations shall not exceed the actual and estimated revenues and unappropriated surplus available in the fiscal year for which funds are appropriated. Annual budgets are enacted for the General Fund and certain special revenue funds that together represent the majority of expenditures of the Commonwealth. The annual budget classifies fund revenues as Commonwealth revenues, augmentations, federal revenues, or restricted receipts and revenues. Commonwealth revenues are revenues from taxes and from non-tax sources such as licenses and fee charges, penalties, interest, investment income and other miscellaneous sources. Augmentations consist of departmental and institutional billings that supplement an appropriation of Commonwealth revenues, thereby increasing authorized spending. For example, patient billings for services at Commonwealth-owned institutions are augmentations that supplement Commonwealth revenues appropriated to each institution for operating costs. Federal revenues are those federal aid receipts that pay for or reimburse the Commonwealth for funds disbursed for federally assisted programs. Restricted receipts and revenues are funds that are restricted to a specific use or uses by state law, administrative decision, or the provider of the funds. Only Commonwealth revenues and expenditures from these revenues are included in the computation made to determine whether an enacted budget is constitutionally balanced. Augmenting revenues and federal revenues are considered to be self-balancing with expenditures from their respective revenue sources.

The Commonwealth’s budgetary basis financial reports for its governmental funds are based on a modified cash basis of accounting as opposed to the modified accrual basis prescribed by GAAP. Under the Commonwealth’s budgetary basis of accounting, tax receipts, non-tax revenues, augmentations and all other receipts are recorded at the time cash is received. An adjustment is made at fiscal year-end to include accrued unrealized revenue; that is, revenues earned but not collected. Revenues accrued include estimated receipts from (i) sales and use, personal income, realty transfer, inheritance, cigarette, liquor, liquid fuel, fuels, and oil company franchise taxes, and interest earnings, and (ii) federal government commitments to the Commonwealth. Expenditures are recorded at the time payment requisitions and invoices are submitted to the Treasury Department for payment. Appropriated amounts are reserved for payment of contracts for the delivery of goods or services to the Commonwealth through an encumbrance process. Unencumbered appropriated funds are automatically lapsed at fiscal year-end and are available for re-appropriation. Estimated encumbrances are established at fiscal year-end to pay certain direct expenditures for salaries, wages, travel, and utility costs payable against current year appropriations but disbursed in the subsequent fiscal year. Recording of the applicable expenditure liquidates the encumbered amount. Over-estimates of fiscal year-end encumbrances are lapsed in the subsequent fiscal year and under-estimates are charged to a subsequent fiscal year appropriation. Appropriation encumbrances are shown on the Commonwealth’s balance sheet as a reservation of fund balance.

Other reservations of fund balance include (i) the unexpended balance of continuing appropriations (that is, appropriations that do not lapse at fiscal year-end), and (ii) requested appropriation supplements and deficiency appropriations. Revenues dedicated for specific purposes and remaining unexpended at the fiscal year-end are likewise reserved.

GAAP Financial Reporting

At fiscal year-end, budgetary basis fund financial information, both revenues and expenditures, is adjusted to reflect appropriate accruals for financial reporting in conformity with GAAP. The Commonwealth is not required to prepare GAAP financial statements and does not prepare them on an interim basis. GAAP fund financial reporting

requires a modified accrual basis of accounting for governmental funds, while proprietary and fiduciary funds are reported on the accrual basis of accounting.

Fund financial statements of the Commonwealth prepared under GAAP differ from those traditionally prepared on a budgetary basis for several reasons. Among other differences, the GAAP fund financial statements (i) generally recognize revenues when they become measurable and available rather than when cash is received, (ii) report expenditures when goods and services are received and a liability incurred rather than when cash is disbursed, (iii) include a combined balance sheet for the Commonwealth presented by GAAP fund type rather than by Commonwealth fund, and (iv) include activities of all funds in the reporting entity, including agencies and authorities usually considered as independent of the Commonwealth for budgetary purposes. Adjustments to budgetary basis revenues and expenditures required to conform to GAAP accounting generally require including (i) corporation, sales, and personal income tax accruals, (ii) tax refunds payable and tax credits, and (iii) expenditures incurred but not yet posted as expenditures or not covered by appropriations.

An independent public accounting firm and the Department of the Auditor General jointly audit the Commonwealth's annual GAAP basis financial statements. The Commonwealth's independent public accounting firm, CliftonLarsonAllen, LLP, has not been engaged to perform and has not performed, since the date of its report on the Commonwealth's Comprehensive Annual Financial Report (CAFR) for the fiscal year ended June 30, 2015, which is incorporated herein by reference, any procedures on the financial statements addressed in that report nor has it performed any other procedures specifically relating to this Official Statement. The audited Basic Financial Statements are a component of the Commonwealth's Comprehensive Annual Financial Report ("CAFR"). The CAFRs for recent fiscal years, including the fiscal year ended June 30, 2015, have been filed with the Municipal Securities Rulemaking Board via its Electronic Municipal Market Access system ("EMMA") and are available from EMMA (<http://www.emma.msrb.org>) and at the Budget & Financial Reports section of the Office of the Budget's web site - www.budget.state.pa.us - and such CAFRs are incorporated herein by reference.

Investment of Funds

The Treasury Department is responsible for the deposit and investment of most funds belonging to the Commonwealth, including the proceeds of the Commonwealth's bonds and the funds held for the payment of interest on and maturing principal of the Commonwealth's bonds. The Commonwealth's Fiscal Code contains statutory limitations on the investment of funds by the Treasury Department. The Board of Finance and Revenue, a three-member board of state officials chaired by the State Treasurer, is authorized to establish the aggregate amount of funds that may be invested in some of the various categories of permitted investments. The State Treasurer ultimately determines the asset allocation and selects the investments within the parameters of the law.

The Commonwealth's Fiscal Code permits investments in the following types of securities: (i) United States Treasury securities and United States Agency securities maturing within two years of issue; (ii) commercial paper issued by industrial, common carrier or finance companies rated "Prime One" or its equivalent; (iii) certificates of deposit of Pennsylvania-based commercial banks, savings banks or savings and loans; (iv) repurchase obligations secured by Federal obligations; (v) banker's acceptances written by domestic commercial banks with a Moody's Investors Service "AA" rating or the equivalent rating by Standard & Poor's Financial Services or Fitch's Rating Service; and (vi) other non-equity investments not to exceed ten percent of assets subject to a "prudent investor" test. The Treasury Department maintains additional investment restrictions contained in its Investment Policy Guidelines. A summary of the Investment Policy Guidelines and a report on investment activity and performance of funds invested by the Treasury Department are contained in a report periodically prepared and publicly distributed by the Treasury Department.

The State Treasurer has been legislatively authorized to invest Commonwealth moneys in securities under the "prudent investor" standard since June 1999. The common investment pool operated by the State Treasurer for the investment of operating funds of the Commonwealth maintains a portion of its investments in securities subject to this test. The legislative authorization to invest in such securities presently expires on December 31, 2019.

Budget Stabilization Reserve Fund

Balances in the Budget Stabilization Reserve Fund are to be used only when emergencies involving the health, safety or welfare of the residents of the Commonwealth or downturns in the economy resulting in significant unanticipated revenue shortfalls cannot be dealt with through the normal budget process. Funds in the Budget Stabilization Reserve Fund may be appropriated only upon the recommendation of the Governor and the approval of a separate appropriation bill by a vote of two-thirds of the members of both houses of the General Assembly. Any funds appropriated from the Budget Stabilization Reserve Fund that are not spent are returned to the Budget Stabilization Reserve Fund.

As of October 2016, the Budget Stabilization Reserve Fund had a balance of \$232,000. The fiscal year 2017 enacted budget again suspends the 25% transfers of the Commonwealth's unappropriated balance to the Budget Stabilization Reserve Fund for fiscal year 2017; such suspension has occurred in each of the fiscal years 2008 through 2017.

COMMONWEALTH FINANCIAL PERFORMANCE

Fiscal Year 2017 Enacted Budget

The Pennsylvania legislature approved the passage of a \$31.5 billion budget on July 1, 2016. The budget was sent to the Governor who did not sign or veto the bill, allowing it to become law on July 11, 2016. The fiscal year 2017 enacted budget increases spending by 4.7% over the 2016 budget. On July 13, 2016 the legislature approved, and the Governor signed into law, a \$1.3 billion revenue package which balances the fiscal year 2017 budget. The revenue package expands the state's sales tax to include digital downloads of music, books, games and other applications. The new budget also increases the tax on cigarettes by \$1.00 per pack. The fiscal year 2017 enacted budget did not include increases in personal income or sales taxes. The fiscal year 2017 budget increases spending for education by \$200 million in basic education, \$30 million for early childhood education, \$20 million for special education, \$10 million for early intervention and almost \$40 million for higher education. The budget also authorizes the full funding of the actuarially determined state contributions for the state public pension plans in fiscal year 2017. The fiscal year 2017 enacted budget can be viewed at the Governor's Budget Office website at: www.budget.state.pa.us.

Financial Statements Introduction

The most recent Commonwealth audited financial statements are available in the CAFR of the Commonwealth for the fiscal year ended June 30, 2015, which was issued on January 29, 2016 and was filed with EMMA on February 9, 2016. Copies of the CAFRs beginning with fiscal year 2005 through fiscal year 2015 issued by the Commonwealth are available from (i) the Secretary of the Budget, Attn: Mr. Mike Higgins, 555 Walnut Street, 9th Floor, Harrisburg, Pennsylvania 17101 (Telephone (717) 425-6736), and (ii) the Financial Reports section of the Office of the Budget's website at www.budget.state.pa.us, which CAFRs are incorporated herein by reference. The audited Basic Financial Statements for fiscal year 2015 included in the CAFR for fiscal year 2015 are incorporated herein by reference. This means that (i) the incorporated information is considered part of this Official Statement, and (ii) such information should be reviewed by prospective purchasers of the bonds of the Commonwealth as a part of their review of this entire Official Statement.

Government-Wide Financial Data (GAAP Basis)

Government-wide financial statements report financial position and results of activity for the Commonwealth as a whole. Government-wide statements do not report information fund-by-fund; rather, they reveal information for all governmental activities and all business-type activities in separate columns. In government-wide statements, for both governmental and business-type activities, the economic resources measurement focus and accrual basis of accounting are used, with revenues and expenses recognized when they occur, rather than when cash is received or paid. This treatment results in including in assets an estimate of the total amount of receivables due at fiscal year-end that are expected to be collected in the future. Capital assets are reported with acquisition or construction costs being reported when the assets are placed in service less accumulated depreciation. Reported liabilities include all liabilities, regardless of when payment is due, including bond principal, employee disability claims liability, and employee compensated absence liabilities.

Table 5 below presents condensed comparative financial statement information derived from the Commonwealth's government-wide June 30 Statements of Net Position for the fiscal years indicated and includes amounts for the "primary government" only.

Table 5
Government-wide Condensed Statement of Net Position
as of June 30, 2014 and 2015

(Amounts in millions)

	Governmental Activities		Business-Type Activities		Total Primary Government	
	2015	2014	2015	2014	2015	2014
Assets:						
Cash and investments.....	\$ 9,803	\$ 9,023	\$ 6,823	\$ 6,259	\$ 16,626	\$ 15,282
Capital assets (net).....	35,060	33,865	514	499	35,574	34,364
All other assets.....	9,605	8,163	1,714	1,792	11,319	9,955
Total assets.....	54,468	51,051	9,051	8,550	63,519	59,601
Total deferred outflows.....	1,009	175	47	2	1,056	177
Liabilities:						
Accounts payable.....	8,043	6,212	764	801	8,807	7,013
All other current liabilities.....	3,785	4,165	1,619	1,239	5,404	5,404
Bonds payable, non-current.....	12,219	12,264	3,844	4,230	16,063	16,494
All other long-term liabilities...	17,979	5,704	3,375	2,817	21,354	8,521
Total liabilities.....	42,026	28,345	9,602	9,087	51,628	37,432
Total deferred inflows.....	264	-	4	-	268	-
Net position:						
Net invested in capital assets....	29,178	28,345	505	489	29,683	28,834
Restricted.....	1,856	2,195	619	938	2,475	3,133
Deficit.....	(17,847)	(7,659)	(1,632)	(1,962)	(19,479)	(9,621)
Total net position.....	\$ 13,187	\$ 22,881	\$ (508)	\$ (535)	\$ 12,679	\$ 22,346

Source: Comprehensive Annual Financial Report, fiscal year ended June 30, 2015 (GAAP).

The Commonwealth was required to implement GASB Statement No. 68 and GASB Statement No. 71, related to accounting and financial reporting for pensions by June 30, 2015. These standards require that the full effect of the unfunded pension liability be recognized on the financial statements, as well as a recognition of pension related deferred inflows and outflows. It is important to note that while the standards change the way the Commonwealth reports pension related items, these pension liabilities and deferred items existed prior to the implementation of the new standards. The new standards change the way these items are now reported in the financial statements. During the fiscal year ended June 30, 2015, the reported overall financial position (net position) of the Commonwealth's primary government, including both governmental and business-type activities, decreased \$9,667 million. This decline in the net position of the primary government is due to a decrease of \$9,694 million in Governmental Activities total net position that is primarily a result of the implementation of GASB Statements No. 68 and No. 71, which require the reporting of long-term net pension liabilities and pension related deferred inflows and outflows. This implementation resulted in a \$10,623 million restatement decreasing net position. Aside from this restatement, Governmental Activities net position increased by \$929 million due primarily to increased tax and unclaimed property revenues offset by increased personnel and health and human services grant expenses.

An overall surplus in net position is reported for Governmental Activities; however, the majority of the surplus is related to net investment in capital assets which are unavailable to utilize in satisfying the Commonwealth's day-to-day expenses.

The changes required by the implementation of GASB Statements No. 68 and No. 72 related to accounting and financial reporting for pensions resulted in changes to reported deferred inflows, deferred outflows and other long-term liabilities. Governmental Activities deferred outflows of resources related to pensions increased \$1,008 million and deferred inflows of resources related to pensions increased \$113 million while all other long-term liabilities related to pensions increased \$12,007 million for fiscal year 2015. Business-Type Activities deferred outflows related to pensions increased \$43 million and deferred inflows related to pensions increased \$4 million while all other long-term liabilities related to pensions increased \$525 million.

Financial Data for Governmental Fund Types (GAAP Basis)

Governmental fund financial statements provide fund-specific information about the General Fund, the Motor License Fund, and for other Commonwealth funds categorized as Governmental funds and reported as such in the Basic Financial Statements of prior fiscal years. Where government-wide financial statements cover the entirety of the Commonwealth, fund financial statements provide a more detailed view of the major individual funds established by the Commonwealth. Fund financial statements further differ from government-wide statements in the use by the latter of the current financial resources measurement focus and the modified accrual basis of accounting.

The governmental funds balance sheet reports total fund balances for all governmental funds. Assets of the Commonwealth’s governmental funds (the General Fund, and the Motor License Fund are major governmental funds) as of June 30, 2015, were \$19,456.9 million. Liabilities for the same date totaled \$11,187.1 million and deferred inflows of resources totaled \$3,090.9 million resulting in a fund balance of \$5,178.8 million, an increase of \$1,162.0 million from the fund balance at June 30, 2014. On a fund specific basis, the fund balance for the General Fund increased by \$839.6 million, the fund balance for the Motor License Fund decreased by \$134.3 million and the fund balance for aggregated non-major funds increased by \$456.8 million. See “General Fund – Fiscal Year 2015 Financial Results” and “Motor License Fund – Fiscal Year 2015 Financial Results.”

To help understand the relationship between the Commonwealth’s GAAP fund balance (fund perspective) for governmental funds and the Commonwealth’s governmental net assets (government-wide perspective) under the presentation of financial information, the following reconciliation is presented in Table 6 below:

Table 6
Reconciliation of the Balance Sheet
Governmental Funds (Fund Perspective) to
the Statement of Net Position - Governmental Activities
June 30, 2015
(In Thousands)

Fund Balances - Governmental Funds	
General Fund.....	\$ 273,553
Motor License Fund.....	988,548
Nonmajor Funds.....	3,916,717
Total Fund Balance - Governmental Funds.....	\$ 5,178,818
Plus: Capital Assets, including infrastructure.....	\$ 58,213,675
Less: Accumulated depreciation.....	(23,206,270)
Plus: Deferred revenue.....	3,090,939
Plus: Deferred outflows of resources.....	(148,745)
Plus: Other miscellaneous adjustments.....	73,510
Plus: Net assets of internal service funds.....	42,037
Plus: Inventories.....	98,374
Less: Net pension liabilities.....	(11,071,990)
Less: Long-term liabilities.....	(19,083,814)
Total Net Position - Governmental Activities.....	\$ 13,186,534

Source: Comprehensive Annual Financial Report, fiscal year ended June 30, 2015.

More detailed information with respect to the General Fund and the Motor License Fund, major operating funds that are categorized as governmental funds, is presented in Table 7 below (General Fund) and in Table 9 (Motor License Fund).

The financial tables and the textual discussions that follow containing GAAP basis financial data are unaudited but are derived from the Commonwealth's audited financial statements for fiscal years 2011-2015 and unaudited data for fiscal year 2016. The discussion of financial performance on a budgetary basis for prior fiscal years is based on an analysis of budget numbers and not on numbers prepared in accordance with GAAP. Likewise, the discussion of the fiscal year 2017 enacted budget reflects a budgetary basis analysis rather than a GAAP basis analysis.

General Fund

Financial Results for Fiscal Years 2011-2015

The following five-year table presents information on a GAAP basis taken from the most recent CAFR.

GAAP Basis. During the five-year period from fiscal year 2011 through fiscal year 2015, total revenues and other sources increased by an average of 1.2 percent annually. Tax revenues during this same period increased by an annual average of 3.7 percent. Intergovernmental revenues have declined from the peak in 2011 as the phase-out of Federal ARRA grants occurred. Expenditures and other uses during the fiscal years 2011 through 2015 rose at an average annual rate of 1.3 percent. Expenditures for the protection of persons and property during this period increased at an average annual rate of 2.1 percent; public education expenditures during this period decreased at an average annual rate of 0.7 percent; health and human services expenditures increased at an average annual rate of 2.6 percent; and capital outlays decreased at an average annual rate of 9.8 percent. Commonwealth expenditures for direction and support services (state employees and government administration) declined at an average annual rate of 2.5 percent during the fiscal years 2011 through 2015. The fund balance at June 30, 2015, was \$273.6 million, an increase of \$839.6 million from the deficit balance at June 30, 2014 of \$566.0 million.

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Table 7 presents a summary of revenues, expenditures and fund balance (GAAP basis) for the General Fund, for the fiscal years 2011 through 2015.

Table 7
Results of Operations—General Fund
GAAP Basis—Unaudited
(In Thousands)

	Fiscal Year Ended June 30				
	2011	2012	2013	2014	2015
Fund Balance — Beginning of Period	\$ 284,803	\$ 1,621,435	\$ 1,259,295	\$ 1,566,010	\$ (566,038)
Restatements.....	280,420	-	(6,165)	(342)	-
Fund Balance — Beginning of Period, as Restated.....	\$ 565,223	\$ 1,621,435	\$ 1,253,130	\$ 1,565,668	\$ (566,038)
Revenues:					
Taxes.....	\$25,883,652	\$26,577,129	\$27,574,159	\$27,277,301	\$ 29,930,133
Licenses and fees.....	466,089	526,547	587,720	537,242	521,956
Intergovernmental.....	23,597,695	20,276,131	20,151,590	19,995,975	21,550,040
Charges for sales and services.....	1,438,536	1,449,895	1,451,899	1,494,040	2,458,961
Other revenues.....	228,079	353,198	408,449	247,894	66,314
Other Financing Sources:					
Operating transfers in.....	1,063,293	424,622	450,234	485,641	689,759
Bonds issued and bond premiums.....	-	51,847	-	-	-
Other additions.....	-	108,263	1,251	715	-
TOTAL REVENUES AND OTHER SOURCES..	\$52,677,344	\$49,767,632	\$50,625,302	\$50,038,808	\$ 55,217,163
Expenditures:					
Direction and supportive services.....	\$ 837,264	\$ 942,668	\$ 888,592	\$ 901,917	\$ 756,400
Protection of persons and property.....	4,161,954	4,035,121	4,343,958	4,423,816	4,536,112
Health and human services.....	29,861,234	30,030,822	29,766,550	31,250,318	33,071,003
Public education.....	14,197,883	12,735,771	13,226,745	13,482,539	13,784,265
Recreation and cultural enrichment.....	243,606	242,218	234,799	260,837	282,858
Economic development.....	962,010	744,342	473,059	458,631	444,701
Transportation.....	48,003	42,962	14,396	52,672	44,143
Capital outlay.....	285,910	232,622	123,486	103,579	189,383
Debt service.....	-	26,325	25,479	25,108	44,272
Other Uses:					
Operating transfers out.....	1,023,268	1,096,921	1,215,358	1,211,097	1,224,435
TOTAL EXPENDITURES AND OTHER USES	\$51,621,132	\$50,129,772	\$50,312,422	\$52,170,514	\$ 54,377,572
REVENUES AND OTHER SOURCES OVER (UNDER) EXPENDITURE AND OTHER USES	1,056,212	(362,140)	312,880	(2,131,706)	839,591
Fund Balance — End of Period	\$ 1,621,435	\$ 1,259,295	\$ 1,566,010	\$ (566,038)	\$ 273,553
Components of Fund Balance					
Nonspendable.....	\$ 123,156	\$ 240,975	\$ 223,930	\$ 265,403	\$ 247,216
Restricted.....	756,141	-	76	45	36
Committed.....	1,063,613	1,276,671	1,334,872	1,119,470	1,289,298
Assigned.....	-	-	7,132	-	-
Unassigned deficit.....	(321,475)	(258,351)	-	(1,950,956)	(1,262,997)
TOTAL FUND BALANCE.....	\$ 1,621,435	\$ 1,259,295	\$ 1,566,010	\$ (566,038)	\$ 273,553

Source: Compiled from Office of the Budget, Comprehensive Annual Financial Reports for fiscal years ended June 30, 2011 through 2015.

Fiscal Year 2014 Financial Results

GAAP Basis. At June 30, 2014, the General Fund reported a fund balance deficit of \$566.0 million, a decrease to fund balance of \$2,131.7 million from the restated \$1,565.7 million fund balance at June 30, 2013 as expenditures and other uses increased by \$1,858.1 million and revenues and other sources declined by \$586.5 million.

Total revenues decreased by \$622 million attributable to a decrease in corporate tax revenues as a result of the implementation of a new corporate tax system, decreased intergovernmental revenue related to lower federal grant revenues and a decrease in other income. Total General Fund expenditures increased \$1,862 million. Health and human services increased \$1,483 million and was due primarily to the expansion of contracts with managed care organizations and counties to provide health care services to medical assistance recipients. Increased expenditures for education occurred primarily with respect to increases in basic education funding and state contributions for school employee pension costs. Protection of persons and property programs experienced an increase largely due to an increase in the Commonwealth's employers' share of retirement contributions. This increase was offset by a decrease in contracted services within corrections programs and federally funded grant programs, particularly in emergency management services and environmental protection programs.

Budgetary Basis. General Fund revenues of the Commonwealth were below the certified estimate by \$508.7 million or 1.7 percent during fiscal year 2014. Final Commonwealth General Fund revenues for the fiscal year totaled \$28,607.1 million. Total fiscal year 2014 revenues, net of reserves for tax refunds and including public health and human services assessments, totaled \$28,265.2 million. Total expenditures, net of appropriation lapses and including public health and human services assessments and expenditures from additional sources, were \$29,158.1 million. After accounting for a positive fiscal year 2014 beginning balance of \$546.9 million, the Commonwealth ended fiscal year 2014 with an unappropriated surplus balance of \$80.6 million. (See "Table 8").

General Fund revenues decreased \$39.7 million or 0.1 percent during fiscal year 2014 when measured on a year-over-year basis as compared to fiscal year 2013. Tax revenue collections increased \$30.9 million or 0.1 percent on a year-over-year basis from fiscal year 2013 to fiscal year 2014 while non-tax revenue collections decreased \$70.7 million or 12.2 percent from fiscal year 2013 to fiscal year 2014. Corporate tax receipts were \$291.3 million lower than fiscal year 2013 levels. The year-over-year decrease in corporate taxes was 5.6 percent during fiscal year 2014 as corporate net income tax collections increased 3.2 percent and financial institutions tax decreased 9.6 percent while collections from the capital stock and franchise tax decreased 46.8 percent on a year-over-year basis. Personal income taxes were \$66 million above fiscal year 2013 actual collection and the year-over-year growth in personal income tax receipts was 0.6 percent. Personal income tax collections attributable to withholding increased by 2.6 percent or \$220.9 million during fiscal year 2014 and tax collections from the non-withholding portion of the personal income tax decreased 5.4 percent or \$154.8 million on a year-over-year basis. Sales and use tax receipts were \$235.9 million greater during fiscal year 2014 than during the prior fiscal year, a growth rate of 2.7 percent. Sales tax collections increased during fiscal year 2014 as non-motor vehicle sales tax collections grew 2.1 percent and motor vehicle sales tax receipts increased 6 percent during fiscal year 2014. Cigarette tax collections declined 4.6 percent during fiscal year 2014 and inheritance tax collections grew 3.8 percent. Realty transfer tax revenues grew 10.8 percent during fiscal year 2014. Non-tax revenues of the Commonwealth decreased 12.2 percent during fiscal year 2014.

Commonwealth General Fund appropriations for fiscal year 2014 totaled \$28,395.0 million, an increase of \$678.1 million or 2.4 percent from fiscal year 2013 levels. The ending unappropriated balance was \$80.6 million for fiscal year 2014. Again in June 2014, the statutory transfer of 25 percent of the Commonwealth's unappropriated balance into the Budget Stabilization Reserve Fund was suspended for one year.

Fiscal Year 2015 Financial Results

GAAP Basis. At June 30, 2015, the General Fund reported a fund balance of \$273.6 million, an increase to fund balance of \$839.6 million from the \$566.0 million fund balance deficit at June 30, 2014 as expenditures and other uses increased by \$2,207.1 million and revenues and other sources increased by \$5,178.4 million.

Tax revenues increased by \$2,652.8 million primarily due to changes in the associated methodologies for the accrual approach used for personal and corporate income taxes, and sales and use taxes. A portion of the increased tax revenues was also attributable to increased collection efforts and inheritance tax revenues. Total General Fund expenditures and other uses increased \$2,207.1 million. Health and human services increased \$1,820.7 million and was due primarily to increased expenditures for the Medical Assistance program of the Department of Human Services. Expenditures for education increased \$301.7 million and occurred primarily due to ready-to-learn block grants and state contributions for school employee pension costs. Protection of persons and property programs experienced an increase largely due to an increase in the Commonwealth's employers' share of retirement contributions. This increase was

offset by a decrease in federally funded grant programs administered by the Pennsylvania Emergency Management Agency and the Department of Insurance.

Budgetary Basis. General Fund revenues of the Commonwealth were above the certified estimate by \$411.9 million or 1.4 percent during fiscal year 2015. Final Commonwealth General Fund revenues for the fiscal year totaled \$30,592.5 million. Total fiscal year 2015 revenues, net of reserves for tax refunds and including public health and human services assessments, totaled \$30,136.2 million. Total expenditures, net of appropriation lapses and including public health and human services assessments and expenditures from additional sources, were \$30,036.5 million. After accounting for a positive fiscal year 2015 beginning balance of \$83.7 million, the Commonwealth ended fiscal year 2015 with an unappropriated surplus balance of \$274.5 million. (See “Table 8”).

General Fund revenues increased \$1,985 million or 6.9 percent during fiscal year 2015 when measured on a year-over-year basis as compared to fiscal year 2014. Tax revenue collections increased \$1,394.2 million or 5.0 percent on a year-over-year basis from fiscal year 2014 to fiscal year 2015 while non-tax revenue collections increased \$591.1 million or 116.1 percent from fiscal year 2014 to fiscal year 2015. Corporate tax receipts were \$218.5 million higher than fiscal year 2014 levels. The year-over-year increase in corporate taxes was 4.5 percent during fiscal year 2015 as corporate net income tax collections increased 12.4 percent and financial institutions tax decreased 7.5 percent. Personal income taxes were \$670.1 million above fiscal year 2014 actual collection and the year-over-year growth in personal income tax receipts was 5.9 percent. Personal income tax collections attributable to withholding increased by 3.8 percent or \$327.9 million during fiscal year 2015 and tax collections from the non-withholding portion of the personal income tax increased 12.7 percent or \$342.2 million on a year-over-year basis. Sales and use tax receipts were \$363.5 million greater during fiscal year 2015 than during the prior fiscal year, a growth rate of 4.0 percent. Sales tax collections increased during fiscal year 2015 as non-motor vehicle sales tax collections grew 3.5 percent and motor vehicle sales tax receipts increased 7.2 percent during fiscal year 2015. Cigarette tax collections declined 5.1 percent during fiscal year 2015 and inheritance tax collections grew 14.2 percent. Realty transfer tax revenues grew 10.2 percent during fiscal year 2015.

Commonwealth General Fund appropriations for fiscal year 2015 totaled \$30,036.5 million, an increase of \$878.4 million or 3.0 percent from fiscal year 2014 levels. The ending unappropriated balance was \$83.7 million for fiscal year 2015. Again in June 2015, the statutory transfer of 25 percent of the Commonwealth’s unappropriated balance into the Budget Stabilization Reserve Fund was suspended for one year.

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The following budgetary basis information is derived from the Commonwealth's unaudited budgetary basis financial statements and enacted fiscal year 2017 budget.

Table 8
Sources, Uses and Changes in Unappropriated Balance
General Fund and Other Funding Sources – Unaudited Budgetary Basis
Commonwealth Revenues Only

	(In Thousands)		
	Actual Fiscal Year 2015	Actual Fiscal Year 2016	Enacted Budget Fiscal Year 2017
Sources:			
Beginning Balance (Plus Adjustments).....	\$ 83,745	\$ 256,622	\$ 1,991
Revenue Receipts.....	30,592,501	30,901,581	32,776,400
Refunds.....	(1,340,000)	(1,250,000)	(1,300,000)
Prior Year Lapses.....	90,974	220,953	57,400
Funds Available.....	\$ 30,310,939	\$ 30,129,156	\$ 31,535,791
Uses:			
Appropriations.....	\$ 29,027,839	\$ 30,023,825	\$ 31,533,732
Supplemental Appropriations.....	163,783	103,341	0
Current Year Lapses.....	(38,859)	(1)	0
Total Expenditures.....	\$ 30,036,482	\$ 30,127,165	\$ 31,533,732
Preliminary Balance.....	\$ 274,457	\$ 1,991	\$ 2,059
Transfer to Budget Stabilization Fund.....	0	0	0
Ending Unappropriated Balance.....	\$ 274,457	\$ 1,991	\$ 2,059

Notes: No transfer to Rainy Day Fund from 2014-15 and 2015-16. 2015-16 enacted expenditures from Act 10A of 2015 and Act 1 of 2016.

Fiscal Year 2016 Financial Results

Budgetary Basis. General Fund revenues of the Commonwealth were above the certified estimate by \$29.9 million or 0.1 percent during fiscal year 2016. Final Commonwealth General Fund revenues for the fiscal year totaled \$30,871.7 million. Total expenditures, net of appropriation lapses and including public health and human services assessments and expenditures from additional sources, were \$30,127.2 million. After accounting for a positive fiscal year 2016 beginning balance of \$256.6 million, the Commonwealth ended fiscal year 2016 with an unappropriated surplus balance of \$1.9 million. (See “Table 8”).

General Fund revenues increased \$309.1 million or 1.0 percent during fiscal year 2016 when measured on a year-over-year basis as compared to fiscal year 2015. Tax revenue collections increased \$765.5 million or 2.6 percent on a year-over-year basis from fiscal year 2015 to fiscal year 2016 while non-tax revenue collections decreased \$456.4 million or 41.5 percent from fiscal year 2015 to fiscal year 2016. Corporate tax receipts were \$20.9 million higher than fiscal year 2015 levels. The year-over-year increase in corporate taxes was 0.4 percent during fiscal year 2016 as corporate net income tax collections increased 1.1 percent and financial institutions tax increased 12.2 percent. Personal income taxes were \$398.6 million above fiscal year 2015 actual collection and the year-over-year growth in personal income tax receipts was 3.3 percent. Personal income tax collections attributable to withholding increased by 3.5 percent or \$319.3 million during fiscal year 2016 and tax collections from the non-withholding portion of the personal income tax increased 8.0 percent or \$131.4 million on a year-over-year basis. Sales and use taxes receipts were \$300.5 million greater during fiscal year 2016 than during the prior fiscal year, a growth rate of 2.8 percent. Sales tax collections increased during fiscal year 2016 as non-motor vehicle sales tax collections grew 3.4 percent and motor vehicle sales tax receipts increased 1.6 percent during fiscal year 2016. Cigarette tax collections declined 1.7 percent during fiscal year 2016 and inheritance tax collections decreased 4.0 percent. Realty transfer tax revenues grew 16.4 percent during fiscal year 2016.

Commonwealth General Fund appropriations for fiscal year 2016 totaled \$30,500.4 million, an increase of \$373.2 million or 1.2 percent from fiscal year 2015 levels. The ending unappropriated balance was \$1.9 million for fiscal year 2016. Again in June 2016, the statutory transfer of 25 percent of the Commonwealth's unappropriated balance into the Budget Stabilization Reserve Fund was suspended for one year.

Fiscal Year 2017 Enacted Budget

The enacted fiscal year 2017 budget provides appropriations and executive authorizations, net of lapses and other reductions, totaling \$31,533.7 million of Commonwealth funds against estimated revenues of \$31,535.7 million. Enacted General Fund appropriations represent an increase of \$1,509.9 million, or 5.0 percent on a year-over-year basis, from fiscal year 2016. The budget document and related information is available on the Governor's Budget Office web page at www.budget.state.pa.us.

General fund revenues from all sources are estimated to increase approximately \$1.8 billion or 6.1 percent on a year-over-year basis during fiscal year 2017. Corporate taxes are expected to grow marginally in fiscal year 2017. Year-over-year growth of tax revenue is expected to be approximately 5.0 percent. Non-tax revenue is expected to increase partially as a result of liquor store modernization. Corporate net income tax receipts are projected to grow almost 5.0 percent in fiscal year 2017 while capital stock and franchise tax revenues are forecast to decline as the phase out of this tax is almost complete. Gross receipt tax collections are forecast to decrease slightly at 1.3 percent reduction. Overall, corporation taxes from all sources are projected to increase slightly in fiscal year 2017. Sales and use tax receipts are estimated to grow 4.2 percent on a year-over-year basis and personal income tax receipts are forecast to grow 4.4 percent during fiscal year 2017.

The enacted fiscal year 2017 budget includes tax increases of \$1 per pack for cigarettes from the current rate of \$1.60 to \$2.60 starting August 1, 2016. The vendor sales tax discount has also changed effective August 20, 2016. The vendor discount is now capped at \$300 annually. Digital downloads and software maintenance are now taxable effective August 1, 2016.

The fiscal year 2017 enacted budget includes an increase of \$200 million in Basic Education funding, an increase of 3.5 percent over fiscal year 2016. Total Basic Education formula funding is \$5.9 billion for all school districts. In addition, \$30 million more is appropriated for early childhood programs, \$20 million for special education, \$10 million for early intervention programs, and nearly \$40 million for higher education.

Actual revenues to the General Fund through October 31, 2016 were approximately 2.0 percent below the fiscal year 2017 enacted budget estimate and General Fund collections totaled \$8.8 billion, which is \$182.46 million below the enacted budget estimate. Corporate tax revenue was \$30.0 million, or 3.7 percent below the enacted budget estimate while Personal Income tax revenue was \$60.9 million, or 1.7 percent below the enacted budget estimate. Expenditures through October 2016 were on track with enacted budget expectations.

The achievement of budgeted results may be adversely affected by a number of trends or events, including developments in the national and state economies. Deficits in the enacted budget can result from failures to timely receive projected revenues, inability to control or reduce expenses as projected, incurrence of unforeseen expenses, imposition of unforeseen obligations, whether of a legislative or litigation nature or resulting from a natural disaster, and a multitude of other causes. Cost cutting and revenue producing measures are less efficacious if imposed later in a fiscal year because of the shorter time period over which they will operate.

Motor License Fund

The Constitution requires all proceeds of motor fuels taxes, vehicle registration fees, license taxes, operators' license fees and other excise taxes imposed on products used in motor transportation to be used exclusively for construction, reconstruction, maintenance and repair of and safety on highways and bridges and for debt service on obligations incurred for these purposes. The Motor License Fund is the fund through which most such revenues are accounted for and expended. Portions of certain taxes whose receipts are deposited into the Motor License Fund are legislatively restricted to specific transportation programs. These receipts are accounted for in restricted accounts in the Motor License Fund and are not included in the budgetary basis presentations or discussions on the Motor License Fund. The Motor License Fund budgetary basis includes only unrestricted revenue available for annual appropriation

for highway and bridge purposes. In contrast, the GAAP basis presentations include all the restricted account revenues and expenditures.

Financial Results for Fiscal Years 2011-2015

The following five-year table presents information on a GAAP basis taken from the fiscal year 2015 CAFR.

GAAP Basis. The fund balance at June 30, 2015, of the Motor License Fund was \$988.5 million, a \$134.3 million (12 percent) decrease from the June 30, 2014 fund balance. Over the five fiscal years 2011 through 2015, revenues and other sources averaged an annual 4.1 percent increase. Expenditures and other uses during the same period averaged a 3.9 percent annual increase.

Overall, total revenues and other sources increased by \$501.3 million during the fiscal year ended June 30, 2015, a 9.3 percent increase from the prior fiscal year. Tax revenues increased \$668 million during fiscal year 2015 primarily due to passage of Act 89. Under Act 89, the average wholesale price of all taxable liquid fuels was raised to \$2.49 from \$1.87, effectively raising the gas tax per gallon by 9.8 cents and the diesel tax per gallon by 13.2 cents. The increase went into effect January 1, 2015. Licenses and fees revenues increased \$85.6 million as most Title 75 fees increased in relating to the rate of inflation per Act 89. Previously increased in 1997, fees for heavy trucks, motor coaches, limousines and school busses were increased in fiscal year 2015 and are to continue to increase incrementally through fiscal year 2018 matching the rate of inflation. Intragovernmental revenues decreased \$163.1 million primarily due to passage of Act 89. Act 89 substantially amended the Pennsylvania Turnpike Commission's funding obligations to the Motor License Fund under Act No. 2007-44, approved July 18, 2007 ("Act 44"). Funding of \$200 million from the Commission previously allocated to the Motor License Fund is now allocated to support transit capital, operating, multi-modal and other non-highway programs funded through other Commonwealth funds. Other revenues decreased \$89.0 million primarily due to a decrease in investment income. Act 89 reduced the disposition of certain fees previously deposited into the Motor License Fund.

Total expenditures and other uses increased by \$695.2 million during the fiscal year ended June 30, 2015; representing a 13.0 percent increase from the prior fiscal year. Protection for Persons and Property expenditures increased \$76.7 million primarily due to an increase in funding for reimbursements to the State Police relative to higher personnel costs. Also, Section 9106 of Title 75 increased the funding for improving and maintaining dirt, gravel and low-volume state and municipal roads. The Transportation expenditure increase of \$416.7 million and the Capital Outlay expenditure increase of \$195.3 million are primarily attributed to a current year increase of 16% in the allocation of taxes imposed under Section 9502 of Title 75 for highway capital projects, an additional \$145 million in bond funding pursuant to Section 46 of Act 89 and increased employee benefit costs.

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Table 9 below sets forth a condensed summary of revenues and expenditures (presented on a GAAP basis) for the Motor License Fund for the fiscal years 2011 through 2015.

Table 9
Results of Operations—Motor License Fund
GAAP Basis—Unaudited
(In Thousands)

	Fiscal Year Ended June 30				
	2011	2012	2013	2014	2015
Fund Balance — Beginning of Period	\$ 1,661,421	\$ 1,503,483	\$ 1,192,998	\$ 1,063,322	\$ 1,122,852
Revenues:					
Taxes.....	\$2,092,645	\$2,096,222	\$2,058,228	\$2,349,983	\$3,017,991
Licenses and fees.....	899,208	913,660	920,536	873,949	959,549
Intergovernmental.....	1,791,466	1,917,064	1,935,313	1,948,619	1,785,473
Other revenues.....	234,845	145,264	185,050	196,285	107,272
Other Financing Sources:					
Operating transfers in.....	-	-	37,327	21,092	20,978
Other additions.....	111	-	714	-	-
TOTAL REVENUES AND OTHER SOURCES..	\$ 5,018,275	\$ 5,072,210	\$ 5,137,168	\$ 5,389,928	\$ 5,891,263
Expenditures:					
Direction and supportive services.....	\$ 50,624	\$ 58,679	\$ 31,593	\$ 25,545	\$ 19,186
Protection of persons and property.....	669,213	707,229	743,349	781,151	857,850
Public education.....	689	595	459	316	164
Economic development.....	-	-	-	955	912
Recreation and cultural enrichment.....	3,421	3,855	901	1,677	4,827
Transportation.....	1,840,867	2,001,559	2,036,728	2,226,073	2,642,804
Capital outlay.....	2,548,674	2,542,787	2,384,372	2,228,241	2,423,556
Other Uses:					
Operating transfers out.....	62,725	67,991	69,442	66,440	76,268
TOTAL EXPENDITURES AND OTHER USES	\$ 5,176,213	\$ 5,382,695	\$ 5,266,844	\$ 5,330,398	\$ 6,025,567
REVENUES AND OTHER SOURCES OVER (UNDER) EXPENDITURE AND OTHER USES	(157,938)	(310,485)	(129,676)	59,530	(134,304)
Fund Balance — End of Period	\$ 1,503,483	\$ 1,192,998	\$ 1,063,322	\$ 1,122,852	\$ 988,548
Components of Fund Balance					
Restricted.....	1,503,483	1,192,998	1,063,322	1,122,852	988,548
TOTAL FUND BALANCE.....	\$ 1,503,483	\$ 1,192,998	\$ 1,063,322	\$ 1,122,852	\$ 988,548

Source: Compiled from Office of the Budget, Comprehensive Annual Financial Reports for fiscal years ended June 30, 2011 through 2015.

The following budgetary basis information is derived from the Commonwealth's unaudited budgetary basis financial statements and enacted fiscal year 2017 budget.

Fiscal Year 2014 Financial Results

Budgetary Basis. Commonwealth revenues to the Motor License Fund totaled \$2,446.8 million, an increase of \$30.5 million or 1.3 percent over fiscal year 2013 revenues. Receipts from liquid fuels taxes increased by 5.8 percent while license and fee revenue increased by 0.2 percent from the previous year. Other revenue receipts decreased by 14.0 percent over the previous fiscal year. Fiscal year 2014 Motor License Fund appropriations and executive authorizations totaled \$2,502.5 million, a decrease of 0.02 percent from fiscal year 2013. The Motor License Fund concluded fiscal year 2014 with an unappropriated surplus of \$105.6 million, a net decrease of 1.8 percent.

Fiscal Year 2015 Financial Results

Budgetary Basis. Commonwealth revenues to the Motor License Fund totaled \$2,611.5 million, an increase of \$164.7 million or 6.7 percent over fiscal year 2014 revenues. Receipts from liquid fuels taxes increased by 20.7 percent while license and fee revenue increased by 6.4 percent from the previous year. Other revenue receipts decreased by 62.0 percent over the previous fiscal year. Fiscal year 2015 Motor License Fund appropriations and executive

authorizations totaled \$2,614.7 million, an increase of 4.5 percent from fiscal year 2014. The Motor License Fund concluded fiscal year 2015 with an unappropriated surplus of \$130.3 million, a net increase of 23.4 percent.

Fiscal Year 2016 Financial Results

Budgetary Basis. Commonwealth revenues to the Motor License Fund totaled \$2,657.5 million, an increase of \$46.0 million or 1.8 percent over fiscal year 2015 revenues. Receipts from liquid fuels taxes increased by 6.2 percent while license and fee revenue increased by 1.2 percent from the previous year. Other revenue receipts decreased by 63.7 percent over the previous fiscal year. Fiscal year 2016 Motor License Fund appropriations and executive authorizations totaled \$2,609.2 million, an increase of 6.0 percent from fiscal year 2015. The Motor License Fund concluded fiscal year 2016 with an unappropriated surplus of \$40.1 million, a net decrease of 69.3 percent.

Fiscal Year 2017 Enacted Budget

Commonwealth revenues to the Motor License Fund are budgeted to be \$2,751.0 million, an increase of \$93.5 million or 3.5 percent over fiscal year 2016 revenues. Receipts from liquid fuels tax are budgeted to rise 4.3 percent over the prior year while license and fee revenues are budgeted to increase by 3.0 percent. Additionally, other revenue receipts are budgeted to decrease by 22.6 percent. Fiscal year 2017 Motor License Fund appropriations and executive authorizations, net of anticipated lapses, are budgeted to equal \$2,773.8 million, an increase of 0.25 percent from fiscal year 2016 appropriations less lapses. The Motor License Fund is budgeted to conclude fiscal year 2017 with an unappropriated balance of \$17.3 million, a reduction from the fiscal year 2016 unappropriated fund balance of \$40.1 million.

State Lottery Fund

The Commonwealth operates a statewide lottery program that consists of various lottery games using computer sales terminals located throughout the state, and instant games using preprinted tickets. The net proceeds of all lottery game sales, less sales commissions and directly paid prizes, are deposited into the State Lottery Fund.

State Lottery Fund receipts support programs to assist elderly and handicapped individuals, primarily through property tax and rent rebate assistance and a pharmaceutical assistance program to recipients who meet specified income limits, and the provision of free mass transit rides during off-peak hours. Certain administrative costs and the payment to the General Fund of the personal income tax due on lottery prizes, which taxes and costs were previously paid from the State Lottery Fund, are now paid by the General Fund, beginning in fiscal year 2000.

Financial Results for Fiscal Years 2011-2015

GAAP Basis. During the fiscal year ended June 30, 2015, the net year over year increase in total revenues and other sources (\$26.3 million) was primarily attributable to increased Lottery revenues (\$24.2 million). Cost of sales and services increased \$355.3 million due to several factors. Grant and subsidy expenses increased \$177 million including a \$141 million increase in funding for home and community-based services and \$5 million for Older Pennsylvanian's Shared Rides. Grant and subsidy expenses increased \$11 million for PENNCARE attributable to a \$17 million increase in funding for the program. Additionally, customer demand for higher payouts on instant tickets led to an increase in the purchase of higher price point tickets. Increased purchases of higher price point instant tickets increased the overall payout on instant prizes. Implemented in fiscal year 2013, a change in the methodology for calculating the unpaid prize liability resulted in an improved account of expired instant tickets no longer subject to prize payout, thus reducing the liability. The previous prize liability computed using the prior methodology at June 30, 2013 became subject to a reduction to grant and subsidy expenses accrued and reported at June 30, 2014.

Table 10 sets forth a condensed summary of revenues and expenditures (presented on a GAAP basis) for the State Lottery Fund for fiscal years 2011 through 2015.

Table 10
Results of Operations—State Lottery Fund
GAAP Basis—Unaudited
(In Thousands)

	Fiscal Year Ended June 30				
	2011	2012	2013	2014	2015
Net Assets -					
Beginning of Period	\$ (166,238)	\$ (118,585)	\$ (68,858)	\$ (135,106)	\$ (16,213)
Restatements.....	-	-	-	-	(41,530)
Fund Balance —					
Beginning of Period, as Restated.....	\$ (166,238)	\$ (118,585)	\$ (68,858)	\$ (135,106)	\$ (57,743)
Revenues:					
Lottery revenues.....	3,206,588	3,476,663	3,699,186	3,800,883	3,825,052
Intergovernmental.....	-	-	-	-	-
Investment income.....	4,681	13,562	4,989	6,841	2,517
Other revenues.....	114,586	114,785	76,278	88,199	98,354
Other Financing Sources:					
Operating transfers in.....	165,900	164,100	166,800	166,500	162,800
TOTAL REVENUES AND OTHER SOURCES.	<u>\$ 3,491,755</u>	<u>\$ 3,769,110</u>	<u>\$ 3,947,253</u>	<u>\$ 4,062,423</u>	<u>\$ 4,088,723</u>
Expenditures:					
Costs of sales and services.....	\$ 3,036,434	\$ 3,315,004	\$ 3,621,866	\$ 3,606,376	\$ 3,961,636
Depreciation and amortization.....	2,568	2,180	2,772	3,522	4,023
Other expenses.....	116,901	112,589	107,595	110,676	113,087
Other Uses:					
Operating transfers out.....	288,199	289,610	281,268	222,956	249,443
TOTAL EXPENDITURES AND OTHER USES	<u>\$ 3,444,102</u>	<u>\$ 3,719,383</u>	<u>\$ 4,013,501</u>	<u>\$ 3,943,530</u>	<u>\$ 4,328,189</u>
REVENUES AND OTHER SOURCES OVER (UNDER) EXPENDITURE AND OTHER USES	<u>47,653</u>	<u>49,727</u>	<u>(66,248)</u>	<u>118,893</u>	<u>(239,466)</u>
Net Assets - End of Period.....	<u>\$ (118,585)</u>	<u>\$ (68,858)</u>	<u>\$ (135,106)</u>	<u>\$ (16,213)</u>	<u>\$ (297,209)</u>
Components of Net Assets					
Invested in capital assets, net of debt.....	\$ 11,749	\$ 16,083	\$ 19,802	\$ 26,229	\$ 22,652
Deficit.....	(130,334)	(84,941)	(154,908)	(42,442)	(319,861)
TOTAL NET ASSETS.....	<u>\$ (118,585)</u>	<u>\$ (68,858)</u>	<u>\$ (135,106)</u>	<u>\$ (16,213)</u>	<u>\$ (297,209)</u>

Source: Compiled from Office of the Budget, Comprehensive Annual Financial Reports for fiscal years ended June 30, 2011 through 2015.

The following budgetary basis information is derived from the Commonwealth's unaudited budgetary basis financial statements and enacted fiscal year 2017 budget.

Fiscal Year 2014 Financial Results

Budgetary Basis. Fiscal year 2014 net revenues from lottery sources, including instant ticket sales and the State's participation in the multi-state Powerball game, increased by 2.7 percent. Total funds available, including prior year lapses and net revenues received by the Lottery Fund during fiscal year 2014, were \$1,766.4 million, while total appropriations, net of current year lapses, were \$1,882.7 million. Additionally, fiscal year 2014 expenditures included a transfer of approximately \$169.0 million in long-term care costs from the Commonwealth's General Fund to the State Lottery Fund. The fiscal year-end unappropriated balance and reserve was \$202.2 million, a decrease of 23.3 percent.

Fiscal Year 2015 Financial Results

Budgetary Basis. Fiscal year 2015 net revenues from lottery sources, including instant ticket sales and the State’s participation in the multi-state Powerball game, decreased by 2.4 percent. Total funds available, including prior year lapses and net revenues received by the Lottery Fund during fiscal year 2015, were \$1,723.2 million, while total appropriations, net of current year lapses, were \$1,939.4 million. Additionally, fiscal year 2015 expenditures included a transfer of approximately \$164.5 million in long-term care costs from the Commonwealth’s General Fund to the State Lottery Fund. The fiscal year-end unappropriated balance and reserve was \$14.8 million, a decrease of 92.7 percent.

Fiscal Year 2016 Financial Results

Budgetary Basis. Fiscal year 2016 net revenues from lottery sources, including instant ticket sales and the State’s participation in the multi-state Powerball game, increased by 7.5 percent. Total funds available, including prior year lapses and net revenues received by the Lottery Fund during fiscal year 2016, were \$1,903.7, including a temporary \$50 million General Fund loan to the Lottery Fund to address cash flow requirements that has since been repaid. Total appropriations, net of current year lapses, were \$1,865 million. Additionally, fiscal year 2016 expenditures included a transfer of approximately \$184 million in long-term care costs from the Commonwealth’s General Fund to the State Lottery Fund. The fiscal year-end unappropriated balance and reserve was \$101.9 million, an increase of 82 percent.

Fiscal Year 2017 Enacted Budget

The enacted fiscal year 2017 budget anticipates a 5.0 percent decrease in revenues from all lottery sources, including instant ticket sales and the state’s participation in the multi-state Powerball game. This decrease is due to reduction in the Gaming Fund transfer into the Lottery Fund. Revenues of the State Lottery Fund are estimated to be \$1,805.8 million in fiscal year 2017, a decrease of \$94 million. Budgeted Appropriations total \$1,906.5 million, which represents an increase of \$41.4 million or 2.2 percent from fiscal year 2016. The fiscal year-end balance is budgeted to total \$7.731 million, a decrease of 7.1 percent from the fiscal year 2016 ending balance.

See Appendix C for additional information on the budgetary process.

COMMONWEALTH REVENUES AND EXPENDITURES

Recent Receipts and Forecasts

Table 11, on the next page, presents the Commonwealth revenue receipts, including net revenues accrued but not deposited, on a budgetary basis, for the major operating funds of the Commonwealth as actually received for fiscal years 2012 through 2016 and as estimated in the fiscal year 2017 enacted budget.

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Table 11
Commonwealth Revenues ^(a)
General Fund, Motor License Fund and State Lottery Fund - Unaudited
Fiscal Year 2012 – Fiscal Year 2016 and Fiscal Year 2017 Estimated*
(In \$ Millions)

	2012	2013	2014	2015	2016	Estimated 2017
General Fund						
Tax Revenues:						
Sales and use	\$ 8,772.3	\$ 8,893.7	\$ 9,129.6	\$ 9,493.1	\$ 9,795.2	\$ 10,204.5
Personal income	10,800.5	11,371.2	11,437.3	12,107.4	12,506.0	13,052.0
Corporate (b).....	2,859.6	3,025.7	2,821.8	3,053.1	2,993.0	2,993.7
Public utility (c).....	1,358.7	1,350.2	1,316.3	1,300.0	1,344.1	1,327.9
Inheritance	827.7	845.3	877.4	1,002.3	962.2	1,000.3
Financial and insurance (d)	730.9	798.4	749.9	748.4	794.6	832.7
Cigarette	1,069.9	1,024.1	976.9	927.2	911.5	1,314.7
Realty transfer	292.2	338.7	375.4	413.8	481.7	554.5
Alcoholic beverages (e)	324.0	336.4	346.0	358.9	373.0	397.5
Other	112.7	83.5	67.3	88.3	96.5	50.1
TOTAL TAX REVENUES	\$ 27,148.5	\$ 28,067.2	\$ 28,097.9	\$ 29,492.5	\$ 30,257.8	\$ 31,727.9
Non-Tax Revenues:						
Liquor store profits	\$ 80.0	\$ 80.0	\$ 80.0	\$ 80.0	\$ -	\$ 216.4
Licenses, fees and miscellaneous.....	383.0	444.3	358.1	950.0	571.8	702.6
Fines, penalties and interest	66.4	55.4	71.0	70.2	72.0	66.8
TOTAL NON-TAX REVENUES	\$ 529.4	\$ 579.7	\$ 509.1	\$ 1,100.2	\$ 643.8	\$ 985.8
TOTAL GENERAL FUND	\$ 27,677.9	\$ 28,646.9	\$ 28,607.0	\$ 30,592.7	\$ 30,901.6	\$ 32,713.7
Motor License Fund						
Tax Revenues:						
Liquid fuels	\$ 561.4	\$ 576.3	\$ 627.6	\$ 815.0	\$ 822.3	\$ 828.4
Fuels use	155.7	152.0	95.1	0.0	0.0	0.0
Oil company franchise	457.9	445.1	534.1	747.4	836.9	903.1
Motorbus & alt fuels.....	49.0	49.7	37.7	0.0	0.0	0.0
TOTAL TAX REVENUES	\$ 1,224.0	\$ 1,223.1	\$ 1,294.5	\$ 1,562.4	\$ 1,659.2	\$ 1,731.5
Non-Tax Revenues:						
Licenses and fees	\$ 892.6	\$ 892.5	\$ 893.9	\$ 950.8	\$ 962.7	\$ 991.9
Other and miscellaneous.....	297.6	300.6	258.4	98.3	35.7	27.6
TOTAL NON-TAX REVENUES	\$ 1,190.2	\$ 1,193.1	\$ 1,152.3	\$ 1,049.1	\$ 998.4	\$ 1,019.5
TOTAL MOTOR LICENSE FUND	\$ 2,414.2	\$ 2,416.2	\$ 2,446.8	\$ 2,611.5	\$ 2,657.6	\$ 2,751.0
State Lottery Fund						
Non-Tax Revenues:						
Lottery revenues	\$ 1,515.4	\$ 1,591.7	\$ 1,598.0	\$ 1,558.7	\$ 1,676.0	\$ 1,656.5
Other and miscellaneous	178.2	166.8	168.4	164.5	167.7	149.3
TOTAL NON-TAX REVENUES	\$ 1,693.6	\$ 1,758.5	\$ 1,766.4	\$ 1,723.2	\$ 1,843.7	\$ 1,805.8
TOTAL STATE LOTTERY FUND	\$ 1,693.6	\$ 1,758.5	\$ 1,766.4	\$ 1,723.2	\$ 1,843.7	\$ 1,805.8

Source: Office of the Budget. Totals may not add due to rounding.

(a) Budgetary basis including taxes and interest accrued but not deposited by the Commonwealth by June 30 of each fiscal year.

(b) Includes the corporate net income and the capital stock and franchise taxes.

(c) Includes the utility gross receipts and utility property taxes.

(d) Includes the financial institution and insurance premium taxes.

(e) Includes the liquor and malt beverage taxes.

* Data from fiscal year 2017 enacted budget.

Table 12 below presents a comparison of the actual revenues on a budgetary basis to the official revenue estimate used for budget enactment for the General Fund and the Motor License Fund for fiscal years 2012 through 2016.

Table 12
Commonwealth Revenues — Official Estimate vs. Actual^(a)
General Fund and Motor License Fund – Unaudited
Fiscal Year 2012 — Fiscal Year 2016
(In \$ Millions)

<u>Fiscal Year</u> <u>Ended June 30</u>	<u>General Fund</u>			<u>Motor License Fund</u>		
	<u>Official</u> <u>Estimate^(b)</u>	<u>Actual</u>	<u>Variance</u>	<u>Official</u> <u>Estimate^(b)</u>	<u>Actual</u>	<u>Variance</u>
2012	27,840.8	27,678.0	(162.8)	2,416.4	2,414.2	(2.2)
2013	28,590.0	28,646.9	56.9	2,397.0	2,416.2	19.2
2014	29,116.0	28,607.7	(508.3)	2,468.8	2,446.8	(22.0)
2015	30,194.5	30,592.5	398.0	2,527.9	2,611.5	83.6
2016	30,871.7	30,901.5	29.8	2,680.1	2,657.5	(22.6)

Source: Office of the Budget.

^(a) Budgetary basis including taxes and interest accrued but not deposited by the Commonwealth by June 30 of each fiscal year.

^(b) As certified for budget enactment.

Tax Revenues (Unaudited Budgetary Basis)

Tax revenues constituted approximately 97.9 percent of Commonwealth revenues in the General Fund for the fiscal year ended June 30, 2016. The major tax sources for the General Fund of the Commonwealth are the personal income tax, the sales tax, the corporate net income tax, the gross receipts tax, and the cigarette tax. Together these five taxes produced 90.4 percent of General Fund tax revenues for the fiscal year ended June 30, 2016.

The major tax sources for the Motor License Fund are the liquid fuels tax and the oil company franchise tax. Together these taxes produced just over 62.4 percent of non-restricted Motor License Fund revenues in fiscal year 2016. Portions of certain taxes whose receipts are deposited into the Motor License Fund are legislatively restricted to specific transportation programs. These receipts are accounted for in restricted accounts in the Motor License Fund and are not included in the budgetary basis discussions of the tax revenues of the Motor License Fund.

The major tax sources for the General Fund and the Motor License Fund are described briefly below. The tax receipt amounts in the descriptions are on a budgetary basis.

Personal Income Tax. This tax accounted for \$12,506.0 million or 40.5 percent of fiscal year 2016 General Fund Commonwealth revenues. The tax is levied at a flat rate on the taxable income of all residents and resident trusts and estates and taxable income attributable to Pennsylvania non-residents and non-resident estates and trusts. The current tax rate of 3.07 percent became effective on January 1, 2004. Credit against the tax is allowed for gross or net income taxes paid to other states by Pennsylvania residents.

Withholding is required by employers from all persons liable for the tax with the size of collections determining the frequency for remittance to the Commonwealth. A declaration and partial payment of the estimated tax are required for those individuals with taxable incomes over \$8,000 per year, other than wages subject to withholding. Act 84 of 2016, which made Pennsylvania lottery winnings subject to taxation, also required withholding of personal income tax for certain prizes of the Pennsylvania State Lottery.

Individuals and families meeting qualifying income limits do not pay personal income tax on all or a portion of their taxable income with the exemptions depending on their total income. A qualifying family of four owes no personal income tax on taxable income up to \$32,000 annually.

Sales Tax. This tax accounted for \$9,795.2 million or 31.7 percent of fiscal year 2016 General Fund Commonwealth revenues. The tax is levied at a rate of 6 percent on the sale, use, storage, rental or consumption of tangible personal property, cigarettes, and certain services, and upon the occupancy of hotel rooms. Substantial

exemptions from the tax include clothing, food purchased in grocery stores or supermarkets, medical supplies, drugs, residential use of certain utilities, motor fuels, and machinery, equipment and items used in manufacturing, processing, farming or dairying, and utility service. The tax base was expanded in fiscal year 1992 to include a number of services not previously taxed. The tax base was further expanded through Act 84 of 2016 to include digital downloads. The same act also exempted timber production, corrugated boxes used in the snack food industry, and services related to exhibiting at the Pennsylvania Convention Center and the David L. Lawrence Convention Center. Beginning in fiscal year 2004, 0.947 percent of collections are transferred to a special fund for mass transit assistance. Beginning in fiscal year 2008 with the enactment of Act 44, an additional 4.4 percent of receipts are transferred for transit assistance purposes.

Sales tax licensees reporting an actual tax liability equal to or greater than \$100,000 for the third calendar quarter of the preceding year must make a payment of 50 percent of the tax liability for the same month of the previous year.

Sales tax licensees reporting an actual tax liability of at least \$25,000 and less than \$100,000 for the third calendar quarter of the preceding year are provided an option for their tax payment - 50 percent of the tax liability for the same month of the previous year or greater than 50 percent of the actual tax liability for the same month in the current year. This option is effective for tax returns due after September 30, 2012.

Corporate Net Income Tax. The Commonwealth received \$2,842.4 million, or 9.2 percent of fiscal year 2016 General Fund Commonwealth revenues, from this tax. Domestic and foreign corporations are subject to the corporate net income tax for the privilege of doing business, carrying on activities, having capital or property employed or used in Pennsylvania, or owning property in Pennsylvania. Limited liability companies and business trusts that are classified as corporations for Federal income tax purposes are also subject to tax. Building and loan associations, banks, saving institutions, trust companies, insurance and surety companies, and nonprofit corporations are exempt from the tax. When less than the entire business of any corporation is transacted within the Commonwealth, the taxable income in Pennsylvania is determined by an apportionment formula. The current tax rate of 9.99 percent became effective for fiscal years beginning on or after January 1, 1995. The previous tax rate of 11.99 percent had been in effect since January 1, 1994.

The corporate net income tax is to be paid in four equal installments throughout the corporation's tax year based on estimated taxes due for the entire tax year. Any remaining portion of taxes due is to be paid with the corporation's annual report due three-and-one-half months following the end of the corporation's tax year.

Gross Receipts Tax. This tax accounted for \$1,304.9 million, or 4.2 percent of fiscal year 2016 General Fund Commonwealth revenues. The gross receipts tax is levied on telephone, telegraph, and mobile telecommunications companies; electric light, water power, and hydroelectric companies; managed care organizations; and pipeline and miscellaneous transportation companies. Municipally owned or operated public utilities may exclude gross receipts derived from business done inside the limits of the municipality.

Beginning January 1, 2004, interstate and cellular telecommunications services became subject to the gross receipts tax. The tax rate is 50 mills, which became effective in July 1991, having been raised from its prior tax rate of 44 mills for all utilities except electric utilities, which are taxed at the rate of 59 mills. Revenue from 0.25 mills of the tax is deposited in the Alternative Fuels Incentive Grant Fund. All firms, except public utilities owned or operated by a municipality or a municipal authority, are required to file estimated revenue reports annually, together with the estimated payment of the current year's tax calculated by applying the current tax rate to 90 percent of the tax base for the current year or 100 percent of the liability two years prior, subject to the current rate. The adequacy of these payments is judged retrospectively based on the final return.

Effective for tax years after January 1, 2000, natural gas companies became exempt from the tax. The tax report and estimated payment are required to be made by March 15. The remaining tax is due and payable by the succeeding March 15.

Capital Stock and Franchise Taxes. These taxes generated \$150.6 million for the Commonwealth in fiscal year 2016, or 0.5 percent of General Fund Commonwealth revenues. They are levied on the capital stock value of domestic and foreign corporations doing business or having property or capital employed in Pennsylvania on that portion of capital stock value apportionable to Pennsylvania under a statutory formula.

Capital stock and franchise tax estimated payments must exceed 90 percent of reported annual liability, or 100 percent of the liability two years prior subject to the current rate. Under current law, the General Fund tax rate for tax years that began in fiscal year 2015 is 0.45 mills, having been reduced from 0.67 mills effective January 1, 2014. This tax has been eliminated for tax years beginning on or after January 1, 2016.

Cigarette Tax. Collections of this tax totaled \$911.5 million in fiscal year 2016, or 2.9 percent of General Fund Commonwealth revenues. The tax is imposed and assessed on the sale or possession of cigarettes and little cigars within the Commonwealth. It is levied on the consumer but is collected by the sale of stamps and meter units to dealers who affix them to each package. The current rate is \$1.60 per package of 20 cigarettes, which was increased by 25 cents in 2009. Under Act 84 of 2016, effective August 1, 2016, the rate increases by 5.0 cents per cigarette to \$2.60 per pack. The 6.0 percent sales tax is also imposed on the retail sale of cigarettes and is included in the sales tax receipts. A portion of the collections from the tax are transferred to a special fund for children's health insurance and to a special fund for preserving farmland. Act 84 of 2016 also increases the transfer to the farmland preservation fund by \$5 million.

Inheritance and Estate Taxes. Collections of these taxes were \$962.2 million in fiscal year 2016, or 3.1 percent of General Fund Commonwealth revenues. The inheritance tax is levied on the value of property transferred to heirs of a deceased person. Prior to July 1, 2000, the tax rate was 6 percent of the value, if passing to lineal heirs, and 15 percent if passing to collateral heirs. Effective July 1, 2000, the tax rate on transfers to parents, grandparents and lineal descendants was lowered to 4.5 percent and a new tax rate of 12 percent on transfers to siblings was established. The estate tax was a "pick-up" tax in the amount of the maximum federal tax credit less State death taxes paid. The federal estate tax credit was phased out between 2002 and 2005. As a result of the American Taxpayer Relief Act of 2012, the federal estate tax credit, and thus Pennsylvania's estate tax, will not return. Counties collect the inheritance and estate tax, which is due within nine months following the death of the person whose property is being transferred.

Insurance Premiums Tax. This tax is levied at the rate of 2 percent of the gross premiums (subject to retaliatory provisions) on all business of domestic and foreign insurance companies transacted within the Commonwealth during each calendar year. Revenues from the two percent tax on foreign fire and casualty companies accrues to special revenue funds while the remaining taxes accrue to the General Fund. The tax on foreign companies is based on the amount of business transacted in Pennsylvania. Marine insurance companies, both domestic and foreign, pay a 5 percent tax on underwriting profits attributable to Pennsylvania in lieu of the gross premium tax.

Estimated payments are due March 15th for the current taxable year and must exceed 90 percent of reported annual liability, or 100 percent of the liability two years prior, subject to the current rate. The adequacy of these payments is judged retrospectively based on the final return. Final payments and reports must be remitted together by April 15th of each year for the previous tax year.

Realty Transfer Tax. This tax is levied at the rate of 1 percent of the value of the real property transferred, as represented by deed, instrument or other writing. The tax is collected by the recorders of deeds in the counties and transmitted to the Commonwealth when collected. Beginning with fiscal year 2008, the transfer to the Keystone Recreation, Park and Conservation Fund of a portion of this tax is 15 percent of such tax, after having changed several times over the previous ten years.

Liquor Tax. This tax is levied at the rate of 18 percent of the net purchase price on all liquor sold by the Pennsylvania Liquor Control Board. Revenues from this tax accrue to the General Fund. The 6 percent sales tax is also imposed on all liquor sold by the Pennsylvania Liquor Control Board and is included in the sales tax receipts.

Financial Institution Taxes. The bank shares tax is levied at the rate of 0.89 percent of the value of shares of state and national banks and domestic title insurance companies, beginning January 1, 2014. Under Act 84 of 2016, this rate increases to 0.95 percent beginning January 1, 2017. This is a reduction from the rate of 1.25 percent. Effective January 1, 2014, each institution computes the tax base on the most recent year-end value of the institution's total bank equity capital, adjusted to exclude the value of United States obligations. Previously, the tax base was computed by averaging an institution's total equity capital for each quarter, adjusted to exclude the value of United States obligations, for the previous six calendar years. Goodwill is also deducted from a bank's equity and total assets when computing the tax base. A payment of the tax for the current year is due by March 15th of that year. Revenues of this tax are deposited

into the General Fund. The mutual thrift institutions tax is levied on the taxable net income of such institutions at the rate of 11.5 percent. Revenues of this tax accrue to the General Fund.

Mutual thrift institutions make quarterly estimated payments by applying the current tax rate to 100 percent of the tax base for the second preceding year, or by paying at least 90 percent of the reported annual liability for the current year. Final reports are due 105 days after the close of the fiscal year. Extensions are available for filing reports; however, no extensions are granted for payment of the tax.

Public Utility Realty Tax. The tax is levied on the state taxable value of utility real property belonging to a firm or other entity (i) furnishing utility service and (ii) regulated by the Pennsylvania Public Utility Commission or similar regulatory body. State taxable value is the current market value derived from assessed values for county real estate tax purposes. Certain items are specifically exempt from the tax. The tax rate for the General Fund portion of the tax is set annually by the Secretary of Revenue. The tax rate is to be set at a rate intended to produce revenues sufficient to reimburse local taxing authorities for foregone property tax revenues. An additional tax rate of 7.6 mills is applied to the tax base and remains in the General Fund. The tax is subject to a tentative payment of the then current year's tax liability. The tentative reports and tax payments are due in May. The remaining tax payments must be paid in September of the following year.

Malt Beverage Tax. This tax is levied on all malt or brewed beverages sold in Pennsylvania. The tax rate is two-thirds cent per half-pint, 1 cent per pint and \$2.48 per barrel. The various manufacturers pay the tax monthly to the Department of Revenue. Revenues from this tax are deposited into the General Fund.

Liquid Fuels Tax. This tax accounted for \$822.3 million, or 49.6 percent of Motor License Fund Commonwealth revenues in fiscal year 2016. It is an excise tax imposed upon all liquid fuels (primarily gasoline) used or sold within the Commonwealth. The tax is imposed upon and collected by the fuel distributor. After discounts, all monies collected are deposited in the Motor License Fund, except that an amount equal to one-half cent per gallon is deposited in the Liquid Fuels Tax Fund. Fuels sold and delivered to the U.S. government, the Commonwealth and any of its political subdivisions, public authorities, non-profit schools, volunteer fire companies, ambulance services, rescue squads, and fuels sold and delivered in interstate commerce are exempt from payment of the tax. In addition to these exemptions, reimbursement is made for fuels used for certain agricultural purposes. The rate of the liquid fuels tax is 12 cents per gallon. This tax was eliminated through legislation for liquid fuels sold on January 1, 2014 and thereafter.

Oil Company Franchise Tax. The non-restricted portion of this tax accounted for \$836.9 million, or 31.5 percent of fiscal year 2016 Motor License Fund Commonwealth revenues. Through December 31, 2013, the tax rate was 153.5 mills on the revenue received from liquid fuels and 208.5 mills on the revenue received from fuels at the first sale of petroleum products in Pennsylvania used to fuel motor vehicles for public highway use. As of January 1, 2014, legislation added 64 mills in calendar year 2014, 49 mills in 2015, 48 mills in 2016, 41 mills in 2017, and 39 mills in 2018 and each year thereafter. Petroleum revenue is derived by multiplying total gallons of petroleum products by the average wholesale price of motor fuels as established by the Department of Revenue. As of January 1, 2014, the average wholesale price was set at \$1.87 for calendar year 2014, \$2.49 for 2015 and 2016, and uncapped thereafter with a statutory floor of \$2.99. Prior to 2014, minimum and maximum average wholesale prices were statutorily set at \$0.90 and \$1.25 per gallon, respectively. In addition to the 57 mills from the liquid fuels and fuels rates being deposited in the non-restricted account, the additional mills added in 2014 and thereafter are also deposited in non-restricted accounts. The exception is that 4.17% of the mills added in 2014 and thereafter are transferred to the Liquid Fuels Tax Fund. The remainder of the oil company franchise tax is deposited in other restricted accounts. By law, portions of the tax are dedicated to certain highway purposes, including transfers to local governments for roads and highways. Exemptions from the tax are the same as those provided from the liquid fuels tax.

Non-Tax Revenues

Licenses and Fees. License and fee receipts in the General Fund for fiscal year 2016 totaled \$116.7 million, representing 0.4 percent of Commonwealth revenues to the General Fund. Revenues from motor vehicle licenses and fees in fiscal 2016 were \$962.7 million, representing 36.2 percent of total fiscal year 2016 Motor License Fund Commonwealth revenues.

Miscellaneous Revenue. Revenues from non-tax sources not categorized elsewhere are credited to miscellaneous revenues. Interest earnings on securities and deposits are included in this source. Miscellaneous revenues receipts in the General Fund for fiscal year 2016 totaled \$455.2 million. Receipts from miscellaneous motor vehicle revenues in fiscal 2016 were \$35.7 million, representing 1.3 percent of total fiscal year 2016 Motor License Fund Commonwealth revenues.

State Stores Fund Transfers. This is an amount determined by the Liquor Control Board to be available for transfer to the General Fund. The amount transferred for fiscal year 2016 was \$0.0 million. In Pennsylvania, the distribution and sale of liquor is a state enterprise.

Fines, Penalties and Interest. This revenue source includes all fines, penalties and interest collected in the enforcement of non-tax regulations, such as moving violation surcharges. The amount deposited to the General Fund for fiscal year 2016 was \$72.0 million.

Tobacco Settlement Payments. The Commonwealth's portion of payments made by cigarette manufacturers participating in the Tobacco MSA are deposited in the Tobacco Settlement Fund to be used for certain health-related programs. The Commonwealth anticipates receiving a total MSA payment of approximately \$330.2 million for fiscal year 2017. See "COMMONWEALTH FINANCIAL STRUCTURE AND PROCEDURES – Description of Funds."

Federal Revenues

Receipts by the Commonwealth in its General Fund, Motor License Fund, Tobacco Settlement Fund and State Lottery Fund from the federal government during fiscal year 2015 totaled \$25.0 billion and during fiscal year 2016 totaled \$26.8 billion. Anticipated receipts from the federal government included in the fiscal year 2017 enacted budget are \$28.5 billion. Approximately \$20.2 billion, or 75.3 percent of total federal revenue to the Commonwealth for fiscal year 2015, was attributable to public health and welfare programs, the largest of which are for the Medical Assistance and Temporary Assistance to Needy Families programs. In fiscal year 2016, \$20.2 billion, or 75.3 percent of federal revenues, were attributable to these types of programs. In the fiscal year 2017 enacted budget, approximately \$22.0 billion or 77.2 percent of federal revenues are expected to be attributable to public health and welfare programs.

Major Commonwealth Expenditures

The Commonwealth's major operating funds—the General Fund, the Motor License Fund and the State Lottery Fund—provide financial resources to operate programs and fund grants. Trends in expenditures from those funds for various program areas are discussed below based on budgetary basis financial statements for fiscal year 2015 and fiscal year 2016 and the enacted budget for fiscal year 2017.

Education

In fiscal year 2015, expenditures from Commonwealth revenues for education purposes were more than \$11.9 billion. For fiscal year 2016 Commonwealth expenditures included over \$12.3 billion in education funding, an increase of approximately 3.6 percent over fiscal year 2015. The enacted budget for fiscal year 2017 includes over \$13.1 billion in education funding, an increase of 5.9 percent over the 2016 budget.

Elementary and Secondary Education. The financing of public elementary and secondary education in Pennsylvania is shared by the Commonwealth and local school districts. There are 500 local school districts in the state. With certain exceptions, each is governed by a locally elected school board responsible for the administration of the public schools in the school district with the authority to levy taxes within the limits prescribed by the Public School Code of 1949, as amended. Funds supplied by the Commonwealth supplement the funds raised locally. Local school districts receive various subsidy payments for basic instruction, vocational education, debt service, pupil transportation, employee retirement programs including Social Security, and various special education programs. The largest such subsidy is the Basic Education subsidy. The enacted budget for fiscal year 2016 increased the state Basic Education subsidy by \$165 million to \$5.695 billion. For fiscal year 2016, each school district received an amount equal to its 2015 Basic Education Funding allocation and a share of the \$165 million increase based on a new fair funding formula. The increase in education funding was distributed to school districts, based on local wealth, existing tax burden, district size and certain student characteristics. The Basic Education subsidy is increased by \$200 million to \$5.895 billion in

the enacted fiscal year 2017 budget. A new fair funding formula is being used to distribute the \$365 million increases in funding subsequent to fiscal year 2015.

Certain specialized education programs are operated and administered in Pennsylvania by 29 intermediate units established by the component local school districts. These intermediate units are funded from contributions from member school districts. Programs operated by intermediate units generally are special education programs for the gifted, for individuals with mental and physical disabilities, and for support of nonpublic schools through the provision of auxiliary services and the lending of instructional materials such as textbooks to children attending nonpublic schools in Pennsylvania.

Total Commonwealth expenditures for basic education programs in fiscal year 2015 were more than \$10.2 billion, representing 85.8 percent of all Commonwealth expenditures for education in fiscal year 2015. Total Commonwealth expenditures for basic education programs in fiscal year 2016 were more than \$10.7 billion, representing 86.7 percent of all Commonwealth expenditures for education in fiscal year 2016. The enacted budget for fiscal year 2017 includes more than \$11.4 billion for basic education programs.

Table 13
Fall Enrollment in Pennsylvania Public and
Non-Public Elementary Schools and Secondary Schools
School Years 2011-2015
(In Thousands)

	School Year Ended June 30				
	<u>2011</u>	<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>
Elementary Schools					
Public	934	930	927	926	924
Nonpublic....	171	166	161	160	159
Secondary Schools					
Public	845	833	828	824	815
Nonpublic....	79	76	74	73	73
Total					
Public	1,779	1,763	1,755	1,750	1,740
Nonpublic....	<u>250</u>	<u>242</u>	<u>235</u>	<u>233</u>	<u>231</u>
Total	2,029	2,005	1,990	1,983	1,971

Source: Pennsylvania Department of Education.

Higher Education. Higher education in Pennsylvania is provided through 280 degree-granting institutions, which include the fourteen universities of the State System of Higher Education (PASSHE), four State-related universities, community colleges, independent colleges and universities and specialized degree-granting institutions. PASSHE, created in 1982 from the fourteen state-owned colleges, is administered by a Board of Governors whose members are appointed by the governor and confirmed by the Senate. In fiscal years 2015 and 2016, approximately \$1.6 billion was expended by the Commonwealth for institution and student financial assistance, and in the fiscal year 2017 enacted budget more than \$1.6 billion is expected to be expended.

Table 14
Full-Time Equivalent Enrollment at State-Supported
Institutions of Higher Education
School Years 2011-2015
(In Thousands)

	School Year Ended June 30				
	<u>2011</u>	<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>
State System of Higher Education .	112	110	107	104	102
State-Related Universities	158	157	161	161	164
Community Colleges	<u>106</u>	<u>104</u>	<u>98</u>	<u>95</u>	<u>91</u>
Total.....	376	371	366	361	357

Source: Governor's Executive Budget, various years.

Public Health and Human Services

Fiscal year 2016 public health and human services expenditures were \$36,067 million and are projected to be \$38,413 million in fiscal year 2017. With regard to fiscal year 2016 expenditures, nearly \$11,772 million was funded from the General Fund, while \$12,245 million is estimated to be provided from the General Fund for fiscal year 2017. Federal funds are expected to increase by \$1,701 million, and augmentations are expected to increase by \$175.3 million for fiscal year 2017. Public health and human service programs are the largest single component of combined state and federal spending in the Commonwealth's operating budget. The overall budget increase reflects the impact of caseload increases, federal mandates, litigation and continued support of county operated programs for child welfare, mental health and intellectual disabilities.

The fiscal year 2017 enacted budget includes \$330.2 million of receipts from the Tobacco Settlement Fund to be expended for health care related programs. Federal funds matching the state Tobacco Master Settlement Agreement (MSA) funds are also expected to be provided. However, under the terms of the 1998 settlement that created the Tobacco Settlement Fund, payments by the tobacco companies may, in certain circumstances be reduced, reflecting decline in cigarette sales, and such payments also may be limited, delayed or terminated as a result of bankruptcy or insolvency of tobacco companies or legal challenges to the settlement or to amounts due thereunder. The tobacco companies continue to adjust for the non-participating manufacturer (NPM) adjustment. Pennsylvania will continue arbitration with the tobacco companies until this issue is resolved. The Commonwealth's share of withheld Tobacco MSA funds currently totals over \$347 million. For fiscal year 2017, estimated receipts from the April 2017 payment are projected to be reduced by \$43.8 million. In addition, the Commonwealth anticipates receiving a payment of \$28.5 million from the disputed payment account which will be transferred to the General Fund.

Programs providing temporary financial assistance and medical assistance comprise the largest portion of public health and human services expenditures. General Fund expenditures for these assistance programs by the Commonwealth amounted to \$6,958 million in fiscal year 2016, while \$7,028 million is budgeted from the General Fund for fiscal year 2017. A nursing home assessment fee provided a General Fund offset (meaning a reduction in required General Fund appropriations) of \$195 million in fiscal year 2016 and is expected to provide a \$195 million offset in fiscal year 2017. A Statewide managed care organization Gross Receipts Tax assessment provided a General Fund offset of \$550 million in fiscal year 2016. The Gross Receipts Tax assessment has been replaced with a Managed Care Organization assessment and is expected to provide a \$566 million offset in fiscal year 2017. In addition, a Statewide Quality Care assessment provided a \$220 million offset in fiscal year 2016 and is expected to provide a \$220 million offset in fiscal year 2017. For 2017 approximately 31.87 percent of the total cost of assistance to the economically needy is proposed to be supported by Commonwealth funds appropriated from the General Fund. The balance is expected to be provided from reimbursements by the federal government and through various program collection activities conducted by the Commonwealth.

Medical assistance continues to be a growing component of public health and human services expenditures. Despite implementation of Commonwealth initiatives to restrain costs, the program continues to grow due to an expanding caseload, technology improvements and general medical cost inflation. Expenditures for medical assistance

increased during the period from fiscal years 2006 through 2016 by an average annual rate of 4.75 percent. Fiscal year 2016 expenditures from Commonwealth funds were \$8,860 million and are projected to be \$9,069 million in fiscal year 2017, an increase of 2.37 percent from the prior fiscal year. Income maintenance cash assistance payments to families in transition to independence were \$1,001 million for fiscal year 2016, of which \$178.1 million was from the General Fund. The enacted budget for fiscal year 2017 includes a total of \$989 million, for such purpose with \$178.1 million provided from the General Fund. Cash assistance is time-limited and requires participation in work activities to maintain eligibility.

Transportation

The Commonwealth is responsible for the construction, restoration and maintenance of the highways and bridges in the 40,000 mile state highway system, including certain city streets that are a part of the state highway system. Assistance for the maintenance and construction of local roads and bridges is provided to municipalities through grants of financial aid. Highway maintenance costs, construction costs and assistance grants are paid from the Motor License Fund. Other special funds, including the Public Transportation Assistance Fund, the Public Transportation Trust Fund, the Multimodal Transportation Fund and the State Lottery Fund provide funding for mass transit and other modes of transportation.

Act 89 of 2013 provided dedicated additional funding for highway and bridges through the incremental uncapping of the Oil Company Franchise Tax (OCFT) and the indexing of vehicle and driver services fees. Act 89 also restructured Act 44 of 2007 Pennsylvania Turnpike Commission payment distributions. Beginning in fiscal year 2015, the annual \$200 million highway and bridge distribution by the Pennsylvania Turnpike Commission is being redirected to transit, resulting in annual distributions to mass transit of \$450 million.

In addition to its unrestricted state funds, the Motor License Fund includes five restricted revenue accounts funded by state revenues legislatively dedicated to these specific purposes. Some of the restricted purposes funded from these accounts also receive funding by annual appropriations of unrestricted Motor License Fund revenues. Programs receiving funds from a restricted account include highway bridges, highway construction and maintenance, grants to municipalities for highways and bridges, and airport development.

Total funding for the Commonwealth's highway and bridge program for fiscal year 2015 was \$2.403 billion. The funding increased to \$2.701 billion in fiscal year 2016. The enacted and authorized fiscal year 2017 budget reflects a slight decrease to \$2.584 billion.

Support of highway and bridge expenditures by local governments through grants paid from the Motor License Fund and restricted revenues was \$509 million in fiscal year 2015 and \$571 million in fiscal year 2016. In the fiscal year 2017 enacted budget, grants to local governments increase to \$635 million.

In addition to its support of the highway system, the Commonwealth provides subsidies for mass transit systems including passenger rail and bus service.

In fiscal year 2008, the funding mechanisms for mass transit in the Commonwealth were changed with the enactment of Act 44. Mass transit funding was shifted from the General Fund to a combination of sources of revenue primarily going into a Public Transportation Trust Fund established by Act 44. The Public Transportation Trust Fund was created to provide a long-term, predictable and growing source of revenues for public transportation systems. Act 89 increased funding and revenue sources for the Public Transportation Trust Fund. Revenues are provided by scheduled payments by the Pennsylvania Turnpike Commission, a portion of the Sales and Use Tax, certain motor vehicle fees, vehicle code fines and surcharges, and transfers from the Public Transportation Assistance Fund and the Lottery Fund. This funding supports mass transit programs statewide, providing financial assistance for operating costs, capital costs, and certain administrative costs for the Department of Transportation. For fiscal year 2015, Commonwealth funding available for mass transit was \$1.390 billion. Funding for mass transit was increased in fiscal year 2016 to \$1.596 billion. The authorized fiscal year 2017 enacted budget funding for mass transit further increases to \$1.680 billion.

Act 89 created the Multimodal Transportation Fund to provide additional funding for freight and passenger rail, ports, aviation, bicycle and pedestrian facilities, and other modes of transportation. Revenues deposited into the

Multimodal Transportation Fund include payments from the Pennsylvania Turnpike Commission, a portion of certain motor vehicle fees and beginning in fiscal year 2016, a portion of the Oil Company Franchise Tax. For fiscal year 2015, Commonwealth funding available for multimodal transportation was \$97.4 million. The fiscal year 2016 funding was \$137.9 million and fiscal year 2017 enacted budgetary funding is \$138.9 million.

The Commonwealth’s current aviation program funds the development of public airport facilities through grants providing for airport development, runway rehabilitation, and real estate tax rebates for public use airports. Taxes levied on aviation and jet fuel provide revenues for a restricted account for aviation programs in the Motor License Fund. In fiscal year 2015, \$10.4 million was expended from aviation restricted accounts. In fiscal year 2016, \$9.4 million was available for such purposes. A total of \$9.0 million is budgeted for fiscal year 2017.

Act 89, authorized the Department of Transportation to enter into transportation public-private partnerships (“P3”). The Rapid Bridge Replacement Project is a public-private partnership initiative to replace 558 bridges across Pennsylvania. In 2015, the department and the winning bidder (concessionaire) entered into a concession agreement pursuant to which the concessionaire is to design, construct and maintain the bridges. The P3 program costs are being funded by the concessionaire through bond proceeds. The bond purchase agreement was executed on February 24, 2015, and the sale of \$721.485 million of related bonds by the Pennsylvania Economic Development Financing Authority closed on March 18, 2015. The Department of Transportation expects that it will make two types of payments under the concession agreement. These are “milestone payments” as construction milestones are achieved and “availability payments” with respect to completed bridges. The department will make milestone and availability payments from funds in the Motor License Fund.

The Commonwealth is not responsible for toll roads and bridges in Pennsylvania. These are under the jurisdiction of various authorities and commissions. See “GOVERNMENT AUTHORITIES AND OTHER ORGANIZATIONS.”

OUTSTANDING INDEBTEDNESS OF THE COMMONWEALTH

General

The Constitution permits the Commonwealth to incur the following types of debt: (i) debt to suppress insurrection or rehabilitate areas affected by disaster, (ii) electorate-approved debt, (iii) debt for capital projects subject to an aggregate debt limit of 1.75 times the annual average tax revenues of the preceding five fiscal years, and (iv) tax anticipation notes payable in the fiscal year of issuance. All debt, except debt incurred through the issuance of tax anticipation notes, must be amortized in substantial and regular amounts.

Debt service on Commonwealth general obligation debt is paid from appropriations out of the General Fund except for debt issued for highway purposes, which is paid from Motor License Fund appropriations.

Table 15
General Obligation Debt Outstanding ^(a)
Fiscal Years 2007-2016
(In Millions)

<u>At June 30</u>	<u>General Obligation Debt Outstanding</u>
2007.....	\$7,834.0
2008.....	8,177.0
2009.....	8,653.7
2010.....	9,891.7
2011.....	9,872.1
2012.....	10,727.5
2013.....	10,860.3
2014.....	11,409.0
2015.....	12,074.9
2016.....	11,578.5

(a) Net of sinking fund balances.

Net outstanding general obligation debt totaled \$11,578.5 million at June 30, 2016, a decrease of \$496.4 million from June 30, 2015. Over the 10-year period ended June 30, 2016, total net outstanding general obligation debt increased at an annual rate of 4.7 percent. Over the 5-year period ended June 30, 2016, total net outstanding general obligation debt has increased at an annual rate of 3.2 percent.

General obligation debt for non-highway purposes of \$10,378.6 million was outstanding on June 30, 2016. Outstanding debt for these purposes decreased by a net \$835.8 million since June 30, 2015. For the period ended June 30, 2016, the 10-year and 5-year average annual compound growth rate for total outstanding debt for non-highway purposes has been 3.8 percent and 2.2 percent respectively. In its current debt financing plan, Commonwealth infrastructure investment projects include improvement and rehabilitation of existing capital facilities and construction of new facilities, such as public buildings, prisons and parks, transit facilities, economic development and community facilities, and environmental remediation projects.

Outstanding general obligation debt for highway purposes was \$1,199.9 million on June 30, 2016, an increase of \$339.5 million from June 30, 2015. Highway outstanding general obligation debt grew over the 10-year and 5-year periods ended June 30, 2016, at the annual average rates of 24.2 percent and 17.0 percent respectively. A previous decline in outstanding highway debt was due to the policy begun in 1980 of funding highway capital projects with current revenues except for very limited exceptions. However, beginning with fiscal year 2009, the Commonwealth initiated a multi-year plan to issue an average of \$200 million in general obligation bonds annually to accelerate the rehabilitation of a portion of the Commonwealth's 6,000 structurally deficient bridges. Funding to support such debt issuance was initially provided from an existing restricted account rather than from general revenues of the Motor License Fund or the General Fund. During the 2010 fiscal year, the Commonwealth issued \$200 million in general obligation bonds to jumpstart its bridge rehabilitation program. During fiscal years 2011, 2012, 2013 and 2014 the Commonwealth issued \$130 million, \$120 million, \$85 million and \$40 million respectively in general obligation debt for the bridge rehabilitation program.

Table 16, below, shows selected debt ratios for the Commonwealth for fiscal year 2007 and for fiscal years 2012 through 2016. Table 16 contains corrections to certain prior fiscal year data as well as a revision in the methodology to have debt service payments include funding from all sources rather than show debt service solely as paid from appropriations (resulting in some information in Table 16 being different from that appearing in previous Official Statements of the Commonwealth).

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Table 16
Selected Debt Ratios
Fiscal Years 2007 and 2012 through 2016
(In Millions)

	2007	2012	2013	2014	2015	2016 (Est.)
Net Outstanding Debt (Millions)						
General Obligation Debt(a).....	\$ 7,834	\$ 10,728	\$ 10,860	\$ 11,409	\$ 12,074	\$ 11,578
Lease Payment Obligations(b).....	835	2,249	2,493	2,401	2,383	2,199
Total.....	\$ 8,669	\$ 12,977	\$ 13,353	\$ 13,810	\$ 14,457	\$ 13,777
% Increase (Decrease) over prior year.....	8.5%	7.4%	2.9%	3.4%	4.7%	-4.7%
Population (Thousands)						
Population.....	12,522	12,763	12,784	12,794	12,804	12,813
Per Capita Debt.....	\$ 692	\$ 1,017	\$ 1,045	\$ 1,079	\$ 1,129	\$ 1,075
Personal Income (Millions).....	\$ 489,076	\$ 560,501	\$ 554,990	\$ 569,786	\$ 588,219	\$ 606,222
Debt as a % of Personal Income.....	1.8%	2.3%	2.4%	2.4%	2.5%	2.3%
Debt Service (Millions)(c)						
Highway Bonds(d).....	\$ 30	\$ 57	\$ 52	\$ 54	\$ 53	\$ 56
All Other Bonds.....	849	1,146	1,223	1,232	1,221	1,260
Lease Payments.....	47	137	156	155	155	155
Total.....	\$ 926	\$ 1,340	\$ 1,431	\$ 1,441	\$ 1,429	\$ 1,471
Increase (Decrease) Over Prior Year	8.6%	2.9%	6.8%	0.7%	(0.8%)	2.9%
Cash Revenues (Million)(e)						
Motor License Fund.....	\$ 2,291	\$ 2,414	\$ 2,416	\$ 2,447	\$ 2,611	\$ 2,658
General Fund.....	27,449	27,678	28,646	28,646	30,592	30,901
Total.....	\$ 29,740	\$ 30,092	\$ 31,062	\$ 31,093	\$ 33,203	\$ 33,559
% Increase (Decrease) over prior year.....	5.8%	0.3%	3.2%	0.1%	6.8%	1.1%
Highway Bond Debt Service as a % of Motor License						
Fund Revenues.....	1.3%	2.4%	2.2%	2.2%	2.0%	2.1%
All Other Bond Debt Service and Lease Payments as a						
% of General Fund Revenues.....	3.3%	4.6%	4.8%	4.8%	4.5%	4.6%
Total Debt Service and Lease Payments as a % of Motor						
License and General Fund Revenues.....	3.1%	4.5%	4.6%	4.6%	4.3%	4.4%

- (a) Net of all sinking fund balances. Includes bond anticipation notes.
(b) Includes unduplicated data of issues contained in Table 20.
(c) As paid from appropriations, available funds and/or sinking fund balances.
(d) Highway Bonds and Highway Bridge Improvement Bonds.
(e) Commonwealth revenues only.

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General Obligation Debt Outstanding

As of June 30, 2016, the Commonwealth had the following amount of general obligation debt outstanding:

Table 17
General Obligation Debt Outstanding as of June 30, 2016^(a)

(In Thousands)

	Debt Outstanding	Less: Refunding Escrow ^(b)	Less: Sinking Fund ^(c)	Net Debt Outstanding
Capital Projects Debt:				
Capital Facilities Bonds.....	\$ 7,439,335	\$ (1,234,395)	\$ (26,701)	\$ 6,178,239
Highway Bonds.....	1,199,025	(25,765)	-	1,173,260
Refunding Bonds	3,086,300	(9,820)	-	3,076,480
Total Capital Projects Debt Outstanding.....	\$ 11,724,660	\$ (1,269,980)	\$ (26,701)	\$ 10,427,979
Electorate Approved Debt:				
PA Economic Revitalization Bonds.....	-	-
Land & Water Development Bonds.....	-	-	-	-
Nursing Home Loan Development Bonds.....	-	-	-	-
Volunteer Companies' Loan Bonds.....	-	-	-	-
Vietnam Veterans Compensation Bonds.....	-	-	-	-
Water Facilities Restoration-1981 Referendum.....	-	-	-	-
Pennvest—1988 Referendum Bonds.....	-	-	(2,310)	(2,310)
Pennvest—1992 Referendum Bonds.....	165,350	(35,165)	-	130,185
Agricultural Conservation Easement Bonds.....	-	-	-	-
Local Criminal Justice Bonds.....	1,760	(1,375)	(40)	345
Keystone Recreation, Parks & Conservation Bonds.....	-	-	-	-
Growing Greener Bonds.....	416,845	(175,110)	-	241,735
Water Supply and Wastewater Treatment Bonds.....	166,465	(97,980)	-	68,485
Persian Gulf Conflict Veterans.....	5,070	(3,480)	-	1,590
Water and Sewer Assistance.....	328,720	-	-	328,720
Total Electorate Approved Debt Outstanding.....	\$ 1,084,210	\$ (313,110)	\$ (2,350)	\$ 768,750
Other Bonded Debt:				
Disaster Relief Bonds.....	-	-
Refunding Bonds.....	381,985	(180)	-	381,805
Total Other Bonded Debt Outstanding.....	\$ 381,985	\$ (180)	\$ -	\$ 381,805
Total General Obligation Debt Outstanding.....	\$ 13,190,855	\$ (1,583,270)	\$ (29,051)	\$ 11,578,534

^(a) Does not include any general obligation debt issued in fiscal year 2017.

^(b) Principal amount of bonds refunded to be paid from escrowed bond proceeds in State Treasurer escrow account.

^(c) Funds already deposited in sinking funds.

Debt service payable during each fiscal year on outstanding general obligation debt, net of refunding escrow amounts, as of June 30, 2016, for the years shown is set forth in Table 18 below:

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Table 18
General Obligation Bond Debt Service

(In Thousands)

<u>Fiscal Year Ending June 30</u>	<u>Principal</u>	<u>Interest</u>	<u>Total</u>
2017	\$755,975	\$535,998	\$1,291,973
2018	735,730	512,078	1,247,808
2019	782,700	473,880	1,256,580
2020	771,220	434,683	1,205,903
2021	769,860	397,646	1,167,506
2022	773,180	361,256	1,134,436
2023	745,560	323,727	1,069,287
2024	749,790	287,229	1,037,019
2025	715,550	251,235	966,785
2026	751,300	214,359	965,659
2027	723,545	179,336	902,881
2028	648,315	146,956	795,271
2029	585,115	116,859	701,974
2030	554,685	88,708	643,393
2031	430,610	63,038	493,648
2032	397,785	44,724	442,509
2033	289,580	28,227	317,807
2034	229,065	15,324	244,389
2035	135,885	6,759	142,644
2036	62,135	1,542	63,677
Total	<u>\$11,607,585</u>	<u>\$4,483,564</u>	<u>\$16,091,149</u>

Totals may not add due to rounding.
Does not include general obligation bonds issued during fiscal year 2017.

Nature of Commonwealth Debt

Capital Projects Debt. The Commonwealth may incur debt to fund capital projects for community colleges, highways, bridge projects, public improvements, transportation assistance, flood control, and redevelopment assistance. Before a project may be funded, it must be itemized in a capital budget bill adopted by the General Assembly. An annual capital budget bill states the maximum amount of debt for capital projects that may be incurred during the current fiscal year for projects authorized in the current or previous years' capital budget bills. Capital projects debt is subject to a constitutional limit on debt.

Once capital projects debt has been authorized by the necessary legislation, issuance authority rests with at least two of the three Issuing Officials (the Governor, the State Treasurer and the Auditor General), one of whom must be the Governor.

Electorate Approved Debt. The issuance of electorate approved debt is subject to the enactment of legislation that places on the ballot the question of whether debt shall be incurred. The legislation authorizing the referendum must state the purposes for which the debt is to be authorized and, as a matter of practice, includes a maximum amount of funds to be borrowed. Upon electorate approval and enactment of legislation implementing the proposed debt-funded program, bonds may be issued. All such authorizing legislation to date has given issuance authority to at least two of the Issuing Officials, one of whom must be the Governor.

Other Bonded Debt. Debt issued to rehabilitate areas affected by disasters is authorized by specific legislation. Authorizing legislation has given issuance authority to at least two of the three Issuing Officials, one of whom must be the Governor.

Tax Anticipation Notes. Due to the timing of major tax payment dates, the Commonwealth's General Fund cash receipts are generally concentrated in the last four months of the fiscal year, from March through June.

Disbursements are distributed more evenly throughout the fiscal year. As a result, operating cash shortages can occur during certain months of the fiscal year. When necessary, the Commonwealth engages in short-term borrowing to fund expenses within the fiscal year through the sale of tax anticipation notes. The authority to issue such notes rests with the Issuing Officials.

The Commonwealth may issue tax anticipation notes only for the account of the General Fund or the Motor License Fund or both such funds. The principal amount issued, when added to already outstanding amounts, may not exceed in the aggregate 20 percent of the revenues estimated to accrue to the appropriate fund or funds in the fiscal year.

Tax anticipation notes must mature within the fiscal year in which they are issued. The Commonwealth is not permitted to fund deficits between fiscal years with any form of debt. Any year-end deficit balances must be funded in the succeeding fiscal year budget.

Currently, the Commonwealth has no tax anticipation notes outstanding.

Line of Credit (General Fund). The Commonwealth has entered into an agreement with the Pennsylvania Treasury Department which allows the Commonwealth to engage in short-term borrowing of governmental monies on deposit with the Treasury to fund General Fund expenses within the fiscal year (the “STIP Facility”). The Commonwealth borrowed and repaid \$1.5 billion in cash in fiscal year 2015 and \$1.0 billion in fiscal year 2016. As of November 16, 2016, the Commonwealth has borrowed \$2.2 billion in cash for fiscal year 2017 for short-term working capital purposes. It is anticipated that the Commonwealth will borrow additional funds for the remainder of fiscal year 2017. All STIP Facility borrowings are repaid with interest within the fiscal year.

Line of Credit (Capital Facilities Fund). The Commonwealth has entered into an agreement with the Pennsylvania Treasury Department which allows the Commonwealth to engage in short-term borrowing of governmental monies on deposit with the Treasury to fund capital expenses within the fiscal year. As of October 31, 2016, the Commonwealth had a zero borrowing balance. If funds are borrowed, they are repaid with interest at settlement of the next general obligation bond issue.

Bond Anticipation Notes. Pending the issuance of general obligation bonds, the Commonwealth may issue bond anticipation notes subject to the same statutory and constitutional limitations generally imposed on general obligation bonds. The term of such borrowings may not exceed three years. Issuing authority rests with the Issuing Officials. No bond anticipation notes are outstanding.

Projected Issuance of Long-Term Debt

Table 19 on the next page shows projected future issuance of new-money general obligation bonds (or bond anticipation notes) through fiscal year 2020 as currently estimated, based on current authorizations. Included below in Table 19 are bonds expected to be issued under three bond referenda proposed by the Governor and enacted by the General Assembly in 2004, 2005 and 2008. Not included however, are bonds authorized under the economic stimulus program of the Commonwealth Financing Authority. Actual issuance of bonds will be affected by a number of economic and other factors and may vary significantly from the Table 19 projection.

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Table 19
Projected General Obligation Bond Issuance and Principal Retirements
Fiscal Years 2017-2020^(a)
(In Millions)

	<u>Fiscal Year Ending June 30</u>			
	<u>2017</u>	<u>2018</u>	<u>2019</u>	<u>2020</u>
Capital Facilities ^(b)				
Buildings and Structures.....	\$ 765	\$ 780	\$ 796	\$ 812
Furniture and Equipment.....	10	10	10	10
Transportation Assistance	175	175	175	175
Redevelopment Assistance.....	150	150	250	250
Flood Control	0	0	0	0
Highway and Bridge Projects	0	0	0	0
Special Purpose:				
Pennvest — 1988, 1992 & 2008 Referenda.....	20	15	0	0
Water and Wastewater Referendum ^(a)	0	0	0	0
Growing Greener II Referendum ^(a)	<u>6</u>	<u>0</u>	<u>0</u>	<u>0</u>
Total Projected Issuance.....	<u>\$ 1,126</u>	<u>\$ 1,130</u>	<u>\$ 1,231</u>	<u>\$ 1,247</u>
Principal Retirement ^(c)	<u>\$ 725.9</u>	<u>\$ 774.3</u>	<u>\$ 824.4</u>	<u>\$ 845.8</u>

Totals may not add due to rounding.

^(a) As proposed in the fiscal year 2017 enacted budget.

^(b) Includes issuance for new projects and for projects previously authorized.

^(c) On bonded debt outstanding and pro forma for projected bond issuances.

OTHER STATE-RELATED OBLIGATIONS

Pennsylvania Housing Finance Agency (“PHFA”)

The PHFA is a state-created agency that provides financing for housing for low and moderate-income families, and people with special housing needs in the Commonwealth. The bonds, but not the notes, of the PHFA are partially secured by a capital reserve fund required to be maintained by the PHFA in an amount equal to the maximum annual debt service on its outstanding bonds in any succeeding calendar year. If there is a potential deficiency in the capital reserve fund or if funds are necessary to avoid default on interest, principal or sinking fund payments on bonds or notes of PHFA, the statute creating PHFA directs the Governor, upon notification from PHFA, to include in the proposed executive budget of the Commonwealth for the next succeeding year an amount sufficient to fund such deficiency to avoid such default. The budget as finally adopted by the General Assembly may or may not include the amount so requested by the Governor. PHFA is not permitted to borrow additional funds so long as any deficiency exists in the capital reserve fund. No deficiency exists currently.

According to PHFA, as of June 30, 2016, PHFA had \$2,774.6 million of revenue bonds outstanding.

Lease Financing

The Commonwealth, through several of its departments and agencies, leases various real property and equipment. Some leases and the lease payments thereunder are, with the Commonwealth’s approval, pledged as security for debt obligations issued by certain public authorities or other entities within the state. All lease payments payable by Commonwealth departments and agencies are subject to and dependent upon an annual spending authorization being approved by the legislature through the Commonwealth’s annual budget process. The Commonwealth is not required by law to appropriate or otherwise provide moneys to pay lease payments. The obligations to be paid from such lease payments do not constitute bonded debt of the Commonwealth.

Table 20 below contains summary information on material obligations secured by lease payments of Commonwealth departments and agencies payable from the General Fund or other budgeted special funds.

Table 20
Obligations Secured By Commonwealth
Lease Payments (as of 12/31/15)
(In Thousands)

<u>Lessor</u>	<u>Purpose</u>	<u>Maximum Annual Lease Payment</u>	<u>Principal Amount Outstanding as of 12/31/2015</u>	<u>Final Maturity</u>
Harristown Development Corporation	Office Space	\$ 6,012	\$ 16,717	May 1, 2025
Philadelphia Regional Port Authority	Port Facilities	4,855	20,385	Sept. 1, 2020
Sports & Exhibition Authority of Pittsburgh and Allegheny County	Public Auditorium	18,604	283,605	Nov. 1, 2039
NORESCO, LLC	Equipment	2,158	13,855	Oct. 1, 2026
NORESCO, LLC	Equipment	1,559	10,550	Oct. 1, 2026
NORESCO/Johnson Controls	Equipment	8,416	66,380	Oct. 1, 2026
Pennsylvania Economic Development Finance Authority	Convention Center	26,641	239,390	June 15, 2039
Pennsylvania Economic Development Finance Authority	Office Space	18,123	102,235	Mar. 1, 2034
Pennsylvania Economic Development Finance Authority	Rapid Bridge Replacement	66,635	721,485	June 30, 2042

The Commonwealth has also leased port facilities of the Philadelphia Regional Port Authority (“PRPA”) to encourage trade through the Port of Philadelphia. Lease revenue bonds of PRPA in the amount of \$53.9 million were issued by PRPA in August 2003 to refund all outstanding PRPA Series 1993 Bonds. Lease revenue bonds of PRPA in the amount of \$41.9 million were issued by PRPA in September 2008 to refund the outstanding PRPA Series 2003 Bonds. These bonds are payable from lease payments made by the Commonwealth, subject to annual appropriation authorizing such payments to PRPA.

In 2009, the Commonwealth executed an annually renewable lease purchase agreement with CAFCO-PA Leasing I, LLC, a Colorado limited liability company to assist the Commonwealth, acting through its Department of Correction, to acquire certain modular prison dormitory facilities. Certificates of participation in the amount of \$19,300,000 were issued in December 2009. The certificates of participation are payable from lease payments made by the Commonwealth from and subject to annual appropriation to its Department of Corrections.

In 2010, the Commonwealth executed an installment purchase agreement with Noresco, LLC, a Massachusetts limited liability company. The purpose of the installment purchase agreement is to assist the Commonwealth, acting through its Department of Human Services, to acquire certain energy-savings improvements at its Ebensburg facility. Certificates of participation in the amount of \$15,580,000 were issued in March 2010 and are payable from lease payments made by the Commonwealth from and subject to annual appropriation to its Department of Human Services. The Commonwealth has also entered into additional installment purchase agreements with Noresco and Johnson Controls. Certificates of participation in the amount of \$86,850,000 were issued in October 2010 and are payable by the Commonwealth from and subject to annual appropriations to its Departments of General Services, Corrections and Human Services. Certificates of participation in the amount of \$12,385,000 were issued in December 2010 and are payable by the Commonwealth from and subject to annual appropriations to its Departments of General Services and Human Services. The purpose of the additional installment purchase agreements was to assist the Commonwealth, acting through various departments, to acquire certain energy-savings improvements.

On March 1, 2009, the Commonwealth entered into a 25 year master lease agreement for certain office space within the Forum Place complex in the city of Harrisburg. The master lease covered 375,000 square feet of office space and had a term through February 28, 2034. In January 2012, PEDFA (defined below) issued lease revenue bonds in the principal amount of \$107,360,000 to acquire the Forum Place complex from the then-controlling majority holder of the defaulted 1998 Dauphin County General Authority bonds. Contemporaneous with the issuance of the PEDFA bonds to acquire the Forum Place, the Capital Region Economic Development Corporation (CREDC) entered into an agreement with both the Commonwealth and PEDFA pursuant to which the Commonwealth leases approximately 375,000 square feet of office space and 500,000 square feet of parking space in the Forum Place complex from CREDC. The PEDFA Bonds are payable from lease payments made by the Commonwealth to CREDC from and subject to annual appropriations authorizing payments to various Commonwealth agencies occupying the leased space.

Lease for Pittsburgh Penguins Arena

In October 2007, the Commonwealth and the Sports and Exhibition Authority of Pittsburgh and Allegheny County (the "SEA") entered into a lease agreement (the "Arena Lease") that, while not creating indebtedness of the Commonwealth, creates a "subject to appropriation" obligation of the Commonwealth. The SEA, a joint public benefit authority, issued in October 2007 its \$313.3 million Commonwealth Lease Revenue Bonds (the "Arena Bonds") to finance a multi-purpose arena (the "Arena"), to serve as the home of the Pittsburgh Penguins (the "Penguins"), a hockey team in the National Hockey League. The Arena Bonds are not debt of the Commonwealth but are limited obligations of the SEA payable solely from the special revenues pledged therefor. These special revenues include annually (1) \$4.1 million from a lease with the Penguins, (2) not less than \$7.5 million from the operator of a casino located in the City of Pittsburgh, and (3) \$7.5 million from the Commonwealth's Economic Development and Tourism Fund (the "Development and Tourism Fund"). The Development and Tourism Fund is funded with an assessment of five percent of the gross terminal revenue of all total wagers received by all slot machines in the Commonwealth less cash payments.

While the special revenues were projected to be adequate to pay all debt service on the Arena Bonds, the revenues have not been able to fully cover the debt service. To the extent such revenues are in any year inadequate to cover debt service, the Commonwealth is obligated under the Arena Lease to fund such deficiency, subject in all cases to appropriation by the General Assembly. The maximum annual amount payable by the Commonwealth under the Arena Lease is \$18.6 million. In December 2009, the Commonwealth was notified by the SEA that an additional \$2.8 million would be required in fiscal year 2010 to support debt service. In compliance with its obligations under the Arena Lease, the Commonwealth included an appropriation request for \$2.8 million from the Pennsylvania Gaming and Economic Development Tourism Fund in its fiscal year 2010 budget. Subsequent to the fiscal year 2010 budget, the Commonwealth has been annually notified by the SEA that additional funds are required to support debt service. In each subsequent year, the Commonwealth included the appropriation request in the appropriate fiscal year budget. In fiscal year 2012, the actual amount appropriated to support the SEA debt service was \$163,885.00; in fiscal year 2013 it was \$96,470.00; in fiscal year 2014 it was \$544,684.00; in fiscal year 2015 it was \$736,853.00; and in fiscal year 2016 it was \$357,712.30. It is estimated to be \$770,152.63 for fiscal year 2017.

During April 2010, the SEA issued \$17.36 million in additional Commonwealth Lease Revenue Bonds (the "Supplemental Arena Bonds") to complete the Arena. The Supplemental Arena Bonds do not constitute debt of the Commonwealth but are limited obligations of the SEA payable solely from the special revenues pledged therefor. As with the Arena Bonds, the Commonwealth is obligated under the Arena Lease, as amended, to fund any deficiency in special revenues necessary to pay debt service on the Supplemental Arena Bonds, subject in all cases to appropriation by the General Assembly.

Pennsylvania Convention Center

In April 2010, the Commonwealth acquired (through ownership and a long-term leasehold interest) the Pennsylvania Convention Center located in Philadelphia, Pennsylvania and the expansion thereto that was recently constructed. Such acquisition was financed through the issuance by PEDFA (defined below) of \$281.075 million of revenue bonds (the "Convention Center Bonds"). The Commonwealth, the City of Philadelphia (the "City") and the Pennsylvania Convention Center Authority (the "Convention Center Authority") entered into an Operating Agreement (the "Operating Agreement") in connection with the issuance of the Convention Center Bonds and the acquisition of the Pennsylvania Convention Center which provides for the operation of the Pennsylvania Convention Center by the

Convention Center Authority (which also leases the facility), for the City to make an annual payment of \$15 million plus a percentage of its Hotel Room Rental Tax and Hospitality Promotion Tax revenues to support operations of the Pennsylvania Convention Center and for the Commonwealth to make payments to finance operating deficits and operating and capital reserve deposits of the Pennsylvania Convention Center and to pay debt service on the Convention Center Bonds. The Commonwealth also entered into a Grant Agreement (the “Grant Agreement”) with PEDFA and U.S. Bank National Association, as trustee for the Convention Center Bonds, with respect to the obligations of the Commonwealth to make the payments required under the Operating Agreement and related amounts due with respect to the Pennsylvania Convention Center and the Convention Center Bonds.

The obligations of the Commonwealth under the Operating Agreement and the Grant Agreement do not create indebtedness of the Commonwealth but are payable from (1) funds available in the Gaming Economic Development and Tourism Fund and (2) other funds of the Commonwealth, subject to annual appropriation by the state legislature. Payments from the Gaming Economic Development and Tourism Fund of up to \$64,000,000 per year for up to 30 years (but not exceeding \$880 million in the aggregate) have been appropriated by the General Assembly (by Act 53 of 2007, (“Act 53”)) for the payment of debt issued with regard to the Pennsylvania Convention Center and for operating expenses of the Pennsylvania Convention Center; however, there is no requirement in Act 53 or otherwise that funds in the Gaming Economic Development and Tourism Fund be so applied. Moneys in the Gaming Economic Development and Tourism Fund have also been appropriated by the General Assembly to a number of other projects and could be appropriated to additional projects in the future. The Gaming Economic Development and Tourism Fund is funded with an assessment of five percent of the gross terminal revenue of all total wagers received by all slot machines in the Commonwealth less cash payments. While the Gaming Economic Development and Tourism Fund is projected to continue to have sufficient revenues to pay its current appropriated obligations, there can be no absolute assurance that the Gaming Economic Development and Tourism Fund in any future fiscal year will receive sufficient receipts to pay its appropriated obligations.

Any payments due from the Commonwealth under the Operating Agreement and the Grant Agreement and which are not paid from the Gaming Economic Development and Tourism Fund are subject to annual appropriation by the General Assembly. The Commonwealth currently projects that payments materially in excess of the aggregate \$880 million appropriated from the Gaming Economic Development and Tourism Fund will be required to be paid by it to satisfy the Commonwealth’s obligations under the Operating Agreement and the Grant Agreement over the terms of such agreements.

Commonwealth Financing Authority

The Commonwealth Financing Authority (the “CFA”), was established in April 2004 with the enactment of legislation establishing the CFA as an independent authority and an instrumentality of the Commonwealth. The CFA is authorized to issue limited obligation revenue bonds and other types of limited obligation revenue financing for the purposes of promoting the health, safety, employment, business opportunities, economic activity and general welfare of the Commonwealth and its citizens through loans, grants, guarantees, leases, lines and letters of credit and other financing arrangements to benefit both for-profit and non-profit entities. The CFA’s bonds and financings are to be secured by revenues and accounts of the CFA, including funds appropriated to CFA from general and other revenues of the Commonwealth for repayment of CFA obligations. The obligations of the CFA do not constitute a debt or liability of the Commonwealth.

In Act 85 of 2016, the General Assembly enacted a new Section 1753.1-E of the Fiscal Code that obligates the State Treasurer, in consultation with the Commonwealth’s Secretary of the Budget, to transfer the monies necessary for payment of CFA’s debt service each fiscal year, beginning July 1, 2016 from sales tax receipts deposited in the General Fund to a restricted revenue account within the General Fund which may only be used to pay that debt service. Section 1753.1-E is a continuing appropriation of those monies from the State Treasury for payment of the CFA’s debt service each fiscal year. The obligations of the CFA do not constitute a debt or liability of the Commonwealth.

Since November 2005, the CFA has completed multiple bond issues to fund programs established by its original economic stimulus mission of April 2004.

As part of the enactment process for the fiscal year 2009 budget, the General Assembly enacted and on July 9, 2008, the Governor signed into law Act 63 of 2008 (“Act 63”) and Act 1 of Special Session 1 of 2008 (“Act 1”). Combined, these two acts provided the CFA with additional bond issuance authority of up to an additional \$1,300 million. Act 63 provides the CFA with authority to issue up to \$800 million in limited obligation revenue bonds in order to fund water or sewer projects, storm water projects, flood control projects and high hazard unsafe dam projects. Act 63 also provides for the use of Pennsylvania Gaming and Economic Development and Tourism Fund revenues to support debt service costs associated with the \$800 million in additional CFA debt authority. Act 1 provides the CFA with authority to issue up to \$500 million in limited obligation revenue bonds to fund the development of alternative sources of energy. As of February 29, 2016, the CFA had issued \$461.0 million in limited obligation revenue bonds authorized by Act 1. Further, the CFA has issued \$757.0 million in limited obligation revenue bonds authorized by Act 63.

As of October 31, 2016, the CFA had \$2,330.0 million in outstanding bond debt. With respect thereto, the Commonwealth’s General Fund has been the appropriation source used to service approximately \$1,636.0 million of such outstanding debt and the Pennsylvania Gaming and Economic Development and Tourism Fund has been the appropriation source used to service approximately \$694.0 million of such outstanding debt. Including the effect of a recent refunding, CFA debt service for fiscal year 2017 is estimated to be \$95.614 million (net of debt service in the estimated amount of \$56.28 million supported by transfers from the Pennsylvania Gaming and Economic Development Tourism Fund (the “PA GEDTF Funds”). The Commonwealth’s fiscal year 2016 budget appropriated \$88.801 million in funds from the Commonwealth’s General Fund to the CFA. The appropriated amount, together with \$6.810 million of funds required by state law to be transferred from the Pennsylvania Department of Environmental Protection to the CFA to support debt service on bonds issued pursuant to the Alternative Energy Investment Act (the “PA DEP Funds”) and \$56.437 million of PA GEDTF Funds, was sufficient for the CFA to meet its debt service obligations during the fiscal year ended June 30, 2016.

Pursuant to Act 25 of 2016 (“Act 25”), the CFA is authorized to issue debt related to the Commonwealth’s share of school district construction costs referred to as the PlanCon process. Act 25 established a new funding mechanism to pay school districts for construction reimbursements due to them and to fund capital grants to school districts as part of the PlanCon process. The CFA is authorized to issue up to \$2.5 billion in appropriation backed debt in connection with the Commonwealth’s share of school construction costs; debt in excess of \$2.5 billion may be incurred by CFA for this purpose if CFA and the Department of Education determine that \$2.5 billion is insufficient to carry out the purposes of Act 25 and if the Secretary of the Budget approves such determination. The expectation is that the borrowings will occur from time to time over the next five to ten years. To date, the CFA has issued \$758.185 million for construction reimbursement purposes under Act 25.

Pensions and Retirement Systems

General Information

The Commonwealth maintains contributory benefit pension plans covering all state employees, public school employees and employees of certain state-related organizations. State employees and employees of certain state-related organizations are members of the State Employees’ Retirement System (“SERS”). Public school employees are members of the Public School Employees’ Retirement System (“PSERS”). With certain exceptions, membership in the applicable retirement system is mandatory for covered employees.

SERS and PSERS are established by state law as independent administrative boards of the Commonwealth, each directed by a governing board that exercises control and management of its system, including the investment of its assets. The board of the SERS consists of eleven members, six appointed by the Governor, two members each from the Senate and House of Representatives and the State Treasurer. The PSERS board has fifteen members, including the Commonwealth’s Secretary of Education, the State Treasurer, the executive secretary of the Pennsylvania School Boards Association, two members appointed by the Governor, six elected members (five from among PSERS members and one from among school board members in Pennsylvania) and two members each from the Senate and the House of Representatives. The PSERS and SERS audited financial statements, investment policies and other data regarding the respective pension plans are available electronically at the following respective websites: www.psers.state.pa.us and www.sers.pa.gov.

The retirement plans of SERS and PSERS are contributory defined benefit plans for which the benefit payments to members and contribution rates by employees are specified in state law. Changes in benefit and contribution provisions for each retirement plan must be made by legislation enacted by the General Assembly. Under statutory provisions established in 1981, all legislative bills and amendments proposing to change a public employee pension or retirement plan are to be accompanied with an actuarial note prepared by an enrolled pension actuary providing an estimate of the cost and actuarial effect of the proposed change.

The Commonwealth's retirement programs are funded by contributions from both the employer and employee. The contribution rate for new PSERS members who enrolled in the pension plan on or after January 1, 2002 and before July 1, 2011 is 7.5 percent of compensation. The contribution rate for new PSERS members who enroll on or after July 1, 2011 is 7.5% or 10.3% depending upon elections made by each employee member. The contribution rates for PSERS members who enrolled prior to January 1, 2002 range from 5 percent to 7.5 percent of compensation, depending upon the date of commencement of employment and elections made by each employee member. The SERS' employee contribution rate is 6.25 percent for a majority of member employees. Interest on each employee's accumulated contributions is credited annually at a 4 percent rate mandated by state statute. Accumulated contributions plus interest credited are refundable to covered employees upon termination of their employment for most members hired before December 31, 2010, for SERS and before June 30, 2011, for PSERS.

Act 120 of 2010 and Commonwealth Contributions

On November 23, 2010, the Governor signed Act 120 of 2010 into law ("Act 120") to implement changes to the actuarial methodologies of both of the PSERS and the SERS pension plans. Act 120 also implemented employer contribution collars, set a minimum employer contribution rate, changed the retirement benefits for new employees and prohibited the use by the Commonwealth of pension obligation bonds, among other changes. In addition Act 120 proposed to amortize certain PSERS unfunded liability over 24 years and certain SERS unfunded liability over 30 years.

The most significant change to the Commonwealth benefit pension systems from Act 120 is the enactment of employer contribution collars to reduce the previously anticipated major increases in pension contributions which would have been required of the Commonwealth beginning in fiscal year 2013. Contribution collars are limits on the amount of year-over-year increase that are required from the employer, namely the Commonwealth, plus in the case of PSERS, the Commonwealth school districts. Contribution collars are expressed as a percentage of payroll and under Act 120, the contribution collars are 3.0 percent in fiscal year 2012, 3.5 percent in fiscal year 2013 and 4.5 percent in fiscal year 2014 and all future years beyond 2014 until the actuarial calculated rate is below the collared rate. To the extent the pension funds have large unfunded liabilities, as is presently the case, such capping of required employer contributions to the pension funds is likely to materially extend the period over which such unfunded liability is funded.

For PSERS, the employer's contribution is shared by the Commonwealth and the school districts. The Commonwealth remits its employer contribution portion to the school districts, which then remit the entire employer contributions (both school district and Commonwealth portions) to PSERS. The Commonwealth's contribution is appropriated annually from the General Fund to the Department of Education. In fiscal year 2008, the Commonwealth contributions to SERS and PSERS were \$237.5 million and \$451.2 million respectively, constituting 8.4 and 18 percent increases in the year-over-year contribution to SERS and PSERS, respectively. During fiscal year 2009, Commonwealth contributions to SERS and PSERS were \$242.5 million and \$360.6 million, a 2.1 percent increase and a 20.1 percent reduction, respectively, in year-over-year contributions. During fiscal year 2010, Commonwealth contributions totaled \$262.5 million for SERS, an 8.2 percent increase in year-over-year contributions, and for PSERS \$342.6 million, a 5.0 percent decrease in the year-over-year contributions. For fiscal year 2011, for SERS, the Commonwealth contribution was \$300.4 million, a 14.4 percent increase, and for PSERS, \$408.6 million, a 19.3 percent increase. For fiscal year 2012, the SERS Commonwealth contributions were \$463.7 million, a 54.4 percent increase and for PSERS, \$618.6 million, a 51 percent increase. For fiscal year 2013, the SERS Commonwealth contributions were \$660.7 million, a 42.5 percent increase and PSERS' Commonwealth contributions were \$925.2 million, a 50 percent increase. For fiscal year 2014, SERS Commonwealth contributions were 911.7 million, a 38.0 percent increase and PSERS' Commonwealth contributions were \$1.1 billion, a 19 percent increase. The Commonwealth's fiscal year 2015 SERS contributions were approximately \$1.2 billion, a 31.8 percent increase.

The Commonwealth's fiscal year 2015 PSERS contributions are expected to be approximately \$1.4 billion (69% of statutory ARC). The PSERS 2015 contributions included a one-time transfer of approximately \$225 million from the Tobacco Settlement Fund.

With respect to SERS, Commonwealth contributions were \$1.2 billion or 20.53 percent of payroll in fiscal year 2015 compared to anticipated contributions of \$1.9 billion or 31.44 percent of payroll without collar restrictions. For fiscal year 2016, under Act 120 the SERS Commonwealth contributions are expected to be approximately \$1.5 billion (approximately 100% of ARC). After 2016, the SERS Commonwealth contribution rates are expected to rise through fiscal year 2017 by the percentage increases as provided for in the collars. It will reach a maximum rate of 31.70 percent in fiscal year 2018 and then will decline slowly and not drop below 20 percent until fiscal year 2041.

Based on the 2009 valuations of the two retirement systems, Commonwealth contributions to both systems were projected to increase significantly in fiscal year 2012 based on pre-Act 120 provisions. Those increases were lowered in the near-term as a result of Act 120, but would continue to significantly rise over the next decade. For fiscal year 2014 the PSERS rate was 16.93% under the provisions of Act 120 compared to a pre-Act 120 rate of 32.32%. For fiscal year 2015 the PSERS rate was 21.40% under Act 120 compared to a pre-Act 120 rate of 33.83%. For fiscal year 2016 PSERS rate was 25.84% under Act 120 compared to a pre-Act 120 rate of 33.49%. For fiscal year 2017 PSERS rate is 30.03% which is an increase of less than the Act 120 4.5% collared rate increase. As a result PSERS fiscal year 2017 rate is uncollared and equals the actuarial required rate. After 2018, employer rates are expected to begin to level off and would reach a maximum rate of 35.85% in fiscal year 2035 and then begin to drop fairly significantly in fiscal year 2036 and thereafter.

Various bills and plans to amend the existing statutes have been discussed, proposed or introduced in the General Assembly, but not enacted. Such proposals have included proposals to provide for future employees a defined contribution plan (similar to 401(k) plans utilized in the private sector) and to again defer the escalation of the increased employer contribution rate which will tend to have the effect of lengthening the period of time necessary to fund the unfunded actuarial accrued liability for the pension plans.

The funding status of the SERS and PSERS pension plans has been among the factors cited by the rating agencies in their written analyses released in conjunction with the May 2016 rating reports on the Commonwealth general obligation bonds. See "Actuarial Calculations and Unfunded Actuarial Accrued Liability," Table 23 below regarding funding status and accrued liability for PSERS and SERS and see also "Ratings" herein.

Investment Performance

SERS returns for the calendar years 2012, 2013, 2014 and 2015 were, 12.0 percent, 13.6 percent, 6.4 percent, and 0.4 percent respectively. PSERS' fiscal years 2012, 2013, 2014 and 2015 and 2016 investment performance was 3.43 percent, 7.96 percent, 14.91 percent, 3.04 percent and 1.29 percent respectively. See "Actuarial Calculations and Unfunded Actuarial Accrued Liability" below regarding investment rate of return assumptions for PSERS and SERS.

Plan Assets

Contributions to the PSERS and SERS pension plans by the Commonwealth including medical premium assistance payments, employee contributions, interest earnings and benefit payments are shown in the following tables, which have been prepared by the respective staffs of PSERS and SERS.

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Table 21
Public School Employees' Retirement Fund
(In Millions)

Year Ended	Employer	Employee	Net Investment	Total Deductions		Plan Net
				From	Plan Net	
<u>June 30</u>	<u>Contributions</u>	<u>Contributions^(a)</u>	<u>Income (Loss)</u>	<u>Plan Net Assets^(b)</u>	<u>Assets^(c)</u>	
2008.....	\$ 835	\$ 880	\$ (1,776)	\$ 4,991	\$ 62,659	
2009.....	608	911	(16,198)	4,983	43,207	
2010.....	638	952	6,115	5,300	45,837	
2011.....	748	1,043	9,247	5,675	51,433	
2012.....	1,086	953	1,094	6,049	48,764	
2013.....	1,555	991	4,126	6,436	49,276	
2014.....	2,110	967	7,098	6,454	53,262	
2015.....	2,714	985	1,329	6,686	51,885	
2016.....	3,303	989	474	6,860	50,151	

^(a) PSERS no longer classifies member premiums to its Health Option Plans as Employee Contributions. Numbers have been adjusted for each year to reflect this change.

^(b) Includes PSERS administrative expenses.

^(c) For the fiscal year ended June 30, 2014, PSERS adopted GASB Statement 67 (Plans) which replaces requirements of Statement 25. This new standard impacts the accounting treatment of pension plans in which state and local governments participate. Major changes are: 1) the inclusion of unfunded pension liabilities on the government's balance sheet (such unfunded liabilities previously included as notes to the government's financial statements); 2) full pension costs are shown as expenses regardless of actual contribution levels; 3) lower actuarial discount rates may be required to be used for most plans for certain purposes of the financial statements, resulting in increased liabilities and pension expenses; and 4) shorter amortization periods for unfunded liabilities will be required to be used for certain purposes of the financial statements, which generally would increase pension expenses. Except as noted, the presentations above include the effects of financial activity related to the administration of the PSERS healthcare insurance premium assistance program and Health Options Program. As required with the adoption of GASB Statement No. 26, separate financial presentations for these programs are made in PSERS financial statements. PSERS also adopted GASB Statement No. 34 for the fiscal year beginning July 1, 2001 that requires the presentation of Management's Discussion and Analysis as required supplementary information preceding the financial statement.

Table 22
State Employees' Retirement Fund
(In Millions)

Year Ended	Employer	Employee	Net Investment	Total Deductions		Plan Net
				From	Plan Net	
<u>December 31</u>	<u>Contributions</u>	<u>Contributions</u>	<u>Income Loss^(a)</u>	<u>Plan Net Assets^(b)</u>	<u>Assets^(c)</u>	
2008.....	\$ 235	\$ 337	\$ (11,061)	\$ 2,231	\$ 22,796	
2009.....	253	349	3,561	2,297	24,662	
2010.....	273	349	3,076	2,474	25,886	
2011.....	392	351	480	2,732	24,377	
2012.....	566	348	2,794	2,696	25,389	
2013.....	795	352	3,424	2,866	27,394	
2014.....	1,084	366	1,462	2,968	27,338	
2015.....	1,360	372	88	3,103	26,055	

^(a) Includes net appreciation (depreciation) in fair value of investments.

^(b) Includes SERS administrative costs.

^(c) Market value of investment assets. For the fiscal year ended December 31, 2014, SERS adopted GASB Statement No. 67, which replaces requirements of GASB Statement No. 25. These require that investments be reported at their fair value. Also includes securities lending collateral pool pursuant to GASB Statement No. 28.

Actuarial Calculations and Unfunded Actuarial Accrued Liability

Annual actuarial valuations are required by state law to determine the employer contribution rates necessary to accumulate sufficient assets and provide for payment of future benefits. Actuarial assessments are "forward-looking" information that reflect the judgment of the fiduciaries of the pension plans, and are based upon a variety of assumptions, one or more of which may prove to be inaccurate or be changed in the future. Actuarial assessments will change with the future experience of the pension plans. The actuary's recommendations for employer contribution rates represent a funding plan for meeting current and future retirement obligations. The employer's contribution rate is computed to fully amortize the unfunded actuarial accrued liability of a plan as determined by the actuary. The

unfunded accrued liability is a measure of the present value of benefits estimated to be due in the future for current employees under specified assumptions as to mortality, pay levels, retirement experience and employee turnover, less the present value of assets available to pay those benefits, under specified assumptions of normal cost, supplemental annuity amortization, employer contribution levels and employee contributions. The unfunded actuarial accrued liability for recent years with completed valuations is shown in Table 23 below for both SERS and PSERS.

The Boards of PSERS and SERS periodically review their respective system actuarial assumptions with actuaries, investment consultants and staff and determine whether to make any prospective changes to these assumptions. Both Boards have adopted changes to their respective system actuarial assumptions. In January 2009, the PSERS Board of Trustees decreased PSERS' actuarial investment rate of return assumption from 8.5 percent to 8.25 percent, effective for the June 30, 2008 actuarial valuation, and further decreased the rate of return assumption from 8.25 percent to 8.0 percent for the June 30, 2009 valuation. In March 2011, the PSERS Board decreased the actuarial investment rate of return for a third time from 8.0 percent to 7.5 percent for the June 30, 2011 actuarial valuation based on a further reduction in the long term capital market rate of return assumptions of its investment consultant. In June 2016, the PSERS Board decreased the actuarial rate of return for a fourth time in eight years from 7.5 percent to 7.25 percent for the June 30, 2016 actuarial valuation based on a further reduction in expected long term capital market return assumptions. In April 2009, the State Employees' Retirement Board decreased SERS' assumed rate of return on investments from 8.5 percent to 8.0 percent effective for the December 31, 2008 valuation. In May 2012, SERS' Board decreased the actuarial rate of return from 8.0 percent to 7.5 percent for the December 31, 2011 valuation. These changes to SERS' and PSERS' investment return assumptions conform to the median assumption used by public pension funds nationally.

Table 23
Unfunded Actuarial Accrued Liability
2005-2015
(In Millions)

<u>Valuation Year Ended In</u>	<u>SERS^(a)</u>	<u>PSERS^(b)</u>
2006.....	2,216	12,163
2007.....	914	9,438
2008.....	3,801	9,924
2009.....	5,592	15,739
2010.....	9,736	19,699
2011.....	14,664	26,499
2012.....	17,753	29,533
2013.....	17,900	32,599
2014.....	18,166	35,121
2015.....	19,452	37,336

^(a) The fiscal year for SERS ends on December 31 of each year.

^(b) The fiscal year for PSERS ends on June 30 of each year. Amounts presented are for Pension only and excludes Premium Assistance.

The funded ratios, on an actuarial value of assets basis, for PSERS and SERS were 63.8% and 59.2%, respectively as of their 2013 actuarial valuations. For PSERS, its funded ratios as of June 30, 2014 were 62.0% and approximately 57.4% on an actuarial and market value basis, respectively. For PSERS, its funded ratios as of June 30, 2015 were 60.6% and 54.6% on an actuarial and market value basis, respectively. For SERS, its funded ratios as of December 31, 2015 were 58.0% and 56.2% on an actuarial and market value basis, respectively.

The net increase in the unfunded actuarial accrued liability is attributable to legislative pension plan modifications to limit funding increases, to changes to the actuarial assumptions and to recent actual rates of return on pension fund investments being materially below the actuarially assumed rates.

Previously for financial reporting purposes, both PSERS and SERS adopted the Governmental Accounting Standards Board's Statement No. 25. Statement No. 25 required a specific method of accounting and financial reporting for defined benefit pension plans. Among other things, Statement No. 25 required a comparison of employer

contributions to “annual required contributions” (“ARC”). Governmental Accounting Standards Board’s Statement No. 25 is superseded by Governmental Accounting Standards Board’s Statement No. 67 and only provided for informational purposes. Currently for financial reporting purposes starting with December 31, 2014, SERS adopted Governmental Accounting Standards Board’s Statement No. 67, which is discussed in the following section under “New Accounting Standards”. While no longer applicable to 2014 and subsequent years for SERS, the following table is being provided for informational purposes.

Table 24
Comparison of Employer Contributions to Annual Required Contributions
(In Thousands)

Public School Employees’ Retirement Fund^(a)

<u>Year Ended</u> <u>June 30</u>	<u>Annual</u> <u>Required Contrib</u> <u>utions</u>	<u>Actual</u> <u>Employer</u> <u>Contributions</u>	<u>Percentages</u> <u>Contrib</u> <u>uted</u>
2016	\$ 3,976,798	\$ 3,181,438*	80%
2015	3,760,827	2,582,114*	69
2014	3,410,373	1,986,384*	58
2013	3,110,429	1,434,815*	46
2012	2,629,244	1,001,140*	38
2011	2,436,602	646,700*	27
2010	1,928,278	527,212*	27
2009	1,761,295	503,227*	29
2008	1,852,238	753,532	41
2007	1,708,821	659,545	39

State Employees’ Retirement Fund^(b)

<u>Year Ended</u> <u>December 31</u>	<u>Annual</u> <u>Required Contri</u> <u>butions</u>	<u>Actual</u> <u>Employer</u> <u>Contributions</u>	<u>Percentages</u> <u>Contrib</u> <u>uted</u>
2015	\$ 1,469,116	\$ 1,360,431	93%
2014	1,407,361	1,084,104	77
2013	1,314,925	794,911	60
2012	1,044,632	565,621	54
2011	913,778	391,749	43
2010	866,822	273,083	31
2009	643,861	253,250	39
2008	584,248	235,288	40
2007	617,253	243,936	39
2006	584,745	196,420	36

^(a) Amounts presented are for Pension only and excludes Premium Assistance

^(b) The ARC is calculated as part of SERS funding valuation using Governmental Accounting Standards Board Statement No. 25 (GASB 25) requirements. Starting in 2014, GASB 25 was superseded by Governmental Accounting Standards Board Statement No. 67 (GASB 67) for accounting purposes. GASB 67 replaces the ARC with an actuarially determined contribution (ADC). While no longer applicable to 2014 and subsequent years, this disclosure is being provided for informational purposes.

(*) Net of purchase of service contributions

New Accounting Standards

In June 2012, GASB issued Statement No. 67 (GASB 67) (Financial Reporting for Pension Plans), which replaces requirements of GASB Statement No. 25 (effective for fiscal years beginning after June 15, 2013) and Statement No. 68 (Accounting and Financial Reporting for Pension Plans by Employers), which replaces the requirements of Statements No. 27 and No. 50 (effective for fiscal years beginning after June 15, 2014). These new standards impact the accounting treatment of pension plans in which state and local governments participate. Major changes are: 1) the inclusion of unfunded pension liabilities on the government’s balance sheet (such unfunded liabilities were typically included as notes to the government’s financial statements); 2) full pension costs are to be shown as expenses regardless of actual contribution levels; 3) lower actuarial discount rates may be required to be used

for most plans for certain purposes of the financial statements, resulting in increased liabilities and pension expenses; and 4) shorter amortization periods for unfunded liabilities will be required to be used for certain purposes of the financial statements, which generally would increase pension expenses.

PSERS implemented GASB 67 in fiscal year 2013-14. SERS is the administrator of a cost-sharing multiple-employer defined benefit pension plan and reports required items per GASB 67 in Notes to Financial Statements as well as in Required Supplementary Information starting with its 2014 Comprehensive Annual Financial Report. SERS implemented GASB 67 as of December 31, 2014 but also retroactively reported as of December 31, 2013. For SERS as of December 31, 2015 and 2014, net pension liability was \$18.18 billion and \$14.86 billion, respectively, while plan fiduciary net position as a percentage of the total pension liability was 58.9 percent and 64.8 percent, respectively. For SERS as of December 31, 2015, actuarially determined contribution (ADC) and contributions in relation to the ADC were both \$1,360 million. For SERS as of December 31, 2014, actuarially determined contribution (ADC) and contributions in relation to the ADC were both \$1,084 million.

Other Post-Employment Benefits

In addition to a defined benefit pension plan for state employees and employees of certain state-related organizations, the Commonwealth also provides health care plans for its eligible retirees and their qualifying dependents. These and similar plans are commonly referred to as “other post-employment benefits” or “OPEBs.” The Commonwealth provides OPEBs under two plans. The Retired Pennsylvania State Police Program (RPSPP) provides collectively bargained benefits to retired state enlisted members and their dependents. The Retired Employee Health Program (REHP) provides Commonwealth-determined benefits to other retired state employees and their dependents.

The General Assembly, based upon the Governor’s request, annually appropriates funds to meet the obligation to pay current retiree health care benefits on a “pay-as-you-go” basis. Retiree health care expenditures are currently funded by the Commonwealth’s General Fund (approximately 41 percent), and by Federal, Other and Special Funds. Commonwealth costs for such benefits totaled \$662 million in fiscal year 2013, \$664 million in fiscal year 2014 and \$725 in 2015. Fiscal year 2016 employer contributions were approximately \$895 million.

Governmental Accounting Standards Board Statement #45

On June 21, 2004, the Governmental Accounting Standards Board (GASB) released its Statement No. 45, *Accounting and Financial Reporting by Employers for Postemployment Benefits Other Than Pensions* (“Statement No. 45”). Statement No. 45 establishes standards for the measurement, recognition and display in the financial reports of state and local governments of obligations to pay OPEBs, when provided separately from a pension plan, expense or expenditures and related liabilities. Under Statement No. 45, governments are required to: (i) measure the costs of benefits, and recognize other post-employment benefits expenses, on the accrual basis of accounting during periods that employees are providing service; (ii) provide information about the actuarial liabilities of promised benefits associated with past service and whether, or to what extent, those benefits have been funded; and (iii) provide information useful in assessing potential demands on the employer’s future cash flows.

In fiscal year 2008, the Commonwealth’s Office of Budget entered into an Interagency Agreement with the independent Pennsylvania Department of Treasury to establish irrevocable trust equivalent arrangements trust accounts for the purpose of providing advance funding to both the REHP and RPSPP programs. The Commonwealth had previously established restricted receipt accounts for the REHP and RPSPP programs in order to accumulate funds to pay retiree health care costs on a “pay-as-you-go” basis while maintaining an adequate reserve balance.

In fiscal year 2016, \$50 million was transferred to the REHP Trust Account from the pre-existing restricted receipt account. No additional transfers have been made to the trust accounts. At the end of fiscal year 2016, the combined balance in the trust accounts and restricted receipt accounts was \$813 million.

The Commonwealth has retained Deloitte Consulting, LLP, a multinational professional services firm, to provide actuarial services for GASB 45 implementation and reporting. The Deloitte Consulting’s 2015 OPEB valuation for the REHP and RPSPP programs is updated to reflect the following:

1. The combined unfunded actuarial accrued liability (“UAAL”) as of June 30, 2015 was \$19,440 million. The UAAL for the REHP was \$15,989 million comprised of an actuarial accrued liability of \$16,134

million less \$145 million of plan assets. The UAAL for the RPSPP was \$3,450 million comprised of an actuarial accrued liability of \$3,530 million less \$80 million of plan assets.

2. The OPEB liability as of June 30, 2015 was \$2,808 million consisting of \$1,979 million for the REHP and \$829 million for the RPSPP.

Unemployment Compensation

On June 30, 2012 the Commonwealth had \$2,592.7 million in outstanding loans from the Federal Unemployment Account to the Pennsylvania Unemployment Compensation Fund (the “UC Fund”).

The Commonwealth was one of 35 states that had exhausted its UC Fund balances during the most recent economic downturn. The federal loans, which began in March 2009, were needed to fund unemployment compensation benefits in excess of UC Fund receipts.

Under current federal law, such loans must be repaid by the states with interest. Under ARRA, a waiver of interest on federal loans was extended through the end of calendar year 2010. Beginning in January 2011, interest started to accrue on outstanding loan amounts. Pursuant to the Unemployment Compensation Law, for each year in which interest is due on federal loans the Department calculates an Interest Factor tax to be paid by Commonwealth employers on the first \$8,000 in wages paid to each employee. The assigned Interest Factor rate was 0.44 percent for calendar year 2011 and 0.20 percent for calendar year 2012. In addition, federal law requires that employers in a state with an outstanding loan balance at the end of two consecutive years must pay additional federal unemployment taxes (“FUTA”) to repay the principal of the loan. Initially this FUTA tax increase is 0.3 percent on the federal wage base of \$7,000 and automatically increases by 0.3 percent each year that the loan remains outstanding.

Based on econometric assumptions and in the absence of legislative action to improve the UC Fund’s solvency and address the federal debt, the Commonwealth anticipated that the UC Fund would continue to require federal loans to pay benefits through at least 2018 and projected that its outstanding loan balance would total \$286 million by 2018. Mandatory loan repayments through increased FUTA taxes, which began in 2011, were expected to grow from \$94 million that year to an estimated \$854 million annually by 2018. Additional voluntary loan repayments from the UC Fund would likely decrease from an estimated \$2,560 million in fiscal year 2011 to \$176 million by fiscal year 2018 and the estimated interest on the outstanding UC Fund loans would drop from \$101 million annually in fiscal year 2011 to \$9 million by fiscal year 2018. UC Fund-related expenditures did not have any impact on the Commonwealth’s General Fund. They are funded solely by federal taxes, the UC Fund and the Interest Factor assessment, none of which affect the revenues or expenditures of the General Fund.

To address these circumstances, on June 12, 2012 the Commonwealth amended its unemployment compensation law by enactment of Act No. 2012-60, approved June 12, 2012 (“Act 60”), which among other things, authorized the issuance of up to \$4,500 million of unemployment compensation bonds by the Department of Labor and Industry acting through the Pennsylvania Economic Development Financing Authority (“PEDFA”). The proceeds of such bonds, (the “UC Bonds”) could be used to repay all outstanding loan advances, including interest, from the Federal Unemployment Account as well as to provide additional funding for the UC Fund. Unemployment Compensation Bonds (“UC Bonds”) would be issued only if the Department of Labor and Industry determined that such issuance would result in a savings to Pennsylvania employers. A stable funding source, i.e. the Interest Factor tax (with a maximum rate not to exceed 1.1%) would finance the repayment of the UC Bonds.

Also, the Act includes a number of provisions intended to stabilize the UC Fund on an ongoing basis, including enhanced collections authority for the Department of Labor and Industry, a longer statute of limitations for collection of fault overpayments, an increase in the taxable wage base, closing of loopholes in eligibility requirements, and an amnesty program to give employers and claimants an incentive to pay unemployment compensation debts.

Overall, the key provisions of Act 6 of 2011 (further providing for definitions, for relief from charges for certain employers and for establishment and maintenance of employer's reserve accounts; providing for automatic relief from charges; further providing for qualifications required to secure compensation, for rate and amount of compensation, for definitions and for rules of procedure; and providing for shared-work program and for applicability) and Act 60 of 2012 are estimated to produce average annual savings of \$260 million per year for the UC Fund.

On July 25, 2012, PEDFA closed on a \$3,185.0 million interim financing with Citibank to both fully repay the outstanding loan from the Federal Unemployment Account and to fund the continued payment of benefits for a period through the Fall of 2012. On October 18, 2012 and as permitted under the Act, PEDFA issued its \$2,827.4 million Unemployment Compensation Revenue Bonds which are secured by certain assessments on contributing employers doing business in Pennsylvania. Proceeds of the UC Bonds were used to repay the Citibank interim financing. As a result of the Citibank interim financing, PEDFA's issuance of its UC Bonds, and lower projected debt levels through the benefit reductions of Act 6 and Act 60, the Commonwealth estimates that it will save employers an estimated \$100 million in interest costs as compared to repaying the projected federal advances through increased FUTA taxes with interest at the federal rate.

GOVERNMENT AUTHORITIES AND OTHER ORGANIZATIONS

Certain state-created organizations have statutory authorization to issue debt for which state appropriations to pay debt service thereon are not required. The debt of these organizations is funded by assets of, or revenues derived from, the various projects financed and is not a statutory or moral obligation of the Commonwealth. However, some of these organizations are indirectly dependent upon Commonwealth operating appropriations. In addition, the Commonwealth may choose to take action to financially assist these organizations. These organizations, their purposes and their outstanding debt, as computed by each organization, (excluding swap obligations) are as follows:

Delaware River Joint Toll Bridge Commission ("DRJTBC"). The DRJTBC, a public corporation of the Commonwealth and New Jersey, owns and operates bridges across the Delaware River. Debt service on bonds is paid from tolls and other revenues of the Commission. The DRJTBC had \$314.1 million in bonds outstanding as of June 30, 2016.

Delaware River Port Authority ("DRPA"). The DRPA, a public corporation of the Commonwealth and New Jersey, operates several toll bridges over the Delaware River, and promotes the use of the Philadelphia-Camden port and promotes economic development in the port district. Debt service on bonds is paid from toll revenues and other revenues pledged by DRPA to repayment of bonds. The DRPA had \$1,511.6 million in revenue bond debt outstanding as June 30, 2016.

Pennsylvania Economic Development Financing Authority ("PEDFA"). The PEDFA was created in 1987 to offer pooled bond and other bond issues of both taxable and tax-exempt bonds on behalf of local industrial and commercial development authorities for economic development projects. Bonds may be payable from and secured by loan repayments and all other revenues of the PEDFA. The PEDFA had \$6,234.6 million of debt outstanding as of June 30, 2016.

Pennsylvania Energy Development Authority ("PEDA"). The PEDA was created in 1982 to finance energy research projects, demonstration projects promoting the production or conservation of energy and the promotion, utilization and transportation of Pennsylvania energy resources. The authority's funding is from appropriations and project revenues. Debt service on bonds is paid from project revenues and other revenues pledged by PEDA to repayment of bonds. The PEDA had no bonds outstanding as of June 30, 2016.

Pennsylvania Higher Education Assistance Agency ("PHEAA"). The PHEAA makes or guarantees student loans to students or parents, or to lending institutions or post-secondary institutions. Debt service on the bonds is paid by loan interest and repayments and other agency revenues. The PHEAA had \$5,728.0 million in bonds outstanding as of June 30, 2016.

Pennsylvania Higher Educational Facilities Authority ("PHEFA"). The PHEFA is a public corporation of the Commonwealth established to finance college facilities. As of June 30, 2016, the PHEFA had \$5,998.2 million in revenue bonds and notes outstanding payable from the lease rentals or loan repayments of the projects financed. Some of the lessees or borrowers, although private institutions, receive grants and subsidies from the Commonwealth.

Pennsylvania Industrial Development Authority ("PIDA"). The PIDA is a public corporation of the Commonwealth established for the purpose of financing economic development. The PIDA had \$199.5 million in revenue bond debt outstanding on June 30, 2016, to which all of its revenues are pledged.

Pennsylvania Infrastructure Investment Authority (“Pennvest”). Pennvest was created in 1988 to provide low-interest rate loans and grants for the purpose of constructing new and improving existing water supply and sewage disposal systems to protect the health and safety of the citizens of the Commonwealth and to promote economic development within the Commonwealth. Loans and grants are available to local governments and, in certain circumstances, to private companies. The Pennvest bonds are secured by principal repayments and interest payments on Pennvest loans. Pennvest had \$63.2 million of revenue bonds outstanding as of June 30, 2016.

Pennsylvania Turnpike Commission (“PTC”). The PTC operates the Pennsylvania Turnpike System (“System”). Its outstanding indebtedness, \$11,411.8 million as of June 30, 2016, is payable from the net revenues of the System, primarily toll revenues and rentals from leases and concessions or from certain taxes dedicated to the System.

State Public School Building Authority (“SPSBA”). The SPSBA finances public school projects and community college capital projects. Bonds issued by the SPSBA are supported by the lease rental payments or loan repayments made to the SPSBA by local school districts and the community colleges. A portion of the funds appropriated annually by the Commonwealth as aid to local school districts and community colleges may be used by them to pay a portion of such lease rental payments or loan repayments. The SPSBA had \$3,017.6 million of revenue bonds outstanding as of June 30, 2016.

CITY OF PHILADELPHIA – PICA

The Pennsylvania Intergovernmental Cooperation Authority (“PICA”) was created by Commonwealth Act No. 1991-6, approved June 5, 1991 to assist the City of Philadelphia (the “City”), the Commonwealth’s largest city, in remedying its fiscal emergencies. PICA is authorized to provide financial assistance to the City through the issuance of debt, and to make factual findings and recommendations to the City concerning its budgetary and fiscal affairs. This financial assistance has included grants used by the City for defeasance of certain City general obligation bonds, funding of capital projects, and the liquidation of the cumulative general fund deficit of the City, as of June 30, 1992, of \$224.9 million. Currently the City is operating under a five-year financial plan covering fiscal years 2016 through 2020 which was approved by PICA.

No further bonds may be issued by PICA for the purpose of financing capital projects or an operating deficit, as the authority for such bond issuance expired December 31, 1994. PICA’s authority to issue debt for the purpose of financing a cash flow deficit expired on December 31, 1996. Its ability to refund existing outstanding debt is unrestricted. PICA had \$345.2 million in special tax revenue bonds outstanding as of June 30, 2015. Neither the taxing power nor the credit of the Commonwealth is pledged to pay debt service on PICA’s bonds.

LITIGATION

The Commonwealth’s Office of Attorney General and Office of General Counsel have reviewed the status of pending litigation against the Commonwealth, its officers and employees, and have provided the following brief descriptions of certain cases affecting the Commonwealth.

In 1978, the General Assembly approved a limited waiver of sovereign immunity with respect to lawsuits against the Commonwealth. This cap does not apply to tax appeals, such as *Nextel Communications* as detailed below. Damages for any loss are limited to \$250,000 for each person and \$1,000,000 for each accident. The Supreme Court of Pennsylvania has held that this limitation is constitutional. Approximately 850 suits against the Commonwealth remain open. Tort claim payments for the departments and agencies, other than the Department of Transportation, are paid from departmental and agency operating and program appropriations. Tort claim payments for the Department of Transportation are paid from an appropriation from the Motor License Fund. The Commonwealth also represents and indemnifies employees who have been sued under Federal civil rights statutes for actions taken in good faith in carrying out their employment responsibilities. There are no caps on damages in civil rights actions. The Commonwealth’s self insurance program covers damages in these cases up to \$250,000 per incident. Damages in excess of \$250,000 are paid from departmental and agency operating and program appropriations.

John Doe v. Theodore Dallas, Sec. of Department of Human Services (E.D., PA)

In *John Doe*, a Delaware County transgender man who was denied Medicaid coverage for a hysterectomy sued the state in federal court claiming the denial violates his civil rights. The lawsuit names Secretary Dallas, in his official capacity as Secretary of Department of Human Services (Department), as the sole defendant and asks for declaratory judgment and injunctive relief to end the state's Medicaid ban on covering treatment for gender dysphoria. The 30-year-old plaintiff is now seeking Medicaid coverage for a total hysterectomy his doctor prescribed as medically necessary to treat gender dysphoria. Keystone First Health Plan (one of the Department's managed care organizations) denied the request and an administrative law judge upheld the denial on appeal citing the state regulatory ban.

The Department's Medical Assistance (MA) regulations forbid Medicaid fee-for-service payment for surgical procedures for gender change or reassignment. While Medicare historically has excluded gender reassignment, the federal Center for Medicare & Medicaid Services (CMS) lifted that ban in May 2014, leaving decisions on transgender-related coverage to be made on a case-by-case basis. CMS has also issued proposed regulations that would prohibit state Medicaid programs from refusing to cover transgender-related services. Only a few states, including New York, Oregon, Maryland, Massachusetts and Vermont, and Washington, D.C., have explicitly approved Medicaid coverage for transgender-related medical treatment.

The Department filed an Answer to the Complaint, asserting that current federal law does not require the Department to offer Medicaid coverage for the medical procedures. The lawsuit is expected to be decided as a matter of law, rather than upon any extensive record. In the event of an adverse ruling, the Department estimates that the annual cost for Medicaid coverage for the gender transition surgeries, including follow up treatments ordinarily associated with these medical procedures, is approximately twenty-five million dollars.

Pennsylvania Department of Education v. Secretary, United States Department of Education (3rd Cir.)

On March 10, 2016, the United States Court of Appeals for the Third Circuit affirmed the Findings of the Secretary of the United States Department of Education (USDE), which found that the Pennsylvania Department of Education (PDE) is liable to USDE in the amount of \$7,186,222. PDE's alleged liability stems from the USDE's audit of the School District of Philadelphia (SDP) for fiscal year 2005-2006, which identified \$138.8 million in adverse findings resulting from inadequate controls over federal expenditures. Of this total, \$7.2 million remains at issue.

PDE appealed the USDE's audit findings to the USDE office of administrative law judge (ALJ), asserting (1) that the statute of limitations barred USDE from seeking \$5.3 million in contract and personnel costs that were obligated more than five years before the issuance of the Program Determination Letter; and (2) that the doctrine of equitable offset permitted SDP to offset the remaining liability with proven costs related to other activities that would have been eligible costs under the federal programs during the audit year, but which were paid for with non-federal funds.

The ALJ issued a decision sustaining the total remaining liability of \$7,186,222 against PDE. PDE appealed this Decision to the U.S. Secretary of Education (Secretary) on March 31, 2014. On December 29, 2014, the Secretary affirmed that PDE remained liable for \$7,186,222 and concluded that the underlying violations as described by the OIG's Audit Report and the March 2011 PDL did not warrant an equitable remedy, noting that PDE had "failed to produce any evidence" in support of the disallowed expenditures. equitable remedy based on the underlying circumstances was within the trier of fact's discretion and was consistent with dicta from prior cases. Therefore, the Secretary denied equitable offset without consideration of PDE's evidence of available offsetting costs or substantial corrective actions.

PDE subsequently appealed to the United States Court of Appeals for the Third Circuit, which denied PDE's petition for review and affirmed the Secretary's Decision, thus affirming that PDE remains liable to USDE in the amount of \$7,186,222. PDE filed a Petition for Certiorari with the United States Supreme Court. The Petition was denied on October 3, 2016.

United States of America v. Com. of Pa., Civil Action (U.S.D.C., M.D. Pa.)

On July 29, 2014, the U.S. Department of Justice (DOJ) filed a complaint alleging disparate impact discrimination against the Pennsylvania State Police ("PSP"), based on the female cadet hiring rates. This was based on an investigation undertaken by the DOJ from 2009 – 2014, and occurred after several months of mediation with DOJ on

a possible settlement. DOJ attributes the alleged discrimination to the failure rate of female cadets on the Physical Readiness Test, or PRT. In addition to injunctive relief regarding the administration of the test, DOJ seeks back pay with interest for a women who failed the PRT, offers of employment, retroactive seniority and other monetary and non-monetary benefits to women who suffered loses or will suffer losses in the future based on the alleged discriminatory practices. Enjoining the administration of the current PRT will require the development of a new test. Costs associated with an adverse result are difficult to assess but could range in the tens of millions depending upon the scope of any order issued by the Court and the number of women who may have to be compensated for lost salary, seniority and other benefits.

The trial court denied PSP's Motion to Dismiss. The motion to dismiss was based on the language of Title VII, which PSP alleged required specific intent of discrimination in disparate impact cases filed by the DOJ against states. Discovery is concluded. Dispositive motions have been filed and are pending with the Court. Absent a ruling in favor of PSP, trial will begin March 6, 2017.

Nextel Communications of the Mid-Atlantic, Inc. v. Commonwealth of Pennsylvania (Pennsylvania Supreme Court).

On September 16, 2015, the Commonwealth Court of Pennsylvania held that the Pennsylvania net operating loss deduction ("NOL Deduction"), as-applied to the facts of *Nextel*, violated the Uniformity Clause of the Pennsylvania Constitution, a decision that could negatively affect the Commonwealth's tax revenues.

The sole issue in the case was whether the NOL Deduction violated the Uniformity Clause. The Uniformity Clause provides: "All taxes shall be uniform, upon the same class of subjects, within the territorial limits of the authority levying the tax"

Pennsylvania law allows corporate taxpayers to deduct losses incurred in prior tax years to reduce the taxable income in subsequent years, and this deduction is referred as the NOL Deduction. The NOL Deduction is, however, limited. For example, in the tax year at issue in *Nextel*, the amount of the NOL Deduction was limited to the greater of: (i) 12.5% of the taxpayer's taxable income or (ii) \$3 million.

The Court held that the NOL Deduction creates different classes of taxpayers based solely upon the amount of their income. The Court reasoned that the NOL Deduction favored "small taxpayers" (those with \$3 million or less in taxable income) over "large taxpayers" (those with taxable income in excess of \$3 million). The Court stated the only factor that distinguishes between these two classes of taxpayers is the amount of taxable income. Taxpayers with \$3 million or less in taxable income could offset up to 100% of their taxable income through the NOL Deduction, because the statute allows a greater of 12.5% of taxable income or \$3 million deduction. Taxpayers with more than \$3 million in taxable income in the tax year at issue (2007), however, could not offset up to 100% of their taxable income. In fact, the Court noted the higher the taxable income of the taxpayer, the lower the percentage of taxable income the taxpayer could offset through the NOL Deduction.

The NOL Deduction for the tax year at issue allows some taxpayers to reduce their taxable income to \$0 and, as a result, pay no tax. The same provision also prevents other taxpayers from reducing their taxable income to \$0 and, as a result, causes these affected taxpayers to pay at least some CNI tax.

The Court held that a classification based solely on income amount cannot withstand scrutiny under the Uniformity Clause. Although the Uniformity Clause does not require absolute equality and perfect uniformity in taxation, the legislature cannot treat similarly-situated taxpayers differently, unless the classification is based upon some legitimate distinction between the classes that provides a non-arbitrary and "reasonable and just" basis for the difference in treatment. In this case, the court found that the classification was based upon "[a] pretended classification, that is based solely on a difference in quantity of precisely the same kind of property, is necessarily unjust, arbitrary, and illegal." Thus, in this case distinguishing between taxpayers based upon their taxable income is impermissible.

The Court rejected the Commonwealth's claim that the General Assembly had sound budgetary reasons for imposing the NOL Deduction limitations and that justification should satisfy the differences created by the NOL Deduction. Accordingly, the Court held \$3 million fixed dollar cap, as-applied to this taxpayer, violated the Uniformity Clause.

The Court declined to delete the entire NOL Deduction and thus disallow all NOL Deductions (both for this taxpayer and all other taxpayers for this year (2007) and all years thereafter). Instead, the Court stated the violation caused by the NOL Deduction can be remedied in one of two ways:

- require other corporate taxpayers whose NOL Deductions were not limited to pay more tax for the tax year at issue; or,
- require this taxpayer whose NOL Deduction was limited to pay less tax than other taxpayers for the tax year at issue because it could not use all its NOL Deduction.

Given these two choices, the Court stated the only practical solution was to require the taxpayer in this case to pay less. Thus, the Court essentially allowed the taxpayer to apply all of its NOL Deductions in the tax year at issue. Thus, after applying the taxpayer's entire NOL, it has no tax liability and is entitled to a refund of the approximately \$4 million it had previously paid.

The potential ramifications of Nextel to the Commonwealth are unclear. The majority opinion attempts to limit the Court's decision stating the "analysis and remedy is appropriately confined to the Commonwealth, Nextel, and the 2007 Tax Year. To the extent our decision in this as-applied challenge calls into question the validity of the [NOL Deduction] provision in any other or even every other context, the General Assembly should be guided accordingly." Numerous other taxpayers have filed appeals raising this same issue. Given the present status of the litigation, the Commonwealth's possible exposure ranges from approximately \$4 million to an amount that could exceed \$500 million.

The Commonwealth has appealed the decision to the Pennsylvania Supreme Court. The Supreme Court requested that both parties file supplemental briefs addressing the Court's ruling in *Mt. Airy*. The Commonwealth filed its brief on November 17, 2016. Oral argument will likely be scheduled following the conclusion of the briefing schedule. A legislative amendment remains a possible remedy going forward.

Muscarella v. Commonwealth of PA (Commonwealth Court).

This is a class action challenging the Department of Revenue's application of the Senior Citizen's Property Tax and Rent Rebate Assistance Act. The department interpreted the law to require a person to live into the next calendar year to be eligible for any rebate from the prior year. Liability against the department was previously established. A tentative settlement in the amount of \$20,000,000 was reached, and a fairness hearing on the proposed settlement was held on June 13, 2016. Following the fairness hearing, the Commonwealth Court entered an order confirming the \$20,000,000 transfer from the Lottery Fund be made. Claims may be submitted until February 2017. A portion of the \$20,000,000 has been set aside for attorneys fees. The \$20 million has been set removed from the Lottery Fund and placed in escrow with plaintiff's counsel. The class action claims are being filed with plaintiff's counsel to be paid out after the deadline for filing claims which is March 2, 2017.

Mt. Airy #1, LLC v. Pennsylvania Department of Revenue (Pennsylvania Supreme Court).

Under Pennsylvania law, every casino outside of Philadelphia must pay a municipal local share assessment of the greater of \$10,000,000, or if gross terminal revenues exceed \$500,000,000, 2% of the gross terminal revenue. The Commonwealth receives an estimated \$120,000,000 per year in tax revenue from this assessment. A casino filed this lawsuit to challenge this framework on uniformity and equal protection grounds. On September 28, 2016, the Pennsylvania Supreme Court invalidated this municipal share assessment as a non-uniform tax prohibited by Article 8, Section 1 of the Pennsylvania Constitution. The Court, however, stayed the implementation of its decision for 120 days. In addition, the Court noted that the plaintiff would not be entitled to monetary damages for violations of the Pennsylvania Constitution and that a decision invalidating a tax statute is not applied retroactively.

Chester Downs, LLC v. Pennsylvania Department of Revenue (Pennsylvania Supreme Court).

Similar to *Mt. Airy #1* discussed above, this case was brought by a casino to challenge the constitutionality of the municipal local share assessment framework. Specifically, under Pennsylvania law, every casino outside of Philadelphia must pay a municipal local share assessment of the greater of \$10,000,000, or if gross terminal revenues exceed \$500,000,000, 2% of the gross terminal revenue. The casino challenged this framework on uniformity and

equal protection grounds. On March 31, 2016, this matter was stayed by the Court pending the final outcome of the *Mt. Airy #1* matter discussed above.

Munchinski v. Warman, et al (U.S.D.C., W.D. Pa.).

This is a case alleging due process violations by a now-deceased Pennsylvania State Police (PSP) officer. It arises from the alleged failure to disclose exculpatory evidence in a 1986 murder trial and at a Post-Conviction Relief Act proceeding. The former inmate was released after spending 20-plus years in state prison. Discovery ended in June 2016, and dispositive motions were filed October 26, 2016. The Commonwealth's estimated exposure exceeds \$2,000,000.

Walker v. Department of Corrections, et al (U.S.D.C., W.D. Pa.).

This is a deliberate indifference claim against Department of Corrections nurses who allegedly failed to properly stabilize the neck of an inmate who had fallen from his bunk and who had suffered an apparent neck injury. The plaintiff is now a quadriplegic. Fact discovery is closed. Expert discovery is in process. The Commonwealth's estimated exposure exceeds \$5,000,000.

Williams, et al v. Richards, et al (U.S.D.C., W.D. Pa.).

This is a collective action under the Fair Labor Standards Act for wage violations and record keeping violations brought by Pennsylvania Department of Transportation (PennDOT) employees against officials at PennDOT for allegedly failing to pay overtime for time spent driving equipment to and from yards. The Commonwealth's estimated exposure is between \$500,000 and \$1,000,000. The outcome of the case could change PennDOT's practices regarding paying for such efforts in the future, which could result in additional on-going operating expenses exceeding \$1,000,000. The case was filed in April 2016.

Knight v. PSP (U.S.D.C., W.D. Pa.).

This case involves the fatal shooting of a 50 year old man by Pennsylvania State Police troopers. Discovery closes November 30, 2016. Given the nature of the litigation, the Commonwealth's estimated exposure could exceed \$1,000,000.

Barkus v. PSP (U.S.D.C., W.D. Pa.).

This case involves the fatal shooting of a 25 year old man by Pennsylvania State Police troopers. Fact discovery closes December 7, 2016. Expert discovery closes March 10, 2017. A settlement conference is set for March 17, 2017. Given the nature of the litigation, the Commonwealth's estimated exposure could exceed \$1,000,000.

Sonny O v. Dallas (U.S.D.C., M.D. Pa.).

This was a class action alleging that the Department of Human Services failed to adequately provide appropriate therapy to autistic children under the age of 21. The court approved a settlement agreement to resolve this matter after holding a fairness hearing in June 2016. The settlement agreement required the Department to pay \$170,000 in attorneys' fees and to implement agreed upon programmatic changes.

Kedra v. Schroeter (U.S.D.C., E.D. Pa.).

In this case, the defendant (a Pennsylvania State Police officer) was conducting firearms training for the Pennsylvania State Police. During this training, he unintentionally discharged his weapon and the plaintiff (a 26 year old trooper) was killed. The Court granted the Commonwealth's motion to dismiss, and the plaintiff appealed to the Court of Appeals for the Third Circuit. Oral arguments are scheduled for December 5, 2016. The Commonwealth's estimated exposure is between \$2,000,000 and \$3,000,000.

DeGroat v. Commonwealth of PA (M.D. Pa.).

This is a case alleging excessive force and state tort claims against the Commonwealth, Pennsylvania State Police, and individuals stemming from a fatal shooting. The deceased was only 23 years old at the time of his death. Local law enforcement officials were also sued. An Amended Complaint was recently filed. The Commonwealth is defending the case vigorously. In light of the fact that this is a case involving a fatality and the age of the deceased, the exposure could be \$1 million or more.

RATINGS

Fitch Ratings (“Fitch”) has assigned its municipal bond rating of “AA-” (outlook “Stable”) to the Bonds. Moody’s Investor Service (“Moody’s”) has assigned its municipal bond rating of “Aa3” (outlook “Stable”) to the Bonds. Standard and Poor’s Ratings Services, a division of the McGraw-Hill Companies (“S&P”) has assigned its municipal bond rating of “AA-” (outlook “Negative”) to the Bonds.

The ratings reflect only the views of the respective rating agencies.

The ratings described in the first paragraph of this section are based upon current information furnished by the Commonwealth or obtained from other sources considered reliable by the rating agencies, which do not perform any audit in connection with any rating and may, on occasion, rely on unaudited financial information. Reference is made to the rating agencies’ manuals for complete descriptions of their respective rating procedures and other rating categories, and to S&P’s, Moody’s and Fitch’s written analyses of Commonwealth finances released upon release of their respective ratings.

A security rating is not a recommendation to buy, sell or hold securities. There is no assurance that such ratings will continue for any given period of time or that they will not be revised downward or withdrawn entirely if, in the opinion of the rating agencies, circumstances warrant such revision or withdrawal. Any such downward revision or withdrawal could have an adverse effect on the marketability or market price of the Bonds. The Commonwealth has not undertaken any responsibility after issuance of the Bonds to assure the maintenance of the ratings, to oppose any revision or withdrawal of the ratings by S&P, Moody’s or Fitch or to inform the holders of the Bonds of any such revision or withdrawal, except as set forth under “CONTINUING DISCLOSURE.”

TAX EXEMPTION AND OTHER TAX MATTERS

Federal Tax Exemption

In the opinion of Co-Bond Counsel, under existing statutes, regulations, rulings and court decisions, and assuming continuing compliance by the Commonwealth with certain certifications and agreements relating to the use of the Bond proceeds and covenants to comply with provisions of the Internal Revenue Code of 1986, as amended (the “Code”) and all applicable regulations thereunder, now or hereafter enacted, interest on the Bonds is excludable from gross income for federal income tax purposes and is not an item of tax preference for purposes of the federal individual and corporate alternative minimum taxes. However, such interest is includable in adjusted current earnings for purposes of the federal alternative minimum tax imposed on certain corporations (as defined in the Code).

The opinion of Co-Bond Counsel on federal tax matters will be based upon and will assume the accuracy of certain representations and certifications, and compliance with certain covenants, of the Commonwealth to be contained in the transcript of proceedings for the issuance of the Bonds and that are intended to evidence and assure that the Bonds are and will remain obligations the interest on which is excludable from gross income for federal income tax purposes. Co-Bond Counsel will not independently verify the accuracy of those certifications and representations or covenants.

The Code prescribes a number of qualifications and conditions for the interest on state and local obligations to be and to remain excludable from gross income for federal income purposes, some of which require future or continued compliance after issuance of the obligations in order for the interest to be and to continue to be so excluded from the date of issuance. Noncompliance with these requirements by the Commonwealth may cause the interest on the Bonds to be included in gross income for federal income tax purposes and thus to be subject to federal income tax retroactively to their date of issuance. The Commonwealth has covenanted to take the actions required of it for the interest on the Bonds to be and to remain excludable from gross income for federal income tax purposes and not to take any actions that would adversely affect that exclusion. Co-Bond Counsel has not undertaken to evaluate, determine or inform any person, including any holder of the Bonds, whether any actions taken or not taken, events, events occurring or not occurring, or other matters that might come to attention of Co-Bond Counsel, would adversely affect the value of, or tax status of the interest on, the Bonds.

The opinions of Co-Bond Counsel are based on current legal authority, cover certain matters not directly addressed by such authorities and represent Co-Bond Counsel’s judgment as to the proper treatment of the Bonds for

federal income tax purposes. The opinions are not a guarantee of any result, and are not binding on the Internal Revenue Service (the “IRS”) or the courts.

Co-Bond Counsel’s engagement with respect to the Bonds ends with the issuance of the Bonds.

Other Federal Tax Matters

A portion of the interest on the Bonds earned by certain corporations may be subject to a federal corporate alternative minimum tax. In addition, interest on the Bonds may be subject to a federal branch profits tax imposed on certain foreign corporations doing business in the United States and to a federal tax imposed on excess net passive income of certain S corporations. Under the Code, the exclusion of interest from gross income for federal tax purposes may have certain adverse federal income tax consequences on items of income, deduction or credit for certain taxpayers, including financial institutions, certain insurance companies, recipients of Social Security and Railroad Retirement benefits, those that are deemed to incur or continue indebtedness to acquire or carry tax-exempt obligations, and individuals otherwise eligible for the earned income tax credit. The applicability and extent of these and other tax consequences will depend upon the particular tax status or other tax items of the owner of the Bonds. Co-Bond Counsel expresses no opinion regarding those consequences.

Payments of interest on tax-exempt obligations, including the Bonds, are generally subject to IRS Form 1099-INT information reporting requirements. If a Bond owner 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.

Unless separately engaged, Co-Bond Counsel is not obligated to defend the Commonwealth or the owners of the Bonds regarding the tax status of interest thereon in the event of an audit examination by the IRS. The IRS has a program to audit tax-exempt obligations to determine whether the interest thereon is includible in gross income for federal income tax purposes. If the IRS does audit the Bonds, under current IRS procedures, the IRS will treat the Commonwealth as the taxpayer and the beneficial owners of the Bonds will have only limited rights, if any, to obtain and participate in judicial review of such audit. Any action of the IRS, including, but not limited to selection of the Bonds for audit, or the course or result of such audit, or an audit of other obligations presenting similar tax issues, may affect the market value of the Bonds.

Prospective purchasers of the Bonds upon their original issuance at prices other than the respective prices indicated on the inside cover of this Official Statement, and prospective purchasers of the Bonds at other than their original issuance, should consult their own tax advisers regarding other tax considerations such as the consequences of market discount, as to all of which Co-Bond Counsel expresses no opinion.

Co-Bond Counsel is not rendering any opinion as to any federal tax matters other than those described under the caption “Federal Tax Exemption” and expressly stated in the proposed form of the opinion of the Co-Bond Counsel included as APPENDIX G hereto. Prospective purchasers of the Bonds should consult their independent tax advisors with regard to all federal tax matters.

Risk of Future Legislative Changes and/or Court Decisions

Under the provisions of the Code, the Treasury Department is authorized and empowered to promulgate regulations implementing the intent of Congress under the Code which could affect the tax exemption and/or tax consequences of holding tax-exempt obligations, such as the Bonds. In addition, legislation may be introduced and enacted in the future which could change the provisions of the Code relating to the tax exempt bonds of a state, such as the Commonwealth, or the taxability of interest in general.

Proposals to alter or eliminate the exclusion of interest on tax-exempt bonds from gross income for some or all taxpayers have been made in the past and may be made again in the future. Future legislation, if enacted into law, or clarification of the Code may cause interest on the Bonds to be subject, directly or indirectly, to federal income taxation, or otherwise prevent Beneficial Owners from realizing the full current benefit of the tax status of such interest. The introduction or enactment of any such future legislation or clarification of the Code may also affect the market price for, or marketability of, the Bonds. PROSPECTIVE PURCHASERS OF THE BONDS SHOULD CONSULT THEIR OWN

TAX ADVISERS REGARDING ANY PROPOSED FEDERAL TAX LEGISLATION, AS TO WHICH CO-BOND COUNSEL EXPRESSES NO OPINION.

No representation is made or can be made by the Commonwealth or any other party associated with the issuance of the Bonds as to whether or not any other legislation now or hereafter introduced and enacted will be applied retroactively so as to subject interest on the Bonds to federal income taxes or so as to otherwise affect the marketability or market value of the Bonds.

Original Issue Discount and Original Issue Premium

The Bonds maturing on _____ are offered at a discount (“original issue discount”) equal generally to the difference between public offering price and principal amount. For federal income tax purposes, original issue discount on a Bond accrues periodically over the term of the Bond as interest with the same tax exemption and alternative minimum tax status as regular interest. The accrual of original issue discount increases the holder’s tax basis in the Bond for determining taxable gain or loss from sale or from redemption prior to maturity. Holders should consult their tax advisers for an explanation of the accrual rules.

The Bonds maturing on _____ are offered at a premium (“original issue premium”) over their principal amount. For federal income tax purposes, original issue premium is amortizable periodically over the term of a Bond through reductions in the holder’s tax basis for the Bond for determining taxable gain or loss from sale or from redemption prior to maturity. Amortization of premium does not create a deductible expense or loss. Holders should consult their tax advisers for an explanation of the amortization rules.

State Tax Exemption

Under the laws of the Commonwealth as presently enacted and construed, the Bonds are exempt from personal property taxes in the Commonwealth and the interest on the Bonds is exempt from Pennsylvania personal income tax and Pennsylvania corporate net income tax.

The Bonds and the interest thereon may be subject to state or local taxes in jurisdictions other than the Commonwealth under applicable state or local tax laws.

Other

THE ABOVE SUMMARY OF POSSIBLE TAX CONSEQUENCES IS NOT EXHAUSTIVE OR COMPLETE. ALL PURCHASERS OF BONDS SHOULD CONSULT THEIR TAX ADVISORS REGARDING THE POSSIBLE FEDERAL, STATE AND LOCAL INCOME TAX CONSEQUENCES OF OWNERSHIP OF THE BONDS AND ANY CHANGES IN THE STATUS OF PENDING OR PROPOSED FEDERAL TAX LEGISLATION. ANY STATEMENT REGARDING TAX MATTERS HEREIN CANNOT BE RELIED UPON BY ANY PERSON TO AVOID TAX PENALTIES.

See Appendix G hereto for the Proposed Form of Co-Bond Counsel Opinion.

UNDERWRITING

After competitive bidding on _____, 2016, the Bonds were awarded to a selling group represented by _____ (the “Underwriters”) for a purchase price of \$_____ which is equivalent to the principal amount of such Bonds, less Underwriters’ discount of \$_____ plus net original issue premium of \$_____. The Underwriters have supplied the public offering yields and prices of the Bonds shown on the inside cover hereof. If all of the Bonds are resold to the public at such yields, the underwriters’ discount will approximate _____ percent of the aggregate principal amount of the Bonds. The Underwriters may change the public offering yields from time to time.

LEGALITY FOR INVESTMENT

Under the Pennsylvania Probate, Estates and Fiduciaries Code, the Bonds are authorized investments for fiduciaries, as defined in that code, within the Commonwealth of Pennsylvania. The Bonds are legal investments for Pennsylvania savings banks, banks, bank and trust companies, and insurance companies and are acceptable as security for deposits of funds of the Commonwealth. The Bonds are eligible for purchase, dealing in, underwriting and unlimited

holding by national banking associations pursuant to regulations promulgated by the Comptroller of the Currency set forth in the Code of Federal Regulations, Title 12—Banks and Banking, Sections 1.3(c) and 1.4.

CO-FINANCIAL ADVISORS

Public Financial Management, Inc., Philadelphia, Pennsylvania, and Sustainable Capital Advisors, Washington DC, are serving as independent co-financial advisors to the Commonwealth with respect to the Bonds (the “Co-Financial Advisors”). The Co-Financial Advisors’ fees in connection with the issuance of the Bonds are expected to be paid from Bond proceeds.

LEGAL MATTERS

All legal matters incident to the authorization and issuance of the Bonds are subject to the approval of the Office of Attorney General of the Commonwealth of Pennsylvania, McNees Wallace & Nurick LLC, Harrisburg, Pennsylvania, and Turner Law, P.C., Philadelphia, Pennsylvania, Co-Bond Counsel. A copy of the opinion of Co-Bond Counsel will accompany the Bonds delivered to DTC. Copies of the opinion of the Office of Attorney General, together with additional copies of the opinions of Co-Bond Counsel, will be available at the time of delivery of the Bonds. Proposed forms of these opinions are included as Appendices F and G respectively.

ADDITIONAL INFORMATION

Periodic public reports relating to the financial condition of the Commonwealth are prepared by the Office of the Budget. These reports and additional information may be obtained upon request from the office of the Secretary of the Budget, Attn.: Ms. Mindy Dierich, 18th Floor, Harrisstown 2, 333 Market Street, Harrisburg, Pennsylvania 17101-2210 (Telephone (717) 787-7342). Recent annual Comprehensive Annual Financial Report summaries of enacted fiscal year budgets and certain other information are available in the Budget and Financial Reports section of the Office of the Budget’s web site, <http://www.budget.state.pa.us>.

CONTINUING DISCLOSURE

The Commonwealth will execute a written agreement (the “Continuing Disclosure Agreement”) for the benefit of the beneficial owners of the Bonds in order to assist the Underwriters in meeting the requirements of Rule 15c2-12 (the “Rule”) promulgated by the Securities and Exchange Commission. The Continuing Disclosure Agreement will require the Commonwealth so long as any of the Bonds are outstanding to:

- (i) File in an electronic format as required by the Municipal Securities Rulemaking Board (the “MSRB”) on the MSRB’s Electronic Municipal Market Access system (“EMMA”) not later than 240 days following the end of each of the Commonwealth’s fiscal years commencing with the fiscal year ended June 30, 2016, Annual Financial Statements and Annual Operating Data, as defined below, with the MSRB;
- (ii) File in a timely manner with the MSRB notice of certain specified events listed below; and
- (iii) File with the MSRB notice of any failure of the Commonwealth to file the information required by (i) above.

Annual Financial Information. It is expected that the financial statements to be filed annually as provided by (i) above will be audited financial statements prepared in accordance with GAAP. The Continuing Disclosure Agreement, however, permits the filing of unaudited financial statements if audited financial statements are not available by the 240-day deadline, with audited financial statements to be filed as soon as they are available. The Annual Operating Data will be operating data of the type contained in the forepart of this Official Statement in the following tables:

Tables 5 through 10 under the heading “COMMONWEALTH FINANCIAL PERFORMANCE”;
Tables 11 and 12 under the heading “COMMONWEALTH REVENUES AND EXPENDITURES”,
Tables 15 through 18 under the heading “OUTSTANDING INDEBTEDNESS OF THE
COMMONWEALTH”; and
Tables 20 through 24 under the heading “OTHER STATE-RELATED OBLIGATIONS.”

If any of the tables listed above reflect information that is no longer calculated and available or relevant because of changes in operations, the Commonwealth will provide notice of such change in the first annual filing of Annual Operating Data after such changes are undertaken. The format of the tables also may be altered.

Event Disclosure. The Continuing Disclosure Agreement requires the Commonwealth to provide timely notice, but in no event longer than within 10 business days following such a listed occurrence, to the MSRB of the following events with respect to the Bonds:

1. Principal and interest payment delinquencies;
2. Non-payment related defaults, if material;
3. Unscheduled draws on debt service reserves reflecting financial difficulties;
4. Unscheduled draws on credit enhancements reflecting financial difficulties;
5. Substitution of credit or liquidity providers, or their failure to perform;
6. Adverse tax opinions, the issuance by the IRS of proposed or final determinations 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;
7. Modifications to rights of Bond holders, if material;
8. Bond calls, if material and tender offers;
9. Defeasances;
10. Release, substitution or sale of property securing repayment of the Bonds, if material;
11. Rating changes;
12. Bankruptcy, insolvency, receivership or similar event of the Commonwealth;
13. The consummation of a merger, consolidation, or acquisition involving the Commonwealth or the sale of all or substantially all of the assets of the Commonwealth, 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; and
14. Appointment of a successor or additional trustee or the change of name of a trustee, if material.

The fourteen events listed above are specified by the Rule but some of them may not be relevant to the Bonds.

Limitations, Remedy and Amendments. The Continuing Disclosure Agreement requires the Commonwealth to provide only limited information at limited times, and such information may not include all information necessary to determine the value of the Bonds at any time. The Commonwealth may also make other information available on a voluntary basis, but it is not contractually obligated to do so. See “ADDITIONAL INFORMATION” herein for the availability of other information from the Commonwealth’s Office of the Budget.

The sole and exclusive remedy for any breach by the Commonwealth of its obligations under the Continuing Disclosure Agreement is an action to compel specific performance by the Commonwealth of its obligations. No assurance can be provided as to the outcome of any such proceeding. A breach by the Commonwealth of its obligations under the Continuing Disclosure Agreement does not constitute a default under the Bonds.

The Commonwealth reserves the right to amend the Continuing Disclosure Agreement consistent with the provisions of the Rule (or any successor legal requirements) as then in effect.

AUTHORIZATION

The execution of this Official Statement has been authorized in the Resolutions and may be executed in any number or counterparts and by different parties hereto in separate counterparts, each of which when so executed and delivered shall be deemed to be an original and all of which taken together shall constitute but one and the same document.

Tom Wolf, Governor

Timothy Reese, State Treasurer

Eugene A. DePasquale, Auditor General

CERTIFICATE OF THE AUDITOR GENERAL
Pursuant to
ARTICLE VIII, SECTION 7(a)(4) and (c)
of the
CONSTITUTION OF PENNSYLVANIA
and
Section 304 of the Capital Facilities Debt Enabling Act

To the Governor and the General Assembly:

I, Eugene A. DePasquale, Auditor General of the Commonwealth of Pennsylvania, pursuant to Article VIII, Section 7(a)(4) of the Pennsylvania Constitution and Section 304 of Capital Facilities Debt Enabling Act (Act 1 of 1999, as amended) certify as follows:

The average annual tax revenues deposited in all funds in the five fiscal years ended preceding the date of August 31, 2016	\$ 37,326,634,317
(i) The amount of outstanding net debt as of the end of the preceding fiscal year	\$ 10,427,978,803
(ii) The amount of such net debt as of August 31, 2016.....	\$ 11,423,804,500
(iii) The difference between the limitation upon all net debt outstanding as provided in Article VIII, Section 7 (a) (4) of the Constitution of Pennsylvania and the amount of such net debt as of the date of August 31, 2016.....	\$ 53,897,805,554
(iv) The amount of such debt scheduled to be repaid during the remainder of the current fiscal year	\$ 464,500,000
(v) The amount of debt authorized by law to be issued, but not yet incurred	\$112,975,373,968
(vi) The amount of outstanding obligations excluded from outstanding debt as self sustaining pursuant to Article VIII, Section 7(c)(1), (2) and (3) of the Constitution of Pennsylvania	\$ 9,021,029,685

IN TESTIMONY WHEREOF, I have set my hand and affixed the seal of the Auditor General, this 31st day of August 2016.

(Seal)	/s/Eugene A. DePasquale EUGENE A. DEPASQUALE Auditor General Commonwealth of Pennsylvania
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SELECTED DATA ON THE COMMONWEALTH OF PENNSYLVANIA

General

The Commonwealth of Pennsylvania is one of the most populous states, ranking sixth behind California, Texas, Florida, New York and Illinois. Pennsylvania is an established state with a diversified economy. Pennsylvania had been historically identified as a heavy industrial state. That reputation has changed over the last thirty years as the coal, steel and railroad industries declined. The Commonwealth's business environment readjusted with a more diversified economic base. This economic readjustment was a direct result of a long-term shift in jobs, investment, and workers away from the northeast part of the nation. Currently, the major sources of growth in Pennsylvania are in the service sector, including trade, medical, health services, education and financial institutions.

Pennsylvania's agricultural industries remain an important component of the Commonwealth's economic structure, accounting for more than \$7.5 billion in crop and livestock products annually. In 2014, agribusiness and food related industries reached export sales surpassing \$1.3 billion in economic activity. Over 59,000 farms form the backbone of the State's agricultural economy. Farmland in Pennsylvania includes over four million acres of harvested cropland and three million acres of pasture and farm woodlands - nearly one-third of the Commonwealth's total land area. Agricultural diversity in the Commonwealth is demonstrated by the fact that Pennsylvania ranks among the top ten states in the production of a variety of agricultural products.

Pennsylvania's extensive public and private forests provide a vast source of material for the lumber, furniture, and paper products industries. The forestry and related industries accounts for 1.5% of employment with economic activity of nearly \$5 billion in sales in domestic and international trade. Additionally, the Commonwealth derives a good water supply from underground sources, abundant rainfall, and a large number of rivers, streams, and lakes. Other natural resources include major deposits of coal, petroleum, and natural gas. Annually, about 66 million tons of anthracite and bituminous coal, about 4 trillion cubic feet of natural gas, and about 5.5 million barrels of oil are extracted from Pennsylvania. Pennsylvania is one of the top 10 producing states in the country for aggregate/crushed stone. The value of non-coal mineral production in PA is approximately \$1 billion annually.

Pennsylvania is a Mid-Atlantic state within easy reach of the populous eastern seaboard and, as such, is the keystone to the Midwest. A comprehensive transportation grid enhances the Commonwealth's strategic geographic position. The Commonwealth's water systems afford the unique feature of triple port coverage, a deep-water port at Philadelphia, a Great Lakes port at Erie and an inland water port at Pittsburgh. Between air, rail, water, and road, Pennsylvania is easily accessible for both inter and intra state trade and commerce.

Population

The Commonwealth is highly urbanized. Of the Commonwealth's 2015 mid-year population estimate, 79 percent resided in the 15 Metropolitan Statistical Areas ("MSAs") of the Commonwealth. The largest MSAs in the Commonwealth are those that include the cities of Philadelphia and Pittsburgh, which together contain almost 44 percent of the State's total population. The population of Pennsylvania, 12.8 million people in 2015, according to the U.S. Bureau of the Census, represents a population growing slower than the nation with a higher portion than the nation or the region comprised of persons 45 or over. The following tables present the population trend from 2006 to 2015 and the age distribution of the population for 2014.

**Population Trends
Pennsylvania, Middle Atlantic Region and the United States
2006-2015**

As of July 1	Total Population In Thousands			Total Population as a % of 2006 base		
	PA	Middle Atlantic Region^(a)	U.S.	PA	Middle Atlantic Region^(a)	U.S.
2006	12,471	40,451	295,593	100%	100%	100%
2007	12,522	40,481	301,579	101	100	102
2008	12,566	40,697	304,374	101	101	103
2009	12,604	40,854	307,006	101	101	104
2010	12,711	40,915	309,346	102	101	105
2011	12,743	41,108	311,718	103	102	105
2012	12,770	41,253	314,102	103	102	106
2013	12,781	41,388	316,427	103	103	108
2014	12,787	41,472	318,907	103	103	109
2015	12,803	41,556	321,418	103	103	109

^(a) Middle Atlantic Region: Pennsylvania, New York, New Jersey
Source: U.S. Department of Commerce, Bureau of the Census

**Population by Age Group — 2014
Pennsylvania, Middle Atlantic Region and the United States**

Age	Pennsylvania	Middle Atlantic Region^(a)	United States
Under 5 years	5.6 %	5.8 %	6.2 %
5-24 years	25.2	25.5	26.7
25-44 years	24.7	26.1	26.3
45-64 years	27.8	27.3	26.3
65 years and over.....	16.7	15.3	14.5

^(a) Middle Atlantic Region: Pennsylvania, New York, New Jersey.
Source: U.S. Department of Commerce, Bureau of the Census

Employment

Non-agricultural employment in Pennsylvania over the 10 years ending in 2015 increased at an average annual rate of 0.2 percent compared with an increase 0.4 percent rate for the Middle Atlantic region and 0.4 percent rate for the U.S. The following table shows employment trends from 2006 through 2015.

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**Non-Agricultural Establishment Employment Trends
Pennsylvania, Middle Atlantic Region and the United States
2006-2015**

Calendar Year	Total Establishment Employment In Thousands			Total Establishment Employment as a % of 2006 base		
	PA	Middle Atlantic Region ^(a)	US	PA	Middle Atlantic Region ^(a)	US
2006	5,757	18,430	136,398	100 %	100 %	100 %
2007	5,799	18,595	137,936	100	101	101
2008	5,800	18,626	137,170	100	101	101
2009	5,616	18,051	131,233	98	98	96
2010	5,622	18,015	130,353	98	98	96
2011	5,685	18,202	131,941	99	99	97
2012	5,726	18,411	134,173	100	100	98
2013	5,741	18,606	136,381	100	100	100
2014	5,788	18,850	138,939	101	102	102
2015	5,836	19,105	141,833	101	103	104

^(a) Middle Atlantic Region: Pennsylvania, New York, New Jersey.
Source: U.S. Department of Labor, Bureau of Labor Statistics.

Non-manufacturing employment in Pennsylvania has increased in recent years and reached 90.3 percent of total employment by 2015. Consequently, manufacturing employment constitutes a diminished share of total employment within the Commonwealth. Manufacturing, contributing 9.7 percent of 2015 non-agricultural employment, has fallen behind the services sector, the trade sector and the government sector as the 4th largest single source of employment within the Commonwealth. In 2015, the services sector accounted for 48.9 percent of all non-agricultural employment while the trade sector accounted for 14.7 percent. The following table shows trends in employment by sector for Pennsylvania from calendar year 2011 through 2015.

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Non-Agricultural Establishment Employment by Sector
Pennsylvania
2011-2015
(In Thousands)

	CALENDAR YEAR									
	2011		2012		2013		2014		2015	
	Employees	%	Employees	%	Employees	%	Employees	%	Employees	%
Manufacturing:										
Durable.....	342.0	6.0	347.5	6.1	346.1	6.0	346.6	6.0	346.8	5.9
Non-Durable.....	223.0	3.9	219.7	3.8	218.5	3.8	220.9	3.8	221.5	3.8
Total										
Manufacturing ^(d)	565.0	9.9	567.2	9.9	564.6	9.8	567.5	9.8	568.3	9.7
Non-Manufacturing:										
Trade ^(a)	848.9	14.9	853.7	14.9	852.5	14.9	855.4	14.8	858.5	14.7
Finance ^(b)	308.6	5.4	309.5	5.4	313.2	5.5	315.3	5.4	316.3	5.4
Services.....	2,716.7	47.8	2,758.5	48.2	2,783.6	48.5	2,818.8	48.7	2,856.1	48.9
Government.....	751.4	13.2	732.3	12.8	720.7	12.6	711.4	12.3	705.4	12.1
Utilities ^(c)	240.3	4.2	244.0	4.3	246.9	4.3	254.4	4.4	264.6	4.5
Construction.....	221.5	3.9	224.3	3.9	223.8	3.9	228.9	4.0	233.6	4.0
Mining.....	33.2	0.6	36.3	0.6	35.3	0.6	37.0	0.6	33.2	0.7
Total										
Non-Manufacturing ^(d)	5,120.6	90.1	5,158.6	89.9	5,176.0	90.2	5,221.2	90.2	5,267.7	90.3
Total Employees ^{(d)(e)}	5,685.6	100.0	5,725.8	99.8	5,740.6	100.0	5,788.7	100.0	5,836.0	100.0

^(a) Wholesale and retail trade.

^(b) Finance, insurance and real estate.

^(c) Includes transportation, communications, electric, gas and sanitary services.

^(d) Discrepancies occur due to rounding.

^(e) Does not include workers involved in labor-management disputes.

Source: US Bureau of Labor & Statistics

The following table presents the percentages of non-agricultural employment in various sectors in Pennsylvania and the United States in 2015.

Non-Agricultural Establishment Employment by Sector
Pennsylvania and the United States

	2015 Calendar Year	
	Pennsylvania	United States
Manufacturing.....	9.7%	8.7%
Trade ^(a)	14.7	15.2
Finance ^(b)	5.4	5.7
Services.....	48.9	45.8
Government.....	12.0	15.7
Utilities ^(c)	4.5	3.9
Construction.....	4.0	4.4
Mining.....	0.7	0.6
Total ^(d)	100.0%	100.0%

^(a) Wholesale and retail trade.

^(b) Finance and insurance.

^(c) Includes transportation, communications, electric, gas and sanitary services.

^(d) Discrepancies occur due to rounding.

Source: U.S. Department of Labor, Bureau of Labor Statistics.

Within the manufacturing sector of Pennsylvania's economy, which now accounts for less than one-tenth of total non-agricultural employment in Pennsylvania, the fabricated metals industries employed the largest number of workers. Employment in fabricated metals industries was 14.4 percent of Pennsylvania manufacturing employment but only 1.4 percent of total Pennsylvania non-agricultural employment in 2015. The following table shows trends in manufacturing employment by industry for Pennsylvania from 2011 through 2015.

Manufacturing Establishment Employment by Industry
Pennsylvania
2011-2015
(In Thousands)

	CALENDAR YEAR									
	2011		2012		2013		2014		2015	
	Employees	%	Employees	%	Employees	%	Employees	%	Employees	%
Durable Goods:										
Primary Metals.....	38.5	6.2	39.7	7.0	39.4	7.0	38.9	6.8	37.7	6.6
Fabricated Metals.....	80.3	12.8	81.7	14.4	80.8	14.3	81.1	14.3	81.9	14.4
Machinery (excluding electrical)....	47.0	7.9	48.8	8.6	48.5	8.6	48.1	8.5	47.3	8.3
Electrical Equipment.....	25.9	3.7	26.0	4.6	26.0	4.6	26.0	4.6	25.9	4.6
Transportation Equipment....	37.6	6.2	39.1	6.9	38.9	6.9	39.0	6.9	39.5	7.0
Furniture Related Products.....	15.1	3.5	15.1	2.7	14.9	2.6	15.1	2.7	15.7	2.8
Other Durable Goods.....	97.6	19.2	97.1	17.1	97.6	17.3	98.4	17.3	98.8	17.4
Total Durable Goods ^(a)	342.0	59.5	347.5	61.3	346.1	61.3	346.6	61.0	346.8	61.1
Non-Durable Goods:										
Pharmaceutical/Medicine...	20.2	3.3	19.0	3.3	17.9	3.2	17.5	3.1	17.8	3.1
Food Products.....	66.7	10.5	67.1	11.8	67.8	12.0	69.6	12.3	69.7	12.3
Chemical Products.....	42.2	7.6	41.2	7.3	40.6	7.2	39.9	7.0	40.2	7.1
Printing and Publishing.....	27.0	5.5	25.5	4.5	24.8	4.4	24.7	4.3	24.2	4.2
Plastics/Rubber Products.....	35.3	5.9	35.2	6.2	35.3	6.3	36.1	6.4	36.8	6.4
Other Non-Durable Goods...	31.6	7.5	31.7	5.6	32.1	5.7	33.7	5.9	32.8	5.8
Total Non-Durable Goods ^(a)	223.0	40.3	219.7	38.7	218.5	38.7	221.5	39.0	221.5	38.9
Total Manufacturing										
Employees ^(a)	565.0	100.0	567.2	100.0	564.6	100.0	568.1	100.0	568.3	100.0

^(a) Discrepancies occur due to rounding

Source: U.S. Department of Labor, Bureau of Labor Statistics.

Unemployment

Pennsylvania's annual average unemployment rate was equivalent to the national average throughout the 2000's. Slower economic growth caused the unemployment rate in the Commonwealth to rise to 8.5 percent in 2010 compared to 4.4 percent annual unemployment rate in 2007. As of October 2016, the most recent month for which figures are available, Pennsylvania had a seasonally adjusted annual unemployment rate of 5.8 percent. The following table represents the annual non-adjusted unemployment rate in Pennsylvania, the Middle Atlantic Region, and the United States from 2006 through 2015.

**Annual Average Unemployment Rate
Pennsylvania, Middle Atlantic Region and the United States
2006-2015**

<u>Calendar Year</u>	<u>Pennsylvania</u>	<u>Middle Atlantic Region^(a)</u>	<u>United States</u>
2006	4.6	4.6	4.6
2007	4.4	4.4	4.6
2008	5.3	5.4	5.8
2009	8.0	8.4	9.3
2010	8.5	8.8	9.6
2011	7.9	8.4	8.9
2012	7.8	8.5	8.1
2013	7.4	7.7	7.4
2014	5.9	6.3	6.2
2015	5.1	5.3	5.3

^(a) Middle Atlantic Region: Pennsylvania, New York, New Jersey.
Source: U.S. Department of Labor, Bureau of Labor Statistics.

The following table presents the thirty largest employers in Pennsylvania:

**Commonwealth of Pennsylvania
Thirty Largest Employers
1st Quarter 2016**

<u>Employer</u>	<u>Rank</u>	<u>Employer</u>	<u>Rank</u>
Federal Government	1	PA State System of Higher Education	16
State Government	2	Comcast Cablevision Corp (PA)	17
Wal-Mart Associates Inc	3	The Children's Hospital of Philadelphia	18
Trustees of the University of PA	4	Home Depot USA Inc	19
City of Philadelphia	5	Amazon.com DEDC LLC	20
Giant Food Stores LLC	6	Vanguard Group Inc	21
Pennsylvania State University	7	Target Corporation	22
School District of Philadelphia	8	Milton S Hershey Medical Center	23
UPMC Presbyterian Shadyside	9	Wawa Inc	24
PNC Bank NA	10	Temple University	25
United Parcel Service Inc	11	Merck Sharp & Dohme Corporation	26
University of Pittsburgh	12	Western Penn Allegheny Health	27
Lowe's Home Centers LLC	13	American Airlines Inc	28
Weis Markets Inc	14	Southeastern PA Transportation Authority	29
Giant Eagle Inc	15	Heartland Employment Services LLC	30

Source: Pennsylvania Department of Labor, Office of Employment Security.

Personal Income

Personal income in the Commonwealth for 2015 is \$629.7 billion, an increase of 3.2 percent over the previous year. During the same period, national personal income increased by 4.3 percent. Based on the 2015 personal income estimates, per capita income is at \$49,180 in the Commonwealth compared to per capita income in the United States of \$47,669. The following tables represent annual personal income and per capita income from 2006 through 2015.

Personal Income
Pennsylvania, Mideast Region and the United States
2006-2015

Calendar Year	Total Personal Income Dollars in Millions			Total Personal Income As a % of 2006 base		
	PA	Mideast Region ^(a)	US ^(b)	PA	Mideast Region ^(a)	US
2006	\$ 477,939	\$ 2,073,430	\$11,381,350	100 %	100 %	100 %
2007	503,610	2,198,474	11,995,419	105	106	105
2008	525,622	2,278,982	12,492,705	110	110	110
2009	516,623	2,230,728	12,079,444	108	108	106
2010	532,816	2,303,477	12,459,613	111	111	109
2011	560,970	2,425,871	13,233,436	117	117	116
2012	584,630	2,521,989	13,904,485	122	122	122
2013	588,296	2,534,019	14,064,468	123	122	124
2014	609,679	2,635,988	14,683,147	128	127	129
2015	629,709	2,738,136	15,324,108	132	132	135

^(a) Mideast Region: Pennsylvania, New York, New Jersey, Maryland, District of Columbia, and Delaware.

^(b) Sum of States.

Source: U.S. Department of Commerce, Bureau of Economic Analysis

Per Capita Income
Pennsylvania, Mideast Region and the United States
2006-2015

Calendar Year	Per Capita Income			As % of US	
	PA	Mideast Region ^(a)	U.S.	PA	Mideast Region ^(a)
2006	\$ 38,202	\$ 40,992	\$ 38,144	100 %	107 %
2007	40,084	46,309	39,821	100	116
2008	41,675	47,793	41,082	101	116
2009	40,785	46,528	39,376	104	118
2010	41,918	47,781	40,277	104	119
2011	44,018	50,038	42,453	104	118
2012	45,781	51,790	44,266	103	117
2013	46,028	51,819	44,438	104	117
2014	47,679	53,749	46,049	103	117
2015	49,180	55,667	47,669	103	117

^(a) Mideast Region: Pennsylvania, New York, New Jersey, Maryland, District of Columbia, and Delaware.

Source: U.S. Department of Commerce, Bureau of Economic Analysis

The following table presents growth rates in personal income and selected components of personal income for Pennsylvania, the Mideast Region and the United States from 2011 through 2015.

Annual Growth Rates
Personal Income and Selected Components of Personal Income
Pennsylvania, Mideast Region and the United States

<u>Calendar Year</u>	<u>Pennsylvania</u>	<u>Mideast Region^(a)</u>	<u>United States</u>
Total Personal Income			
2011.....	5.0%	4.7%	5.4%
2012.....	4.0	3.5	4.2
2013.....	0.5	0.0	0.3
2014.....	3.5	3.7	3.6
2015.....	3.1	3.5	3.5
Manufacturing			
2011.....	4.4%	1.9%	5.6%
2012.....	2.1	1.0	4.1
2013.....	-0.1	-0.3	1.1
2014.....	3.6	2.6	4.4
2015.....	1.0	1.6	2.4
Trade^(b)			
2011.....	6.5%	5.6%	5.9%
2012.....	2.2	4.5	5.4
2013.....	1.8	0.9	2.4
2014.....	5.3	4.5	5.0
2015.....	0.7	2.5	3.7
Finance^(c)			
2011.....	2.5%	1.4%	0.6%
2012.....	4.3	0.1	5.4
2013.....	1.9	-1.2	-1.1
2014.....	5.7	8.2	6.3
2015.....	3.2	3.2	4.9
Services			
2011.....	5.5%	7.1%	6.9%
2012.....	5.0	5.0	6.0
2013.....	2.0	1.7	1.7
2014.....	3.7	5.3	5.8
2015.....	5.2	5.6	6.6
Utilities			
2011.....	10.2%	5.0%	5.3%
2012.....	-4.8	-3.3	-2.7
2013.....	2.7	1.1	3.8
2014.....	2.6	5.7	4.9
2015.....	17.0	10.7	7.4
Construction			
2011.....	5.1%	3.7%	2.2%
2012.....	5.7	5.8	7.6
2013.....	1.8	3.5	4.6
2014.....	6.7	7.2	8.6
2015.....	4.1	7.2	8.5
Mining			
2011.....	45.7%	34.7%	33.8%
2012.....	15.5	4.0	12.3
2013.....	8.5	10.7	5.1
2014.....	9.3	8.5	7.3
2015.....	-6.7	-5.9	-5.2

^(a) Mideast Region: Delaware, District of Columbia, Maryland, Pennsylvania, New York, and New Jersey.

^(b) Wholesale trade only.

^(c) Finance and insurance.

Source: U.S. Department of Commerce, Bureau of Economic Analysis

The Commonwealth's average hourly wage rate of \$18.96 for manufacturing and production workers compares below the national average of \$21.26 for 2015. The following table presents the average hourly wage rates for 2011 through 2015.

**Average Hourly Wages
Production Workers on Manufacturing Payrolls
Pennsylvania and the United States
2011-2015**

<u>Calendar Year</u>	<u>PA</u>	<u>US</u>
2011.....	\$ 17.49	\$ 18.93
2012.....	18.26	19.08
2013.....	19.16	19.30
2014.....	19.02	19.56
2015.....	18.96	21.26

Source: U.S. Department of Labor, Bureau of Labor Statistics

Market and Assessed Valuation of Real Property

Annually, the State Tax Equalization Board (the "STEB") determines an aggregate market value of all taxable real property in the Commonwealth. The STEB determines the market value by applying assessment to sales ratio studies to assessment valuations supplied by local assessing officials. The market values certified by the STEB do not include property that is tax exempt but do include an adjustment correcting the data for preferential assessments granted to certain farm and forestlands.

The table below shows the assessed valuation as determined and certified by the counties and the market value and the assessed to market value ratio determined by the STEB for real property over the last ten years. Increases in valuations shown below result from reassessment valuations by the counties, changes in property tax rolls and increases in the real value of existing property. In computing the market values for uneven-numbered years, the STEB is statutorily restricted to certifying only those changes in market value that result from properties added to or removed from the assessment rolls. The STEB is permitted to adjust the market valuation to reflect any change in real estate values or other economic change in value only in even-numbered years. This restriction accounts for the two-year pattern of market value changes apparent in the data below.

**Valuations of Taxable Real Property
2005-2014**

<u>Year</u>	<u>Market Value^(a)</u>	<u>Assessed Valuation</u>	<u>Ratio of Assessed Valuation to Market Value^(a)</u>
2005	\$ 546,222,770,500	\$ 378,011,903,306	69.2%
2006	619,788,036,800	393,869,708,825	63.5
2007	633,886,898,100	400,428,104,035	63.1
2008	708,521,506,000	406,426,527,325	57.3
2009	717,475,983,911	431,911,595,146	60.2
2010	753,847,457,900	436,995,393,629	57.9
2011	756,045,833,849	451,343,272,265	59.7
2012	753,344,175,841	452,361,346,637	60.0
2013	781,362,158,748	499,743,087,376	63.9
2014	801,633,782,130	591,554,200,204	73.7

^(a) Value adjusted for difference between regular assessment and preferential assessment permitted on certain farm and forestlands.
Source: Annual Certifications by the State Tax Equalization Board July 2015.

COMMONWEALTH GOVERNMENT AND FISCAL ADMINISTRATION

The government of the Commonwealth of Pennsylvania (the “Commonwealth” or “Pennsylvania”) is composed of three separate branches. A general organization chart of the Commonwealth’s government is shown on the following page.

Legislative Branch

The legislative branch consists of the General Assembly and its staff. The General Assembly is bicameral, composed of the Senate and the House of Representatives. The 50 members of the Senate serve staggered four-year terms and the 203 Representatives serve identical two-year terms. The General Assembly meets in regular session biannually beginning on the first Tuesday of January following elections. Special sessions may be called by the Governor on petition of a majority of the members of each house or whenever the Governor determines that public interest so requires. Legislative leadership includes majority and minority leaders in each house, a President Pro Tempore of the Senate and a Speaker of the House of Representatives.

Executive Branch

The Executive Branch is headed by five elected officials and encompasses 19 departments and approximately 36 independent commissions, boards, authorities and agencies.

The five elected officials are the Governor, the Lieutenant Governor, the Attorney General, the State Treasurer and the Auditor General. The Governor and the Lieutenant Governor are elected on the same ballot and serve a four-year term. The Governor is eligible to succeed himself for one term. The Auditor General, the Attorney General and the State Treasurer are elected for four-year terms in an even-year election held between gubernatorial elections.

The Governor is the chief executive officer of the Commonwealth. All departments except those of the State Treasurer, the Attorney General and the Auditor General are under the direct jurisdiction of the Governor. The head of each of the remaining departments is a Secretary who is appointed by the Governor and confirmed by a majority vote of the Senate. Each Secretary serves at the Governor’s pleasure and is a member of the Governor’s Cabinet.

The Lieutenant Governor presides over the Senate and serves as Acting Governor during the disability of the Governor and becomes Governor in the case of the death, conviction or impeachment, failure to qualify or resignation of the Governor.

The Attorney General is the chief law enforcement officer of the Commonwealth and is responsible for upholding and defending the constitutionality of all statutes. The Attorney General is also responsible for reviewing the form and legality of all proposed rules and regulations, deeds, leases and contracts to be executed by Commonwealth agencies. The Office of Attorney General is under the Attorney General’s direct jurisdiction.

The State Treasurer is charged with receiving, depositing and investing all Commonwealth funds and is responsible for the pre-audit approval of all requisitions for the disbursements of monies in the State Treasury. The Treasury Department is under the State Treasurer’s direct jurisdiction.

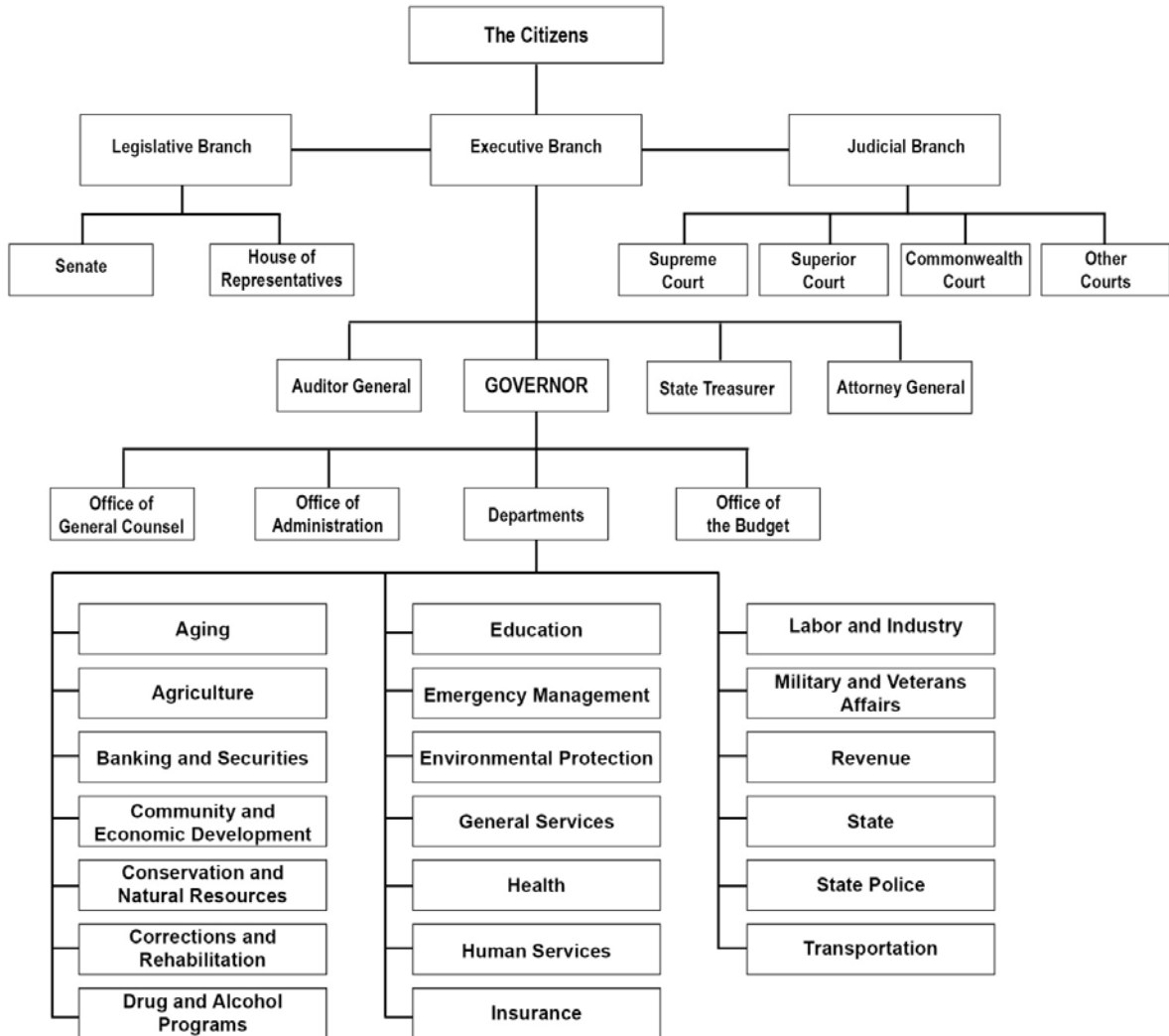
The Auditor General is charged with making audits of completed financial transactions. The Department of the Auditor General is under the Auditor General’s direct jurisdiction.

Activities of state government are also conducted by various independent commissions, boards, authorities and agencies created by statute and not under the direct jurisdiction of the executive and legislative branches.

Judicial Branch

The judicial power of the Commonwealth is vested in a unified judicial system consisting of a Supreme Court and various other courts of original and appellate jurisdiction which are under the supervision and authority of the Supreme Court. All justices, judges and district justices are elected to office.

Commonwealth of Pennsylvania Organization Chart



AGENCIES

Higher Education Assistance
Housing Finance
Interstate Agencies

AUTHORITIES

Automobile Theft Prevention
Commonwealth Financing
Economic Development Financing
Energy Development
Higher Education Facilities
Industrial Development
Infrastructure Investment
Insurance Fraud Prevention
Minority Business Development
Patient Safety
Public School Building

BOARDS

Claims
Environmental Hearing
Gaming Control
Finance and Revenue
Liquor Control
Milk Marketing
Municipal Retirement
Pardons
Public School Employees' Retirement
State Employees' Retirement
Tax Equalization

COMMISSIONS

Civil Service
Crime and Delinquency
Ethics
Fish and Boat
Game
Harness Racing
Historical and Museum
Horse Racing
Human Relations
Juvenile Court Judges
Public Utility
Turnpike

Fiscal Organization

Each branch of the Commonwealth's government is responsible for its respective fiscal operations subject to restrictions embodied in the Constitution, the Administrative Code, and the Fiscal Code. Such restrictions are enforced and other central administrative functions are provided by five departments: the Office of the Budget ("OB"), the Office of Administration ("OA"), the Treasury Department, the Department of Revenue and the Department of the Auditor General. OB and OA are administrative offices within the Governor's offices. The Secretary of the Budget and the Secretary of Administration are appointed by the Governor and are responsible for the operations of their respective offices. The Department of Revenue is led by the Secretary of Revenue, who is appointed by the Governor subject to the advice of the Senate. The Treasury Department and the Department of the Auditor General are headed by the respective elected officials.

OB monitors the operation of the Commonwealth's departments, operates a central accounting system, compiles and publishes the Commonwealth's financial reports, assists in the preparation and publication of the budget, coordinates capital improvements and is responsible for the issuance of the Commonwealth's debt. OA is responsible for personnel policy and programs, management policy and organizational structure, data processing service, and electronic data processing policy and planning. The Treasury Department receives, invests and disburses all funds and maintains central cash records. The Department of Revenue administers the collection of most taxes. The Department of the Auditor General oversees the examination of the majority of financial transactions.

Commissions, authorities and agencies that are both independent by statute and financially self-supporting, operate autonomously although their capital projects and financing are reviewed by OB and included in the capital budget.

The Budgetary Process

The Commonwealth operates on a fiscal year beginning July 1 and ending June 30. For example, "fiscal year 2016" refers to the fiscal year ending on June 30, 2016.

The budget process commences in September, nine months prior to the beginning of the fiscal year, as departments formulate their initial budgets in response to Program Policy Guidelines issued by the Governor and hold preliminary hearings with OB and other members of the Governor's staff. By November 1, formal budget requests are submitted to OB by all government departments and other institutions requesting appropriations. OB, under the direction of the Secretary of Budget, reviews the requests through November and December and may hold formal hearings.

The Department of Revenue, in conjunction with OB, prepares revenue estimates. In the preparation of such estimates, internal analysis, information from selected departments and econometric analysis are utilized. The Commonwealth subscribes to economic forecasts prepared by Global Insight for national and Pennsylvania economic data that are used to estimate economically sensitive Commonwealth revenues. Other econometric forecasts are also consulted.

The Constitution requires that the Governor submit annually to the General Assembly a budget consisting of three parts:

- (a) a balanced operating budget for the ensuing fiscal year setting forth proposed expenditures and estimated revenues from all sources and, if estimated revenues and available surplus are less than proposed expenditures, recommending specific additional sources of revenue sufficient to pay the deficiency;
- (b) a capital budget for the ensuing fiscal year setting forth in detail proposed expenditures to be financed from the proceeds of obligations of the Commonwealth or of its agencies or authorities or from operating funds; and
- (c) a financial plan for not less than the succeeding five fiscal years, which includes for each year (i) projected operating expenditures classified by department or agency and by program, and estimated revenues by major categories from existing and additional sources, and (ii) projected expenditures for capital projects specifically itemized by purpose and their proposed sources of financing.

All funds received by the Commonwealth are subject by statute to appropriation in specific amounts by the General Assembly or by executive authorizations by the Governor. The Governor's budget encompasses both annual appropriations and executive authorizations.

The Governor is required to submit the proposed budget as soon as possible after the organization of the General Assembly but not later than the first full week in February except in his first year of office. The Governor's submission begins with the Budget Message delivered in joint session. The budget in the form of a proposed bill is delivered to the appropriations committee of one of the houses. Hearings are held on the bills constituting the budget. In an iterative process, bills are reported from committee to floor and considered in and between houses.

The operating budget is considered in the form of the General Appropriations Bill and its supplements. The Bill is limited to appropriations for debt service, public schools and the executive, legislative and judicial branches. Its supplements cover appropriations from special revenue funds not included in the General Appropriations Bill and for such subjects as capital projects funded from current revenues. The operating budget also includes single subject bills covering appropriations made to any charitable or educational institutions not under the absolute control of the Commonwealth other than certain State-owned schools (“non-preferred appropriations”).

The Constitution mandates that total operating budget appropriations made by the General Assembly may not exceed the sum of (a) the actual and estimated revenues in a given year, and (b) the surplus of the preceding year. The Constitution further specifies that a surplus of operating funds at the end of the fiscal year shall be appropriated. That is, if funds remain from the end of a fiscal year they must be appropriated for the ensuing year. Also, if a deficit occurs at year-end, funds must be provided for such a deficit.

Pursuant to the Administrative Code, the executive branch establishes the revenue estimates used in the budget. In practice, the revenue estimates used to balance the operating budget consist of the appropriate fund’s available surplus and its estimated cash receipts for the fiscal year as well as net accruals. Appropriation lapses estimated to occur during the year or at year-end are not included; lapses are not available for re-appropriation until they occur.

Under this budgetary process a deficit can occur if revenues are less than those estimated in the budget and the shortfall is not offset by any unappropriated surplus or by appropriation lapses during or at the end of the year or by legislative action to increase revenues or reduce appropriation.

The Administrative Code was amended in 1978 to provide for stronger executive control of expenditures. All departments under the Governor’s jurisdiction may be required to submit estimates of expenditures during the ensuing month, quarter or any other such period as requested by the Governor. These estimates are subject to the approval of the Secretary of Budget. The Governor is empowered to request the State Treasurer to withhold funds from any such department not spending within such estimates. The Secretary of Budget is empowered to set personnel levels for departments. Departments are required to provide personnel data monthly so that the Commonwealth’s computerized data file on personnel levels can be maintained and used to monitor the Commonwealth’s largest operating expense.

The proposed capital budget is considered in the form of the Capital Budget Bill and its supplements. The capital budget determines limits for the amount of debt that can be issued in that fiscal year for categories of capital projects, itemizes for funding all capital projects not previously itemized, authorizes the issuance of debt to finance these projects and appropriates the proceeds from the issuance of debt.

All appropriations require the majority vote of all members in each house except for non-preferred appropriations and appropriations from the Budget Stabilization Reserve Fund and from the Health Endowment Account portion of the Tobacco Settlement Fund which require passage by a two-thirds vote. During the legislative process, the General Assembly may add, change or delete any items in the budget proposed by the Governor. Once the bills constituting the budget have passed both houses and are returned to the Governor, he may either veto bills or item veto appropriations within bills. A gubernatorial veto can be overridden only by a two-thirds majority of all members of each house.

In the event that the General Assembly fails to pass or the Governor fails to sign an appropriations act prior to July 1 of any fiscal year for that fiscal year, the Pennsylvania Constitution, the laws of Pennsylvania and certain state and federal court decisions provide that the Commonwealth may continue during such un-budgeted fiscal year to make debt service payments, payments for mandated federal programs such as cash assistance and payments related to the health and safety of the citizens of the Commonwealth such as police and correctional services.

Accounting and Budgetary Controls

Every department of the executive branch that receives appropriations from the Commonwealth, with the exception of the Treasury Department and the Departments of the Auditor General and the Attorney General, has a comptroller appointed by and under the direct jurisdiction of the Governor. These agencies share a centralized encumbrance-based accounting system supervised by OB. Executive departments operating separate additional accounting systems include the Department of Transportation for the Motor License Fund, the Liquor Control Board for the State Stores Fund and the Department of Labor and Industry for the payment of unemployment compensation benefits. Officials within the Treasury Department, the Departments of the Auditor General and the Attorney General and the judicial and legislative branches administer individual operations under the jurisdiction of their respective areas.

Expenditure control occurs at two levels. The first is by appropriations and is enforced by the State Treasurer and individual comptrollers. The second is by allocations and allotments and is enforced by OB for all departments receiving appropriations, except for the legislative branch.

Departments receive authorization to spend and commit funds in the form of appropriations for a specific amount, purpose and time period. Funds appropriated to a single department may be in one or more appropriations as the General Assembly determines. When multiple appropriations to a department are enacted, separate appropriations are made for general operating expenses, special outlays and for specific programs or groupings thereof. The degree to which a department's total appropriations are itemized may vary, but control is exercised over both total and individual appropriations.

The Constitution requires that with the exceptions named, monies may be paid from the Treasury only if appropriated by law. Accordingly, when a voucher is submitted to the State Treasurer, a check will not be issued unless the amount is within the balance of the agency's total appropriation.

Departments are prevented by their comptrollers from incurring obligations in excess of their unexpended individual appropriations by an encumbrance system. Encumbrance control prevents spending beyond remaining individual appropriation balances. When a commitment or obligation is incurred, for example, when a contract or purchase order is signed, the required portion of the corresponding appropriation is reserved. This reserving of funds is called the encumbrance procedure. All obligations anticipating future disbursement of cash in the fiscal year require an encumbrance, with the exception of debt service payments. Since a debt service appropriation is used for no purpose other than debt service, an encumbrance is not necessary.

All individual appropriations are allocated by OB to departments by major object groups. For example, a department's appropriation for operating expenses may be broken down into such major object groups as personnel service, operating expenses and supplies, etc. Additionally, major object groups are subdivided into minor object groups. For example, personnel service would be broken down into salaries, benefits, overtime, etc. Department expenditures are monitored to insure that expenditures within an allocation do not exceed the designated totals. The departments, however, are free to adjust their expenditures between minor object groups as long as they do not exceed the major object group allocation. OB can monitor department expenditures against their allocations on a continuing basis as the records of departments under the Governor's jurisdiction can be accessed from the central system while those of most other departments and branches are provided monthly.

In addition to the preceding controls, another check is provided by the financial reporting process. All department records are reconciled by OB on a monthly basis with the Treasury Department's records of cash transactions and with the Department of Revenue's records of cash collections.

Audits

The Constitution requires that the financial affairs of any entity receiving appropriations and all department boards, commissions, agencies, instrumentalities, authorities and institutions of the Commonwealth be subject to audits made in accordance with generally accepted auditing standards. Any Commonwealth officer whose approval is necessary for any transaction may not be charged with the function of auditing that transaction after its occurrence.

The Department of the Auditor General has the responsibility for auditing all state-related financial transactions except its own, those of the legislative and judicial branches, and boards and commissions on which the Auditor General serves and those of certain funds. At least one audit must be made annually of the fiscal affairs of the executive branch. Audits of the Commonwealth General Purpose Financial Statements since fiscal 1985 have been performed jointly by the Department of the Auditor General and an independent public accounting firm.

The Treasury Department is required to pre-audit all requests for expenditures to insure that they are in accordance with law. In addition, OB conducts, as a matter of administrative policy, periodic audits of comptrollers under the Governor's jurisdiction and performance audits of state and federal programs.

**INFORMATION REGARDING
THE DEPOSITORY TRUST COMPANY
AND ITS BOOK-ENTRY SYSTEM**

The information that follows concerning The Depository Trust Company, New York, New York (“DTC”) and the book-entry only system described below is based solely on information furnished by DTC and is not, and should not be construed as, a representation by the Commonwealth as to its accuracy, completeness or otherwise.

DTC will act as securities depository for the Bonds. The Bonds will be issued as fully-registered securities 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 Bond certificate will be issued for each maturity of each series of the Bonds, each in the aggregate principal amount of such maturity, and 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 3.6 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 book-entry 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”). DTC has a Standard & Poor’s rating of AA+. 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 Bonds under the DTC system must be made by or through Direct Participants, which will receive a credit for the Bonds on DTC’s records. The ownership interest of each actual purchaser of each Bond (“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, but Beneficial Owners are 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 the Bonds 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 Bonds, except in the event that use of the book-entry system for the Bonds is discontinued.

To facilitate subsequent transfers, all Bonds deposited by Direct Participants with DTC are registered in the name of DTC’s partnership nominee, Cede & Co. or such other name as requested by an authorized representative of DTC. The deposit of 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 Bonds; DTC’s records reflect only the identity of the Direct Participants to whose accounts such 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.

Beneficial Owners of the Bonds may wish to take certain steps to augment the transmission to them of notices of significant events with respect to the Bonds, such as redemptions, tenders, defaults, and proposed amendments to the Bond documents. Beneficial Owners of Bonds may wish to ascertain that the nominee holding the Bonds for their benefit has agreed to obtain and transmit notices to Beneficial Owners, or in the alternative, Beneficial Owners may wish to provide their names and addresses to the Loan and Transfer Agent and request that copies of notices be provided directly to them.

Redemption notices shall be sent to DTC. If less than all of the Bonds within a maturity are 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 the Bonds. Under its usual procedures, DTC will mail an Omnibus Proxy to the Commonwealth 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 Bonds are credited on the record date (identified in a listing attached to the Omnibus Proxy).

Payments of principal or redemption price of and interest on the Bonds 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 Commonwealth or its agent, on the payable date in accordance with their respective holdings shown on DTC's records. Payments by Direct and Indirect Participants to Beneficial Owners will be governed by standing instructions and customary practices, as is the case with securities held for the accounts of customers in bearer form or registered in "street name," and will be the responsibility of such Direct and Indirect Participants and not of DTC (nor its nominee), the Loan and Transfer Agent, or the Commonwealth, subject to any statutory or regulatory requirements as may be in effect from time to time. Payment of principal or redemption price of and interest to Cede & Co. (or such other nominee as may be requested by an authorized representative of DTC) is the responsibility of the Commonwealth or the Loan and Transfer Agent, disbursement of such payments to Direct Participants is the responsibility of DTC, and disbursement of such payments to the Beneficial Owners is the responsibility of Direct and Indirect Participants.

DTC may discontinue providing its services as securities depository with respect to the Bonds at any time by giving reasonable notice to the Commonwealth or the Loan and Transfer Agent. Under such circumstances, in the event that a successor securities depository is not obtained, Bond certificates are required to be printed and delivered.

The foregoing information concerning DTC and DTC's book-entry system has been obtained from information furnished by DTC. No representation or warranty is made by the Commonwealth as to the accuracy or completeness of such information.

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

For so long as the Bonds are registered in the name of DTC, or its nominee Cede & Co., the Commonwealth and the Loan and Transfer Agent will treat Cede & Co. as the registered owner of the Bonds for all purposes, including payments, notices and voting.

Neither the Commonwealth nor the Loan and Transfer Agent shall have any responsibility or obligation to any Direct or Indirect Participant or Beneficial Owner with respect to (a) the accuracy of any records maintained by DTC or any Direct or Indirect Participant with respect to any beneficial ownership interest in any Bonds; (b) the payment by any Direct or Indirect Participant of any amount due to any Beneficial Owner in respect of the principal of, premium, if any, and interest on the Bonds; (c) the delivery or timeliness of delivery by any Direct or Indirect Participant of any notice to any Beneficial Owner of any notice with respect to the Bond, including, without limitation any notice of redemption; or (d) other action taken by DTC or Cede & Co., including the effectiveness of any action taken pursuant to an Omnibus Proxy.

**SELECTED
CONSTITUTIONAL PROVISIONS
RELATING TO THE FINANCES
OF THE COMMONWEALTH**

Article VIII — TAXATION AND FINANCE

Commonwealth Indebtedness

Section 7. (a) No debt shall be incurred by or on behalf of the Commonwealth except by law and in accordance with the provisions of this section.

- (1) Debt may be incurred without limit to suppress insurrection, rehabilitate areas affected by man-made or natural disaster, or to implement unissued authority approved by the electors prior to the adoption of this article.
- (2) The Governor, State Treasurer and Auditor General, acting jointly, may (i) issue tax anticipation notes having a maturity within the fiscal year of issue and payable exclusively from revenues received in the same fiscal year, and (ii) incur debt for the purpose of refunding other debt, if such refunding debt matures within the term of the original debt.
- (3) Debt may be incurred without limit for purposes specifically itemized in the law authorizing such debt, if the question whether the debt shall be incurred has been submitted to the electors and approved by a majority of those voting on the question.
- (4) Debt may be incurred without the approval of the electors for capital projects specifically itemized in a capital budget, if such debt will not cause the amount of all net debt outstanding to exceed one and three-quarters times the average of the annual tax revenues deposited in the previous five fiscal years as certified by the Auditor General. For the purposes of this subsection, debt outstanding shall not include debt incurred under clauses (1) and (2)(i), or debt incurred under clause (2)(ii) if the original debt would not be so considered, or debt incurred under subsection (3) unless the General Assembly shall so provide in the law authorizing such debt.

(b) All debt incurred for capital projects shall mature within a period not to exceed the estimated useful life of the projects as stated in the authorizing law, and when so stated shall be conclusive. All debt, except indebtedness permitted by clause (2)(i), shall be amortized in substantial and regular amounts, the first of which shall be due prior to the expiration of a period equal to one-tenth the term of the debt.

(c) As used in this section, debt shall mean the issued and outstanding obligations of the Commonwealth and shall include obligations of its agencies or authorities to the extent they are to be repaid from lease rentals or other charges payable directly or indirectly from revenues of the Commonwealth. Debt shall not include either (1) that portion of obligations to be repaid from charges made to the public for the use of the capital projects financed, as determined by the Auditor General, or (2) obligations to be repaid from lease rentals or other charges payable by a school district or other local taxing authority, or (3) obligations to be repaid by agencies or authorities created for the joint benefit of the Commonwealth and one or more other State governments.

(d) If sufficient funds are not appropriated for the timely payment of the interest upon and installments of principal of all debt, the State Treasurer shall set apart from the first revenues thereafter received applicable to the appropriate fund a sum sufficient to pay such interest and installments of principal, and shall so apply the money so set apart. The State Treasurer may be required to set aside and apply such revenues at the suit of any holder of Commonwealth obligations.

Commonwealth Credit Not to be Pledged

Section 8. The credit of the Commonwealth shall not be pledged or loaned to any individual, company, corporation or association nor shall the Commonwealth become a joint owner or stockholder in any company, corporation or association.

Municipal Debt Not to be Assumed by Commonwealth

Section 9. The Commonwealth shall not assume the debt, or any part thereof, of any county, city, borough, incorporated town, township or any similar general purpose unit of government unless such debt shall have been incurred to enable the Commonwealth to suppress insurrection or to assist the Commonwealth in the discharge of any portion of its present indebtedness.

Audit

Section 10. The financial affairs of any entity funded or financially aided by the Commonwealth, and all departments, boards, commissions, agencies, instrumentalities, authorities and institutions of the Commonwealth, shall be subject to audits made in accordance with generally accepted auditing standards.

Any Commonwealth officer whose approval is necessary for any transaction relative to the financial affairs of the Commonwealth shall not be charged with the function of auditing that transaction after its occurrence.

Gasoline Taxes and Motor License Fees Restricted

Section 11. (a) All proceeds from gasoline and other motor fuel excise taxes, motor vehicle registration fees and license taxes, operators' license fees and other excise taxes imposed on products used in motor transportation after providing therefrom for (a) cost of administration and collection, (b) payment of obligations incurred in the construction and reconstruction of public highways and bridges shall be appropriated by the General Assembly to agencies of the State or political subdivisions thereof; and used solely for construction, reconstruction, maintenance and repair of and safety on public highways and bridges and costs and expenses incident thereto, and for the payment of obligations incurred for such purposes, and shall not be diverted by transfer or otherwise to any other purpose, except that loans may be made by the State from the proceeds of such taxes and fees for a single period not exceeding eight months, but no such loan shall be made within the period of one year from any preceding loan, and every loan made in any fiscal year shall be repayable within one month after the beginning of the next fiscal year.

(b) All proceeds from aviation fuel excise taxes, after providing therefrom for the cost of administration and collection, shall be appropriated by the General Assembly to agencies of the State or political subdivisions thereof and used solely for: the purchase, construction, reconstruction, operation, and maintenance of airports and other air navigation facilities; aircraft accident investigation; the operation, maintenance and other costs of aircraft owned or leased by the Commonwealth; any other purpose reasonably related to air navigation including but not limited to the reimbursement of airport property owners for property tax expenditures; and costs and expenses incident thereto and for the payment of obligations incurred for such purposes, and shall not be diverted by transfer or otherwise to any other purpose.

Governor's Budgets and Financial Plan

Section 12. Annually, at the times set by law, the Governor shall submit to the General Assembly:

(a) A balanced operating budget for the ensuing fiscal year setting forth in detail (i) proposed expenditures classified by department or agency and by program and (ii) estimated revenues from all sources. If estimated revenues and available surplus are less than proposed expenditures, the Governor shall recommend specific additional sources of revenue sufficient to pay the deficiency and the estimated revenue to be derived from each source;

(b) A capital budget for the ensuing fiscal year setting forth in detail proposed expenditures to be financed from the proceeds of obligations of the Commonwealth or of its agencies or authorities or from operating funds; and

(c) A financial plan for not less than the next succeeding five fiscal years, which plan shall include for each such fiscal year:

- (i) Projected operating expenditures classified by department or agency and by program, in reasonable detail, and estimated revenues, by major categories, from existing and additional sources; and
- (ii) Projected expenditures for capital projects specifically itemized by purpose, and the proposed sources of financing each.

Appropriations

Section 13. (a) Operating budget appropriations made by the General Assembly shall not exceed the actual and estimated revenues and surplus available in the same fiscal year.

(b) The General Assembly shall adopt a capital budget for the ensuing fiscal year.

Surplus

Section 14. All surplus of operating funds at the end of the fiscal year shall be appropriated during the ensuing fiscal year by the General Assembly.

Project “70”

Section 15. In addition to the purposes stated in article eight, section seven of this Constitution, the Commonwealth may be authorized by law to create debt and to issue bonds to the amount of seventy million dollars (\$70,000,000) for the acquisition of land for State parks, reservoirs and other conservation and recreation and historical preservation purposes and for participation by the Commonwealth with political subdivisions in the acquisition of land for parks, reservoirs and other conservation and recreation and historical preservation purposes, subject to such conditions and limitations as the General Assembly may prescribe.

Land and Water Conservation and Reclamation Fund

Section 16. In addition to the purposes stated in article eight, section seven of this Constitution, the Commonwealth may be authorized by law to create debt and issue bonds in the amount of five hundred million dollars (\$500,000,000) for a Land and Water Conservation and Reclamation Fund to be used for the conservation and reclamation of land and water resources of the Commonwealth, including the elimination of acid mine drainage, sewage, and other pollution from the streams of the Commonwealth, the provision of State financial assistance to political subdivisions and municipal authorities of the Commonwealth of Pennsylvania for the construction of sewage treatment plants, the restoration of abandoned strip-mined areas, the control and extinguishment of surface and underground mine fires, the alleviation and prevention of subsidence resulting from mining operations, and the acquisition of additional lands and the reclamation and development of park and recreational lands acquired pursuant to the authority of Article VIII, section 15 of this Constitution, subject to such conditions and liabilities as the General Assembly may prescribe.

**PROPOSED FORM OF OPINION OF
THE OFFICE OF ATTORNEY GENERAL
THE COMMONWEALTH OF PENNSYLVANIA**

_____, 2016

TO THE GOVERNOR, THE STATE TREASURER AND THE AUDITOR GENERAL AS THE ISSUING OFFICIALS OF THE COMMONWEALTH:

Re: Commonwealth of Pennsylvania General Obligation Bonds, Second Refunding Series of 2016

This opinion is furnished to you in connection with the issuance and sale by the Commonwealth of Pennsylvania (the "Commonwealth") on the date hereof of [\$613,145,000] aggregate principal amount of Commonwealth of Pennsylvania General Obligation Bonds, Second Refunding Series of 2016 (the "Bonds"). The Bonds are dated the date of issuance and delivery. The Bonds are issued as fully registered bonds without coupons in the denomination of \$5,000 or any integral multiple thereof within a maturity and will bear interest from the date of issuance and delivery, payable semi-annually on January 15 and July 15 of each year commencing January 15, 2017, until the obligation with respect to the payment of such principal shall have been discharged.

The Bonds are authorized and issued pursuant to and in full compliance with the provisions, restrictions and limitations of Section 7 of Article VIII of the Constitution of the Commonwealth of Pennsylvania (the "Constitution"); the laws of the Commonwealth, including the Capital Facilities Debt Enabling Act, Act No. 1999-1, approved February 9, 1999, as amended, annual capital budget bills and various bond authorization bills enacted by the General Assembly. The Bonds are also authorized and issued pursuant to resolutions adopted by the Governor, the State Treasurer and the Auditor General (the "Issuing Officials") on November 30, 2016, and _____, 2016 (collectively, the "Resolutions").

The Resolutions, among other things, authorize the issuance and sale of the Bonds, and prescribe the forms thereof, the manner of bidding therefor and the forms of the bidding documents used in connection with the issuance and sale of the Bonds.

Under Section 7(a)(2)(ii) of Article VIII of the Constitution, the Commonwealth may incur debt for the purpose of refunding other debt, if such refunding debt matures within the term of the original debt.

I have examined Article VIII, Section 7 of the Constitution and the statutes referred to above, specimens of the Bonds, the Resolutions, and the other certificates delivered today at the Closing and such other matters and documents as I deemed necessary or appropriate.

I am of the opinion that:

1. Section 7 of Article VIII of the Constitution has been duly approved and adopted and has become part of the Constitution, and the statutes referred to above have been duly and properly enacted.
2. Pursuant to full and adequate legal power conferred upon them by the Constitution and the statutes referred to above, the Governor, the State Treasurer and the Auditor General have duly adopted the Resolutions and have validly taken all other necessary and proper action to issue and sell the Bonds, and the Bonds have been validly authorized, issued and sold pursuant to proper and appropriate action of such officials.
3. The Bonds are lawful, valid, direct and general obligations of the Commonwealth, and the full faith and credit of the Commonwealth is pledged for the payment of interest thereon as the same shall become due and for the payment of the principal thereof at maturity.

4. Under the provisions of Section 2901 of the Tax Reform Code of 1971, as amended, the Bonds and the interest thereon are exempt from taxation for state and local purposes within the Commonwealth, but this exemption does not extend to (a) gift, estate, succession or inheritance taxes or (b) any other taxes not levied or assessed directly on the Bonds or the interest thereon.

5. The Commonwealth has the power to provide for the payment of the principal of and interest on the Bonds (as defined in the Official Statement) by levying unlimited ad valorem taxes upon all taxable property within the Commonwealth and excise taxes upon all taxable transactions within the Commonwealth, uniform on the same class of subjects, except gasoline and other motor fuel excise taxes, motor vehicle registration fees and license taxes, and operators' license fees and other excise taxes imposed on products used in motor transportation, and aviation fuel excise taxes, the proceeds of which are limited to certain special purposes by Section 11 of Article VIII of the Constitution.

6. If sufficient funds are not appropriated for timely payment of interest on and installments of principal of the Bonds, the Constitution requires the State Treasurer to set apart from the first revenues thereafter received applicable to the appropriate fund, a sum sufficient to pay such interest and installments of principal and to apply said sum to such purposes, and the State Treasurer may be required to set aside and apply such revenues at the suit of the holder of any of the Bonds.

Very truly yours,

Bruce R. Beemer
Attorney General
Office of Attorney General of the
Commonwealth of Pennsylvania

BELOW IS THE PROPOSED FORM OF OPINION OF CO-BOND COUNSEL
EXPECTED TO BE DELIVERED IN CONNECTION WITH THE
ISSUANCE OF THE BONDS

RE: Commonwealth of Pennsylvania General Obligation Bonds,
\$_____ Second Refunding Series of 2016

Ladies and Gentlemen:

We have served as Co-Bond Counsel to the Commonwealth of Pennsylvania (the “Commonwealth”) in connection with the issuance of its \$_____ General Obligation Bonds, Second Refunding Series of 2016 (the “Bonds”). The Bonds are issued under and pursuant to (i) Section 7 of Article VIII of the Constitution of the Commonwealth, (ii) the laws of the Commonwealth, including the Capital Facilities Debt Enabling Act, Act No. 1991-1, approved February 9, 1999, as amended (the “Act”), annual capital budget bills and various bond authorization bills enacted by the General Assembly, as amended, and (iii) bond resolutions adopted by the Governor, State Treasurer and Auditor General of the Commonwealth (collectively, the “Issuing Officials”) on November 30, 2016 and _____, 2016 (the “Resolutions”). Capitalized terms used but not defined herein have the meanings set forth in the Resolutions.

The Bonds are being issued by the Commonwealth to provide funds (i) to finance the refunding on a current and advance basis of a portion of the following series of bonds: Second Series of 2006, First Refunding Series of 2006, First Series B of 2007, Second Series B of 2007, First Series of 2008, Second Series of 2008, First Series of 2009, Second Series of 2009, and Third Series C of 2010; and (ii) to pay the costs of issuance of the Bonds.

In our capacity as Co-Bond Counsel, we have examined and relied on the proceedings relating to the authorization and issuance of the Bonds, including, among other things: (i) the Constitution of the Commonwealth (the “Constitution”), the Act and certain of the annual capital budget bills and bond authorization bills referenced above; (ii) certified copies of the Resolutions; (iii) an opinion of the Office of Attorney General of the Commonwealth of Pennsylvania; (iv) certificates executed by the Commonwealth and its Loan and Transfer Agent for the Bonds as to the execution and authentication of the Bonds; (v) a certificate of the Auditor General of the Commonwealth regarding the Commonwealth’s compliance with the debt limitation contained in Section 7(a)(4) of Article VIII of the Constitution; (vi) various other certificates executed by the Commonwealth, including a Non-Arbitrage Certificate dated the date of issuance of the Bonds (the “Tax Certificate”) pursuant to which the Commonwealth has, among other things, covenanted that it will make no use of the proceeds of the Bonds which would cause the Bonds to be “arbitrage bonds” or “private activity bonds,” as those terms are defined in the Internal Revenue Code of 1986, as amended (the “Code”) and the applicable regulations thereunder, and further covenanted that it will comply with the applicable requirements of Sections 103 and 141 through 150 of the Code and the applicable regulations thereunder throughout the term of the Bonds; and (vii) a

completed and executed Form 8038-G of the Commonwealth with respect to the Bonds to be filed with the Internal Revenue Service.

In rendering our opinion, we have assumed the accuracy of and not undertaken to verify the factual matters set forth in such certificates and other documents by independent investigation and have relied on the covenants, warranties and representations made by the Commonwealth in such certificates and in the Resolutions and other financing documents. In addition, we have assumed the genuineness of all signatures, the authenticity of all documents submitted to us as originals, the conformity with originals of all documents submitted to us as copies and the authenticity of certificates of public officials.

From our examination of the foregoing and such other items as we deem relevant, we are of the opinion that:

1. The principal amount of the Bonds is within all applicable debt and other limitations fixed by the Constitution and the laws of the Commonwealth.

2. The Bonds have been duly authorized, executed and delivered by the Commonwealth pursuant to all necessary action of the Issuing Officials and constitute valid and binding general obligations of the Commonwealth, enforceable against the Commonwealth in accordance with the terms thereof, except as enforcement may be limited by laws relating to bankruptcy, insolvency, reorganization, arrangement, moratorium or similar laws affecting creditors' rights generally and subject to limitations on legal remedies against public entities in the Commonwealth, to general principles of equity (regardless of whether such enforceability is considered in a proceeding in equity or at law) and to the exercise of judicial discretion.

3. The full faith and credit of the Commonwealth are pledged for the payment of the interest due on the Bonds and the principal thereof due at maturity. If sufficient funds are not appropriated for the timely payment of interest on and installments of principal of the Bonds, the Constitution requires the State Treasurer to set apart from the first revenues thereafter received applicable to the appropriate fund, a sum sufficient to pay such interest and installments of principal and to apply said sum to such purposes, and the State Treasurer may be required to set aside and apply such revenues at the suit of the holder of any of the Bonds.

4. The Bonds are exempt from personal property taxes in Pennsylvania, and interest on the Bonds is exempt from Pennsylvania personal income tax and Pennsylvania corporate net income tax, under the laws of the Commonwealth as enacted and construed on the date of initial delivery of the Bonds.

5. Interest on the Bonds, and accruals of original interest discount, are excludable from gross income for federal income tax purposes under existing laws as enacted and construed on the date of initial delivery of the Bonds. Interest on the Bonds is not an item of tax preference for purposes of the federal alternative minimum tax imposed on individuals and corporations; it should be noted, however, that for the purpose of computing the alternative minimum tax imposed on certain corporations (as defined for federal income tax purposes), such interest is taken into account in determining adjusted current earnings. The opinions set forth in the preceding two sentences are subject to the condition that the Commonwealth comply with all

requirements of the Code that must be satisfied subsequent to the issuance of the Bonds in order that the interest thereon be, or continue to be, excluded from gross income for federal income tax purposes. The Commonwealth has covenanted in the Tax Certificate to comply with all such requirements. Our opinion assumes compliance with such covenants and we do not undertake 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 Bonds may affect the tax status of interest on the Bonds. Failure to comply with certain of such requirements may cause interest on the Bonds to be included in gross income for federal income tax purposes retroactive to the date of issuance of the Bonds.

Ownership of tax-exempt obligations, including the Bonds, may result in collateral federal income tax consequences to certain taxpayers, including financial institutions, property and casualty insurance companies, individual recipients of Social Security or Railroad Retirement benefits, S corporations with “excess net passive income” and taxpayers who may be deemed to have incurred or continued indebtedness to purchase or carry such obligations. Other than as expressly set forth herein, we express no opinion as to any such collateral federal income tax consequences.

6. The Bonds are exempt from registration under the provisions of the Securities Act of 1933, as amended.

We express no opinion on the adequacy, completeness or accuracy of any official statement, placement memorandum or other disclosure document pertaining to the offering of the Bonds.

This opinion letter is limited to the matters expressly stated herein. This opinion letter is subject to future changes in applicable law and we do not undertake any obligation to update any of the opinions expressed in this letter. No opinion may be inferred or implied beyond the matters expressly stated herein, and our opinions expressed herein must be read in conjunction with the assumptions, limitations, exceptions and qualifications set forth herein. The law covered by the opinions expressed herein is limited to the laws of the Commonwealth of Pennsylvania and the federal law of the United States of America. Our engagement as Co-Bond Counsel has concluded with the issuance of the Bonds.

Very truly yours,

NOTICE OF SALE
\$613,145,000*
Commonwealth of Pennsylvania
General Obligation Bonds
Second Refunding Series of 2016

Electronic bids will be received by the Commonwealth of Pennsylvania (the "Commonwealth"), via *PARITY*[®] ("Parity") in the manner described below, up to 11:00 A.M., Prevailing Eastern Time, on

Wednesday, December 7, 2016 (the "Bid Date")

or such other subsequent date (the "Amended Bid Date") to be announced in an Amended Notice (as hereinafter defined) to be distributed not later than 4:00 P.M. on the last business day prior to the Bid Date, for the purchase of all, but not less than all, of the \$613,145,000* aggregate principal amount of Commonwealth of Pennsylvania General Obligation Bonds, Second Refunding Series of 2016 (the "Bonds"). The principal amount of the Bonds and consequently each corresponding serial maturity of the Bonds, is subject to adjustment described below under the heading "Adjustment of Principal."

Bids must be submitted in accordance with this Notice of Sale prior to 11:00 A.M. Prevailing Eastern Time on the Bid Date. No bid will be accepted after the bid deadline.

Right to Amend

The Commonwealth reserves the right, in its sole discretion, to:

1. change the date or time it will receive and open electronic bids to purchase the Bonds;
2. increase or decrease the total principal amount of the Bonds; and
3. adjust the respective par amounts of the Bonds based on prevailing market conditions at the time of the sale of the Bonds.

Changes to the Bonds being offered, if made prior to the Bid Date, will be contained in an Amended Notice of Sale (the "Amended Notice") to be transmitted via The Bond Buyer Wire not later than 4:00 P.M. on the last business day prior to the Bid Date. The Amended Notice shall (i) state the Amended Bid Date (a date not before December 7, 2016) and the time by which bids to purchase the Bonds must be received by the Commonwealth; (ii) state the revised principal amounts; (iii) state the proposed closing date; and (iv) supplement and update the information contained in this Notice of Sale to the extent deemed necessary by the Commonwealth.

Security

The Bonds will be direct and general obligations of the Commonwealth, issued pursuant to and within the applicable debt limits prescribed by Section 7 of Article VIII of the Constitution of Pennsylvania and various implementing acts of the General Assembly.

Bond Details

The Bonds will be dated the date of issuance and delivery, and will bear such rate or rates of interest, payable semiannually on January 15 and July 15 in each year commencing January 15, 2017 as shall be fixed by the purchaser in its proposal for the purchase of the Bonds. The Bonds shall mature serially on January 15, in the respective years and in the respective amounts as set forth on the following page:

* Preliminary, subject to change.

Second Refunding Series Bonds

<u>Due January 15</u>	<u>Principal Amount*</u>	<u>Due January 15</u>	<u>Principal Amount*</u>
2017	\$12,515,000	2024	\$45,710,000
2018	6,640,000	2025	29,145,000
2019	15,310,000	2026	165,000
2020	43,970,000	2027	52,925,000
2021	108,925,000	2028	80,335,000
2022	138,795,000	2029	15,945,000
2023	62,765,000		

Delivery of the Bonds is proposed to occur on December 16, 2016 unless another date is set forth in any Amended Notice (the "Closing Date").

The Bonds will be issued and sold by means of a book-entry only system with no distribution of Bond certificates made to the public. Bond certificates representing the aggregate principal amount of the Bonds maturing in each year will be issued and fully registered as to principal and interest in the name of Cede & Co., as nominee of The Depository Trust Company, New York, New York ("DTC"), a depository registered with the Securities and Exchange Commission. Individual beneficial ownership of the Bonds will be in principal amounts of \$5,000 or integral multiples thereof within a maturity pursuant to the rules and procedures established between DTC and its participants.

Transfers of beneficial ownership will be affected through records maintained by DTC and its participants pursuant to rules and procedures established by DTC. The responsibility for maintaining, reviewing and supervising such records rests collectively with DTC and its participants. The winning bidder, as a condition to the delivery of the Bonds, shall be required to deposit the Bond certificates in its account at DTC, registered in the name of Cede & Co. Interest on the Bonds will be payable on each semi-annual interest payment date and principal of the Bonds will be paid annually as set forth in the foregoing maturity schedule, in same-day funds to DTC or its nominee as registered owner of the Bonds. Transfer of principal and interest payments to the beneficial owners by participants of DTC will be the responsibility of such DTC participants and other nominees of beneficial owners. The Commonwealth will not be responsible or liable for maintaining, supervising or reviewing the records maintained by DTC, its participants or persons acting through such participants.

Optional Redemption

The Bonds maturing on and after January 15, 2028, are subject to redemption at the option of the Commonwealth prior to scheduled maturity on and after January 15, 2027, as a whole or in part (and if in part, within one or more maturities) at any time and from time to time, in any order of maturity determined by the Commonwealth and by lot within a maturity in such manner as the Commonwealth in its discretion may determine, on at least 30 days (but not more than 60 days) notice, at a redemption price equal to par (100% of stated principal amount) plus accrued interest to the date fixed for redemption.

Mandatory Sinking Fund Redemption at the Option of the Bidder

Bidders may elect to structure the issue to include term bonds, which term bonds, if selected by the bidder, will be subject to mandatory sinking fund redemption prior to maturity, in the years and amounts shown above on page H-2 in the serial bond maturity schedule, upon payment of 100% of the principal amount of Bonds to be redeemed, together with accrued interest to the date fixed for redemption. Bonds within a maturity of a particular series to be redeemed shall be selected by lot by the Loan and Transfer Agent. If the Bonds are awarded and no term bonds are designated in the winning bid, the Bonds will mature serially as shown in the preceding schedule.

* Preliminary, subject to change. See "Adjustment of Principal."

Interest Rate and Bidding Details

Each bidder shall designate a rate of interest per annum to be paid on the Bonds of each maturity subject to the following limitations:

- (i) all Bonds of the same maturity must bear the same rate of interest and no one Bond shall bear more than one rate of interest;
- (ii) no interest rate shall be other than a whole multiple of one-twentieth (1/20) or one-eighth (1/8) of one percent (1%) and a zero rate of interest may not be named; and
- (iii) the Initial Issuing Price (see term defined on the next page) for Bonds of any maturity must be greater than or equal to 98½% of that maturity's par value.

No bid for the Bonds at a price less than 98½% of their par value, exclusive of accrued interest, will be considered. Bids may specify any number of interest rates subject to (i) through (iii) above. No bid will be considered which does not offer to purchase all of the Bonds.

Bond Insurance

If the successful bidder chooses to obtain municipal bond insurance or another form of credit enhancement unconditionally and irrevocably guaranteeing payment of the principal of and interest on the Bonds, any purchase of such credit enhancement shall be at the sole option and expense of the successful bidder. If the Bonds are to be subject to credit enhancement, the successful bidder shall pay the premium and other costs therefor prior to the delivery of the Bonds.

If the successful bidder obtains such credit enhancement, it shall promptly advise the Commonwealth and the Financial Advisor to the Commonwealth of the cost of such credit enhancement, and shall provide such further information related thereto as the Commonwealth may request, including information necessary to enable the Commonwealth to compute the yield on the Bonds as affected, if at all, by such credit enhancement.

Failure of the Bonds to be so insured or of any such credit enhancement to be issued shall not in any manner relieve the successful bidder of its contractual obligations arising from the Commonwealth's acceptance of its bid for the purchase of the Bonds, nor shall any change in the ratings provided by any rating agency with respect to any such credit enhancement provider occurring between the time of the award of the Bonds and the time of their delivery to the successful bidder in any manner relieve the successful bidder of such contractual obligations.

Electronic Bidding Procedure

Solely as an accommodation to bidders, the Commonwealth will receive bids delivered electronically through Parity. Further information about Parity, including any fee charged and applicable requirements, may be obtained from:

i-Deal LLC
1359 Broadway
2nd Floor
New York, NY 10018
Phone: (212) 849-5021

All electronic bids must be delivered via Parity. If any provision of this Notice of Sale conflicts with information provided by Parity, this Notice of Sale shall control. Each bidder submitting an electronic bid agrees by doing so that it is solely responsible for all arrangements with (including any charges by) Parity, that the Commonwealth does not endorse or encourage the use of Parity, and that Parity is not acting as an agent of the Commonwealth. Instructions for submitting electronic bids must be obtained from Parity, and the Commonwealth does not assume any responsibility for ensuring or verifying bidder compliance with the procedures of Parity. The Commonwealth shall be entitled to assume that any bid received via Parity has been made by a duly authorized agent of the bidder. Acceptance of electronic bids shall be subject to the limitations set forth in "**Warnings Regarding Electronic Bids**" below.

Warnings Regarding Electronic Bids

The Commonwealth and Bond Counsel assume no responsibility for any error contained in any bid submitted electronically, or for failure of any bid to be transmitted or received at the official time for receipt of bids. The Commonwealth assumes no responsibility for informing any bidder prior to the deadline for receiving bids that its bid is incomplete or not received.

The Commonwealth will accept bids in electronic form only through Parity on the official bid form created for such purpose by Parity. Each bidder, by submitting an electronic bid, understands and agrees that in doing so it is solely responsible for all arrangements with Parity, that the Commonwealth neither endorses nor explicitly encourages the use of Parity, and that Parity is not acting as agent of the Commonwealth. Instructions and forms for submitting electronic bids must be obtained from Parity, and the Commonwealth assumes no responsibility for ensuring or verifying bidder compliance with the procedures of Parity. The Commonwealth shall assume that any bid received through Parity has been made by a duly authorized agent of the bidder.

Reoffering and Sale of Bonds to Public

Within thirty minutes after notification of award of the Bonds the successful bidder (the "Purchaser") shall provide to the Commonwealth the initial offering price to the public (excluding bond houses and brokers or similar persons or organizations acting as wholesalers or underwriters) for each maturity of the Bonds (the "Initial Issuing Prices") and certain other information to enable the Commonwealth to compute the yield on the Bonds for federal income tax law purposes. The Purchaser will be required to provide a certificate regarding the issue price of the Bonds prior to settlement for the Bonds in form satisfactory to the Commonwealth and Co-Bond Counsel establishing that the Purchaser has made a bona fide public offering of all of the Bonds at the Initial Issuing Prices and that, as of the date of the award of the Bonds, the Purchaser reasonably expected that a substantial amount (at least 10 percent) of each maturity of the Bonds would be sold to the public at the Initial Issuing Prices with any exceptions noted. **(See form of certificate attached)**

Each bidder, by the submission of a bid, agrees that if it is the Purchaser, it will make a *bona fide* public offering of the Bonds at prices not greater than the Initial Issuing Prices, offer the Bonds only pursuant to the Official Statement and only in jurisdictions where the offer is legal, and deliver a copy of the Official Statement to each person or entity that purchases the Bonds from the Purchaser as required by Securities and Exchange Commission Rule 15c2-12 (the "Rule"). The Purchaser shall abide by all rules of the Municipal Securities Rulemaking Board ("MSRB") in connection with the issuance and sale of the Bonds, including the delivery to the MSRB of the Official Statement.

Basis of Awards

Award of the Bonds will be made on or before 4:00 P.M. Prevailing Eastern Time, on December 16, 2016 or, in the event of the announcement of an Amended Bid Date, the date specified in the Amended Notice. The Bonds will be sold to the bidder making a bid conforming to the terms of the offering which, on the basis of the lowest net effective interest rate for the Bonds, determined in the manner hereinafter stated, is the best bid, subject to the right of the undersigned in their sole discretion to reject any and all bids. The net effective interest rate for the Bonds shall be the interest rate determined on a true interest cost ("TIC") basis by doubling the semi-annual interest rate, compounded semi-annually, necessary to discount the debt service payments to the date of delivery of the Bonds, proposed to occur on December 16, 2016, unless otherwise announced in an Amended Notice, to the price bid, including interest accrued to the date of delivery, if any. In the event of more than one bid specifying such lowest rate, the Bonds will be awarded to the bidder whose bid is selected by lot from among all such lowest rate bids.

The Commonwealth reserves the right in its sole discretion to waive any minor errors or irregularities in form or content of any bid. No sealed, telephone, facsimile, telegraph or personal delivery bids will be accepted. All bids must be submitted electronically through the PARITY web site.

Adjustment of Principal

After selecting the winning bid, the aggregate principal amount of the Bonds and the principal amortization schedule may be adjusted as determined by the Commonwealth's Co-Financial Advisors in \$5,000 increments to reflect the

actual interest rates and any premium/discount in the winning bid and to create a more desirable debt service structure for the Bonds and the Commonwealth's outstanding bonds.

Such adjustments shall be made at the sole discretion of the Commonwealth. Any adjustments pursuant to this paragraph will not reduce or increase the aggregate principal amount of the Bonds to be issued by more than 15%. The dollar amount bid for the Bonds by the winning bidder will be adjusted proportionately to reflect any reduction or increase in the aggregate principal amount and principal amortization schedule of the Bonds finally determined to be issued. Any such adjustment will be communicated to the winning bidder within 24 hours after the opening of the bids.

Good Faith Deposit

The Purchaser is required to submit a good faith deposit in an amount equal to \$1,000,000 (the "Good Faith Deposit") to the Commonwealth in the form of a wire transfer, which must be received no later than 11:00 A.M. Prevailing Eastern Time on the next business day following the verbal award of the Bonds. If the Good Faith Deposit is not received by such time, the Commonwealth, at its sole discretion, may revoke its acceptance of the Purchaser's proposal. No interest on the Good Faith Deposit will accrue to the Purchaser. The Good Faith Deposit will be applied to the purchase price of the Bonds. In the event the Purchaser fails to honor the accepted proposal, the Good Faith Deposit will be retained by the Commonwealth.

Official Statement and Continuing Disclosure - SEC Rule 15c2-12

The Preliminary Official Statement dated November 30, 2016, issued with respect to the Bonds (the "Preliminary Official Statement"), has been deemed final by the Commonwealth as of its date for purposes of the Rule, except for the omission of information as permitted by the Rule, but is subject to revision, amendment, and completion in the final Official Statement (hereinafter the "Official Statement") to be prepared with respect to the Bonds. A reasonable number of copies (not to exceed 1,000) of the Official Statement, to be dated as of a date prior to settlement, will be furnished to the Purchaser within seven business days after the sale date. Copies of the Official Statement in excess of 1,000 will be furnished at the request of the Purchaser at the Purchaser's expense. The Purchaser will be required to provide pricing information and if applicable, bond insurance or credit enhancement information necessary for the Commonwealth to complete the Official Statement.

In order to assist bidders in complying with the Rule, the Commonwealth will execute a written Continuing Disclosure Agreement to provide or cause to be provided, in accordance with the Rule, certain annual financial information and timely notices of the occurrence of certain events with respect to the Bonds. A description of the Continuing Disclosure Agreement is set forth in the Preliminary Official Statement and will also be set forth in the Official Statement.

CUSIP Numbers

CUSIP numbers will be obtained by the Commonwealth and the CUSIP numbers will be printed on the Bonds, provided, however, that incorrect numbers shall not constitute grounds for a Purchaser of the Bonds to refuse delivery thereof.

Delivery of Bonds

Bond certificates will be delivered through Manufacturers and Traders Trust Company, as the Loan and Transfer Agent, to DTC using DTC's Fast Automated Security Transfer (FAST) System. Payment for the Bonds must be made by wire in immediately available funds for credit at Manufacturers and Traders Trust Company, Loan and Transfer Agent, in Harrisburg, Pennsylvania, at 11:00 A.M., Prevailing Eastern Time, on the Closing Date, or at such other place and time as may be agreed upon with the successful bidder.

The Purchaser shall have the right, at its option, to cancel its obligation to purchase the Bonds if the Commonwealth shall fail to tender the Bonds for delivery within 60 days from the date herein fixed for the receipt of the bids, and in such event, the Purchaser shall be entitled only to the return of its Good Faith Deposit, without interest, and shall have no right of action against the Commonwealth.

Legal Opinions

The Commonwealth will deliver to the Purchaser without charge: (i) the opinion of the Office of Attorney General of the Commonwealth and (ii) the opinions of McNees Wallace & Nurick LLC, Harrisburg, Pennsylvania, and Turner Law, P.C., Philadelphia, Pennsylvania, appointed by the Commonwealth as Co-Bond Counsel, both substantially in the forms of their respective opinions set forth in Appendix G to the Preliminary Official Statement.

Closing Documents

The Bonds are offered subject to the delivery at settlement by the Commonwealth of (i) a certificate stating that there is no litigation pending affecting the validity of the Bonds or their issuance and sale to the Purchaser; (ii) a certification by the Secretary of the Budget that the financial statements contained in the Official Statement accurately reflect the conditions and facts they purport to reflect, that the estimates contained therein, in light of the information available, are believed to be reliable and that there have been no material adverse changes in the financial position of the Commonwealth since the dates of such financial statements that have not been disclosed in the Official Statement; (iii) a certification by the Governor, the Auditor General and the State Treasurer that the Official Statement, except as to the financial statements contained therein, contains no untrue statement of a material fact and does not omit to state a material fact necessary in order to make the statements made therein, in light of the circumstances under which they were made, not misleading; and (iv) a Continuing Disclosure Agreement to provide or cause to be provided certain annual financial information and timely notices of the occurrence of certain events with respect to the Bonds.

Prior to settlement the Purchaser will be required to deliver the certificate referred to under the caption "Reoffering and Sale of Bonds to Public" above and a receipt for the Bonds and the Official Statement in the form hereafter attached.

Copies of Documents

Additional information and copies of the Preliminary Official Statement may be obtained from the Loan and Transfer Agent, Manufacturers and Traders Trust Company, a New York banking corporation, Harrisburg, Pennsylvania (Telephone 717-230-3530) or from the Office of the Budget, Bureau of Revenue, Capital & Debt, 333 Market Street, 18th Floor, Harrisburg, Pennsylvania 17101 (Telephone 717-787-7342). The Preliminary Official Statement may also be downloaded from the Office of the Budget area on the Commonwealth's website, <http://www.budget.state.pa.us>.

TOM WOLF
Governor

EUGENE A. DePASQUALE
Auditor General

TIMOTHY REESE
State Treasurer

Dated: November 30, 2016

COMMONWEALTH OF PENNSYLVANIA
GENERAL OBLIGATION BONDS
\$_____ SECOND REFUNDING SERIES OF 2016

CERTIFICATE OF THE UNDERWRITERS

THIS CERTIFICATION is made in connection with the issuance this day by the Commonwealth of Pennsylvania (the "Issuer"), of its General Obligation Bonds, Second Refunding Series of 2016 in the aggregate principal amount of \$_____ (the "Bonds"). The undersigned officer of _____, as representative of itself and the selling group (collectively, the "Underwriters"), hereby certifies, to the best of its knowledge, information, and belief, based upon its records, as follows:

Defined Terms. Capitalized terms not otherwise defined herein shall have the meanings ascribed thereto in the Issuer's Tax Certificate of even date with respect to the Bonds.

1. **Issue Price.**

(a) The aggregate Initial Public Offering Prices (defined below) of all of the Bonds is \$_____ (which represents the aggregate principal amounts of the Bonds of [\$_____] [plus/less original issue premium/discount of \$_____]).

(b) As of December ____, 2016, which is the date on which we agreed to purchase the Bonds (the "Sale Date"), the Underwriters actually offered all of the Bonds to the general public (excluding bond houses, brokers or similar persons or organizations acting in the capacity of underwriters or wholesalers) (the "Public") in a bona fide public offering at prices not higher than, or, in the case of obligations sold on a yield basis, at yields not lower than, those listed for each maturity on Schedule A hereto (the "Initial Public Offering Prices") and the Underwriters reasonably expected that the first prices at which at least 10% of each maturity would be sold by the Underwriters to the Public would not be higher than, or, in the case of obligations sold on a yield basis, at yields not lower than, the Initial Public Offering Prices.

(c) At least ten percent (10%) of each maturity of the Bonds was first sold to the Public at prices not higher than, or, in the case of obligations sold on a yield basis, at yields not lower than, the Initial Public Offering Prices [except for the Bonds with the following maturities: _____].

(d) The Underwriters have no reason to believe that any of the Initial Public Offering Prices of the Bonds did not represent an expected fair market value of the Bonds as of the Sale Date.

(e) The aggregate Initial Public Offering Prices for the Bonds do not exceed the fair market value of the Bonds as of the Sale Date.

2. **Underwriters' Discount.** The bond discount represents compensation to the Underwriters (or members of the underwriting group) solely for the Underwriters' service provided with respect to the Bonds.

3. **Miscellaneous.**

(a) The Underwriters have not made or received and will not make or receive any payment with respect to their acquisition of the Bonds or the investment of the proceeds thereof which they have not disclosed to the Issuer and McNees Wallace & Nurick LLC and Turner Law, P.C., as co-bond counsel ("Co-Bond Counsel").

(b) We understand that the foregoing information will be relied upon by the Issuer with respect to certain representations that are set forth in the Tax Certificate and by Co-Bond Counsel in rendering their opinions in connection with the issuance of the Bonds and in preparing the Form 8038-G for the Bonds.

Dated: December ____, 2016

_____ as Representative

By: _____
Authorized Officer

December ___, 2016

Commonwealth of Pennsylvania

Manufacturers and Traders Trust Company
Loan and Transfer Agent of the
Commonwealth of Pennsylvania

Re: Commonwealth of Pennsylvania
General Obligation Bonds
Second Refunding Series of 2016

Ladies and Gentlemen:

We hereby acknowledge receipt of \$_____ aggregate principal amount of Commonwealth of Pennsylvania General Obligation Bonds, Second Refunding Series of 2016 (the "Bonds"), numbered and maturing as set forth in the attached Schedule A. The Bonds are registered in the name of Cede & Co., as nominee for The Depository Trust Company, securities depository for the Bonds, with whom the Bonds have been deposited.

The undersigned also acknowledges receipt of electronic-only copies of the Official Statement dated December ___, 2016, with respect to the Bonds, together with one manually signed copy of the respective opinions of Bruce R. Beemer, Attorney General of the Office of Attorney General of the Commonwealth of Pennsylvania, and of McNees Wallace & Nurick LLC and Turner Law, P.C., Co-Bond Counsel, which opinions are dated the date hereof. Such Official Statements and opinions have been received in full satisfaction of the number of copies thereof to be furnished by the Commonwealth to us, as the Purchaser (the "Purchaser"), without expense to the Purchaser.

Very truly yours,

By: _____

Title: _____

**SCHEDULE A
COMMONWEALTH OF PENNSYLVANIA
GENERAL OBLIGATION BONDS
SECOND REFUNDING SERIES OF 2016**

<u>Number</u>	<u>Maturity</u>	<u>Principal Amount</u>	<u>Rate</u>	<u>CUSIP</u>
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