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PA PUBLIC UTILITY COMMISSION
SECRETARY'S BUREAU

November 19, 2018

By Federal Express

Rosemary Chiavetta, Secretary
Pennsylvania Public Utility Commission
Commonwealth Keystone Building
400 North Street, Second Floor
Harrisburg, PA 17120

Re: PECO Energy Company; Securities Certificate No. S-2015-2505971

Dear Secretary Chiavetta:

Pursuant to the Securities Certificate registered by the Commission on November 19, 2015 in the above-captioned proceeding, on June 20, 2018, PECO Energy Company (the "Company") borrowed \$50,000,000 from CANAM PIDC REGIONAL CENTER, LP XXXV, a Pennsylvania limited partnership (the "Lender"). The funds were used for the Company's Electric Long Term Infrastructure Improvement Plan, also known as "System 2020." The Company hereby submits copies of the following documents:

- (1) Loan Agreement dated June 20, 2018, by and between the Company and the Lender; and
- (2) Resolutions of the Board of Directors of the Company.

Should you have any questions concerning this filing, please contact me at my direct-dial number above.

Very truly yours,



Patrick R. Gillard

PRG/amb
Enclosures

cc: Alan Cohn
Amy Neufeld
Amit Kakkar, Esquire
Alessa Torres, Esquire

Execution Copy

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NOV 19 2018

PA PUBLIC UTILITY COMMISSION
SECRETARY'S BUREAU

\$50,000,000

LOAN AGREEMENT

dated as of June 20, 2018

among

**PECO ENERGY COMPANY,
as Borrower,**

and

**CANAM PIDC REGIONAL CENTER, LP XXXV
as Lender**

LOAN AGREEMENT

THIS LOAN AGREEMENT dated as of June 20, 2018 is by and between **PECO ENERGY COMPANY**, a Pennsylvania corporation ("Borrower"), with its principal executive office located at 2301 Market Street, Philadelphia, Pennsylvania 19101, and **CANAM PIDC REGIONAL CENTER, LP XXXV**, a Pennsylvania limited partnership ("Lender"), with a business office 88 Pine Street, Wall Street Plaza, Suite 2010, New York, NY 10005.

WHEREAS:

A. In 1990, the United States Congress enacted legislation to create an Immigrant Investor Program, which was expanded in 1993 to allow for the pooling of investments in economic entities known as "regional centers" (the "Program").

B. The Program, which is currently administered by the U.S. Citizenship and Immigration Services ("USCIS"), permits foreign citizens to receive permanent United States residency in exchange for making a minimum investment of Five Hundred Thousand Dollars (\$500,000.00) in a new commercial enterprise that will facilitate the creation of at least ten (10) direct and/or indirect full-time jobs per minimum investment unit in a targeted employment area.

C. Borrower is undertaking the implementation of the Electric Long Term Infrastructure Improvement Plan, also known as "System 2020," encompassing infrastructure improvements designed to enhance reliability by strengthening and modernizing Borrower's electric distribution system (collectively, the "Project").

D. Lender has been created to permit foreign investors to deploy capital into the Project and obtain lawful U.S. residence under the Program.

F. Borrower has requested, and Lender has agreed to make available, a loan to Borrower in an aggregate amount not to exceed Fifty Million Dollars (\$50,000,000).

ARTICLE I

DEFINITIONS AND INTERPRETATION

SECTION 1.01 Certain Defined Terms. As used in this Agreement, each of the following terms shall have the meaning set forth below (each such meaning to be equally applicable to both the singular and plural forms of the term defined):

"Adjusted Funds From Operations" means, for any period, Net Cash Flows From Operating Activities for such period plus Interest Expense for such period minus the portion (but not less than zero) of Net Cash Flows From Operating Activities for such period attributable to any consolidated Subsidiary that has no Debt other than Nonrecourse Indebtedness.

"Affiliate" means, as to any Person, any other Person that, directly or indirectly, controls, is controlled by or is under common control with such Person or is a director or officer of such Person.

“Agreement” means this Loan Agreement, and any riders, extensions, supplements, amendments or modifications to this Loan Agreement.

“Anti-Corruption Laws” means all laws, rules, and regulations of any jurisdiction applicable to Borrower or its Subsidiaries or Affiliates from time to time concerning or relating to bribery or corruption.

“Borrower” shall have the meaning set forth in the Preamble and shall extend to all Eligible Successors thereof.

“Borrowing Request” – see Section 2.01(b).

“Business Day” means a day on which banks are not required or authorized to close in Philadelphia, Pennsylvania, Chicago, Illinois or New York, New York.

“Closing Date” means the date on which any portion of the principal amount of the Loan is first advanced to Borrower following the satisfaction of all conditions precedent set forth in Section 3.01.

“Code” means the Internal Revenue Code of 1986, as amended or supplemented from time to time, and any successor statute of similar import.

“ComEd” means Commonwealth Edison Company, an Illinois corporation, or any successor thereof.

“ComEd Entity” means ComEd and each of its Subsidiaries.

“Commitment” means the Lender’s commitment to make advances of the Loan hereunder.

“Commitment Amount” means \$50,000,000.

“Commitment Letter” means the Commitment Letter dated as of June 29, 2017 between Borrower and Lender with respect to the Loan.

“Controlled Group” means all members of a controlled group of corporations and all trades or businesses (whether or not incorporated) under common control that, together with Borrower, are treated as a single employer under Section 414(b) or 414(c) of the Code.

“Debt” means (i) indebtedness for borrowed money, (ii) obligations evidenced by bonds, debentures, notes or other similar instruments, (iii) obligations to pay the deferred purchase price of property or services (other than trade payables incurred in the ordinary course of business), (iv) obligations as lessee under leases that shall have been or are required to be, in accordance with GAAP, recorded as capital leases, (v) obligations (contingent or otherwise) under reimbursement or similar agreements with respect to the issuance of letters of credit (other than obligations in respect of documentary letters of credit opened to provide for the payment of goods or services purchased in the ordinary course of business) and (vi) obligations under direct or indirect guaranties in respect of, and obligations (contingent or otherwise) to purchase or

otherwise acquire, or otherwise to assure a creditor against loss in respect of, indebtedness or obligations of others of the kinds referred to in clauses (i) through (v) above.

“Economic Impact Study” shall mean the report dated July 21, 2017, prepared by Econsult Solutions, Inc., a copy of which is attached hereto as Exhibit A.

“Eligible Successor” means a Person that (i) is a corporation, limited liability company or business trust duly incorporated or organized, validly existing and in good standing under the laws of one of the states of the United States or the District of Columbia, (ii) as a result of a contemplated acquisition, consolidation or merger, will succeed to all or substantially all of the consolidated business and assets of Borrower or Exelon, as applicable, (iii) upon giving effect to such contemplated acquisition, consolidation or merger, will have all or substantially all of its consolidated business and assets conducted and located in the United States and (iv) in the case of Borrower, is acceptable to the Lender as a credit matter.

“ERISA” means the Employee Retirement Income Security Act of 1974.

“Event of Default” -- see Section 6.01.

“Exchange Act” means the Securities Exchange Act of 1934.

“Exelon” means Exelon Corporation, a Pennsylvania corporation, or any Eligible Successor thereof.

“GAAP” -- see Section 1.03.

“I-526 Petition” means a Form I-526, Immigrant Petition by Alien Entrepreneur used by an alien investor to petition the USCIS for classification as an alien entrepreneur under Section 2.03(b)(5) of the Immigration and Nationality Act.

“I-829 Petition” means a Form I-829, Petition by Entrepreneur to Remove Conditions on Permanent Resident Status used by an alien investor who has obtained conditional permanent residence through entrepreneurship to petition the USCIS to remove the conditions on the alien investor’s permanent resident status.

“I-924 Application” means a Form I-924 Application to amend the designation of the CanAm PIDC Regional Center.

“Interest Coverage Ratio” means, for any period of four consecutive fiscal quarters of Borrower, the ratio of Adjusted Funds From Operations for such period to Net Interest Expense for such period.

“Interest Expense” means, for any period, “interest expense” as shown on a consolidated statement of operations and comprehensive income of Borrower for such period prepared in accordance with GAAP plus Interest Expense to Affiliates for such period.

“Interest Expense to Affiliates” means, for any period, “Interest Expense to Affiliates” as shown on a consolidated statement of operations and comprehensive income of Borrower for such period.

“Interest Payment Date” – see Section 2.02.

“Interest Rate” means a fixed rate equal to two percent (2.00%) per annum.

“Investors” means, collectively, the purchasers of the limited partnership units in Lender pursuant to the Program.

“Job Creation Requirement” – see Section 5.01(c)(i).

“Job Creation Period” means the period commencing on the date of the Commitment Letter and ending on the date which is two and one-half years (2½) years after the Closing Date.

“Lender” - see Preamble.

“Lender Costs” means all reasonable and documented out-of-pocket expenses incurred by Lender in connection with (a) the preparation, execution and delivery of this Agreement and the other Loan Documents, (b) the offering of limited partnership interests to the Investors and obtaining pre-approval of the Project from USCIS, (c) the preparation of the Economic Impact Study, (d) any subsequent amendments, modifications or waivers of the provisions of this Agreement requested by Borrower, and (e) enforcing or defending its rights under or in connection with this Agreement and the other Loan Documents following an Unmatured Event of Default or Event of Default hereunder.

“Lien” means any lien (statutory or other), mortgage, pledge, security interest or other charge or encumbrance, or any other type of preferential arrangement (including the interest of a vendor or lessor under any conditional sale, capitalized lease or other title retention agreement).

“Loan” means the aggregate outstanding principal amount of the advances made to Borrower pursuant to Section 2.01.

“Loan Documents” means this Agreement, the Note and any and all other agreements, instruments and documents, now or hereafter executed by Borrower or any of its Affiliates and delivered to Lender in connection with the Loan.

“Mandatory Prepayment Date” means the date which is 90 days after the date on which Lender provides written notice to Borrower that a Project Denial has occurred.

“Material Adverse Change” and **“Material Adverse Effect”** each means, relative to any occurrence, fact or circumstances of whatsoever nature (including any determination in any litigation, arbitration or governmental investigation or proceeding), (i) any materially adverse change in, or materially adverse effect on, the financial condition, operations, assets or business of Borrower and its consolidated Subsidiaries, taken as a whole, provided that, except as otherwise expressly provided herein, the assertion against Borrower or any Subsidiary of liability for any obligation arising under ERISA for which Borrower or such Subsidiary bore joint and

several liability with any ComEd Entity, or the payment by Borrower or any Subsidiary of any such obligation, shall not be considered in determining whether a Material Adverse Change or Material Adverse Effect has occurred; or (ii) any materially adverse effect on the validity or enforceability against Borrower of this Agreement or (iii) any materially adverse effect on the ability of Borrower and its Subsidiaries to complete the Project.

“Maturity Date” means the date which is five (5) years after the Closing Date.

“Multiemployer Plan” means a Plan maintained pursuant to a collective bargaining agreement or any other arrangement to which Exelon or any other member of the Controlled Group is a party to which more than one employer is obligated to make contributions.

“Net Cash Flows From Operating Activities” means, for any period, “Net Cash Flows provided by Operating Activities” as shown on a consolidated statement of cash flows of Borrower for such period prepared in accordance with GAAP, excluding any “Changes in assets and liabilities” (as shown on such statement of cash flows) taken into account in determining such Net Cash Flows provided by Operating Activities.

“Net Interest Expense” means, for any period, the total of (a) Interest Expense for such period minus (b) Interest Expense to Affiliates for such period to the extent included in the amount referred to in clause (a) and related to (i) interest payments on debt obligations that are subordinated to the obligations of Borrower under this Agreement or (ii) interest on Nonrecourse Indebtedness.

“Nonrecourse Indebtedness” means any Debt that finances the acquisition, development, ownership or operation of an asset in respect of which the Person to which such Debt is owed has no recourse whatsoever to Borrower or any of its Affiliates other than:

(i) recourse to the named obligor with respect to such Debt (the “Debtor”) for amounts limited to the cash flow or net cash flow (other than historic cash flow) from the asset;

(ii) recourse to the Debtor for the purpose only of enabling amounts to be claimed in respect of such Debt in an enforcement of any security interest or lien given by the Debtor over the asset or the income, cash flow or other proceeds deriving from the asset (or given by any shareholder or the like in the Debtor over its shares or like interest in the capital of the Debtor) to secure the Debt, but only if the extent of the recourse to the Debtor is limited solely to the amount of any recoveries made on any such enforcement; and

(iii) recourse to the Debtor generally or indirectly to any Affiliate of the Debtor, under any form of assurance, undertaking or support, which recourse is limited to a claim for damages (other than liquidated damages and damages required to be calculated in a specified way) for a breach of an obligation (other than a payment obligation or an obligation to comply or to procure compliance by another with any financial ratios or other tests of financial condition) by the Person against which such recourse is available.

“Note” means the Promissory Note dated the Closing Date made by Borrower in favor of Lender in substantially the form attached hereto as **Exhibit B**.

“Obligations” means and includes all loans, advances, debts, liabilities, obligations (including interest accruing during the pendency of any bankruptcy, insolvency, receivership or other similar proceeding, regardless of whether allowed or allowable in such proceeding), guaranties, covenants and duties owing by Borrower to Lender which arise under, out of, or in connection with, this Agreement or any other Loan Document.

“Origination Fee” – see Section 2.02(b).

“PBGC” means the Pension Benefit Guaranty Corporation and any entity succeeding to any or all of its functions under ERISA.

“PECO Mortgage” means the First and Refunding Mortgage, dated as of May 1, 1923, between Borrower (as successor to The Counties Gas & Electric Company) and Wachovia Bank, National Association (as successor Trustee).

“Permitted Encumbrance” means (a) any right reserved to or vested in any municipality or other governmental or public authority (i) by the terms of any right, power, franchise, grant (including, without limitation, any financial assistance grant), license or permit granted or issued to Borrower or (ii) to purchase or recapture or to designate a purchaser of any property of Borrower; (b) any easement, restriction, exception or reservation in any property and/or right of way of Borrower for the purposes of roads, pipelines, transmission lines, distribution lines, transportation lines or removal of minerals or timber or for other like purposes or for the joint or common use of real property, rights of way, facilities and/or equipment, and defects, irregularities and deficiencies in title of any property and/or rights of way, which, in each case described in this clause (b), whether considered individually or collectively with all other items described in this clause (b), do not materially impair the use of the relevant property and/or rights of way for the purposes for which such property and/or rights of way are held by Borrower; (c) rights reserved to or vested in any municipality or other governmental or public authority to control or regulate any property of Borrower or to use such property in a manner that does not materially impair the use of such property for the purposes for which it is held by Borrower; and (d) obligations or duties of Borrower to any municipality or other governmental or public authority that arise out of any franchise, grant, license or permit and that affect any property of Borrower (including, without limitation, obligations with respect to nuclear waste disposal and related arrangements).

“Person” means an individual, partnership, corporation (including a business trust), joint stock company, trust, unincorporated association, joint venture, limited liability company or other entity, or a government or any political subdivision or agency thereof.

“Plan” means an employee pension benefit plan that is covered by Title IV of ERISA or subject to the minimum funding standards under Section 412 of the Code as to which Borrower or any other member of the Controlled Group may have any liability.

“Principal Subsidiary” means (a) each Utility Subsidiary and (b) each other Subsidiary (i) the consolidated assets of which, as of the date of any determination thereof, constitute at least 10% of the consolidated assets of Borrower or (ii) the consolidated earnings before taxes of

which constitute at least 10% of the consolidated earnings before taxes of Borrower for the most recently completed fiscal year.

“Program” – see Paragraph A of the Recitals.

“Project” – see Paragraph C of the Recitals.

“Project Denial” means (i) a written decision issued by the USCIS denying the I-924 Application for the Project for failure to establish eligibility of the Project under the Program or (ii) there shall occur legislative or regulatory changes to the Program which, in the good faith reasonable judgment of Lender (A) if the I-924 Application for the Project was subsequently adjudicated by the USCIS, such I-924 Application would reasonably be expected to be ultimately denied or (B) if the I-526 Petitions for the Investors were subsequently adjudicated, all such I-526 Petitions would reasonably be expected to be denied, in each case solely as a result of such legislative or regulatory changes.

“Qualifying Expenditures” means any expenditures spent as part of the Project during the Job Creation Period that are either expressly contemplated in the Economic Impact Study or otherwise announced by the USCIS to constitute eligible inputs into an accepted economic model or methodology.

“Reportable Event” means a reportable event as defined in Section 4043 of ERISA and regulations issued under such section with respect to a Plan, excluding such events as to which the PBGC by regulation waived the requirement of Section 4043(a) of ERISA that it be notified within 30 days of the occurrence of such event, provided that a failure to meet the minimum funding standard of Section 412 of the Code and Section 302 of ERISA shall be a Reportable Event regardless of the issuance of any such waivers in accordance with either Section 4043(a) of ERISA or Section 412(d) of the Code.

“Sanctions” means economic or financial sanctions or trade embargoes imposed, administered or enforced from time to time by the U.S. government, including those administered by the Office of Foreign Assets Control of the U.S. Department of the Treasury or the U.S. Department of State.

“Sanctioned Country” means, at any time, a country, region or territory which is the subject or target of any Sanctions.

“Sanctioned Person” means, at any time, (a) any Person listed in any Sanctions-related list of designated Persons maintained by the Office of Foreign Assets Control of the U.S. Department of the Treasury, or by the U.S. Department of State, (b) any Person operating, organized or resident in a Sanctioned Country or (c) any Person owned or controlled by any such Person.

“Shortfall Qualifying Amount” – see Section 5.01(c)(iii).

“Single Employer Plan” means a Plan other than a Multiemployer Plan maintained by Borrower or any other member of the Controlled Group for employees of Borrower or any other member of the Controlled Group.

“Subsidiary” means, with respect to any Person, any corporation or unincorporated entity of which more than 50% of the outstanding capital stock (or comparable interest) having ordinary voting power (irrespective of whether or not at the time capital stock, or comparable interests, of any other class or classes of such corporation or entity shall or might have voting power upon the occurrence of any contingency) is at the time directly or indirectly owned by such Person (whether directly or through one or more other Subsidiaries). Unless otherwise indicated, each reference to a “Subsidiary” means a Subsidiary of Borrower.

“Unmatured Event of Default” means any event which (if it continues uncured) will, with lapse of time or notice or both, become an Event of Default.

“USCIS” – see Paragraph A of the Recitals.

“Utility Subsidiary” means each Subsidiary that is engaged principally in the transmission or distribution of electricity or gas and is subject to rate regulation as a public utility by federal or state regulatory authorities.

SECTION 1.02 Other Interpretive Provisions. In this Agreement, (a) in the computation of periods of time from a specified date to a later specified date, the word “from” means “from and including” and the words “to” and “until” each means “to but excluding”; (b) the term “including” means “including without limitation”; and (c) unless otherwise indicated, (i) any reference to an Article, Section, Exhibit or Schedule means an Article or Section hereof or an Exhibit or Schedule hereto; (ii) any reference to a time of day means such time in Chicago, Illinois; (iii) any reference to a law or regulation means such law or regulation as amended, modified or supplemented from time to time and includes all statutory and regulatory provisions consolidating, replacing or interpreting such law or regulation; and (d) any reference to an agreement, instrument or other document means such agreement, instrument or other document as amended, supplemented or otherwise modified from time to time.

SECTION 1.03 Accounting Principles.

(a) As used in this Agreement, “GAAP” means generally accepted accounting principles in the United States, applied on a basis consistent with the principles used in preparing Borrower’s audited consolidated financial statements as of December 31, 2017 and for the fiscal year then ended, as such principles may be revised as a result of changes in GAAP implemented by Borrower subsequent to such date. In this Agreement, except to the extent, if any, otherwise provided herein, all accounting and financial terms shall have the meanings ascribed to such terms by GAAP, and all computations and determinations as to accounting and financial matters shall be made in accordance with GAAP. In the event that the financial statements generally prepared by Borrower reflect a change in GAAP that affects the computation of any financial ratio or requirement set forth herein (as contemplated by Section 1.03(b)), the compliance certificate delivered pursuant to Section 5.01(b)(iv) accompanying such financial statements shall include information in reasonable detail reconciling such financial statements, which reflect such change in GAAP to financial information that does not reflect such change to the extent relevant to the calculations set forth in such compliance certificate.

(b) If at any time any change in GAAP would affect the computation of any financial ratio or requirement set forth herein and Borrower or Lender shall so request, Lender and Borrower shall negotiate in good faith to amend such ratio or requirement to preserve the original intent thereof in light of such change in GAAP; provided that, until so amended, such ratio or requirement shall continue to be computed in accordance with GAAP prior to such change therein.

(c) For purposes of any calculation or determination which is to be made on a consolidated basis (including compliance with Section 5.02(c)), such calculation or determination shall exclude any assets, liabilities, revenues and expenses that are included in Borrower's financial statements from "variable interest entities" as a result of the application of FASB Accounting Standards Codification 810, Consolidations.

ARTICLE II

AMOUNT AND TERMS OF THE COMMITMENT AND LOAN

SECTION 2.01 Commitment; Loan. In accordance with the terms of this Section 2 and subject to the conditions precedent set forth in Section 9, Lender hereby agrees as follows:

(a) Commitment. Lender hereby agrees to make one or more advances to Borrower in an aggregate amount not to exceed the Commitment Amount.

(b) Borrowing Requests. The Loan shall be made to Borrower in one or more advances promptly upon request by Borrower (but no more frequently than monthly), and in any event within two (2) Business Days after receipt by Lender of a borrowing request substantially in the form attached hereto as Exhibit C ("Borrowing Request") together with reasonable evidence of Qualifying Expenditures made, or a plan for Qualifying Expenditures to be made or reimbursed within the 3-month period immediately following the date of such request (the "Expenditure Period") in an amount sufficient to support each such advance of the Loan. Within 45 days following the end of each month to occur during an Expenditure Period, Borrower shall provide Lender with a report of all Qualifying Expenditures incurred and paid for with Loan proceeds during such month. Borrower will use commercially reasonable efforts to fully request hereunder all available advances of the Loan in an aggregate amount equal to the Commitment Amount prior to the date which is two (2) years following the Closing Date.

(c) Evidence of Debt. Borrower shall execute and deliver the Note to evidence Borrower's obligation to repay Lender for the Loan, with interest as set forth herein. The Note evidencing repayment of the Loan is incorporated herein by reference and made part hereof.

(d) Use of Proceeds. An amount equal to the proceeds of each advance under the Loan shall be used by Borrower to fund and/or reimburse amounts previously spent for Qualifying Expenditures (including such Qualifying Expenditures spent from and after the date of the Commitment Letter).

SECTION 2.02 Interest; Origination Fee.

(a) Except as set forth in Section 2.04, the principal balance of the Loan shall bear interest at the Interest Rate. Such interest is due and payable semi-annually in arrears to Lender on the first day of January and July of every year (each a "Interest Payment Date") until the Loan has been paid in full; provided, that if such day is not a Business Day, the Interest Payment Date shall be the following Business Day. Interest shall accrue on any advanced and unpaid principal amount of the Loan based upon the actual date such portion of the principal amount of the Loan was advanced. All interest hereunder shall be calculated on the basis of a 360-day year of twelve 30-day months.

(b) Borrower agrees to pay Lender on or before the Closing Date, a fee equal to 1.15% of the Commitment Amount (the "Origination Fee"), which Origination Fee shall be paid from sources other than the proceeds of the Loan. Lender may direct Borrower to pay a portion of the Origination Fee directly to PIDC.

SECTION 2.03 Payments and Prepayments.

(a) Unless sooner prepaid following the occurrence and continuation of an Event of Default and subject to subsection (b) below, Borrower shall pay to Lender amounts due and owing in respect of the Loan as follows on the following payment dates: (i) on the Maturity Date, the principal balance of the Loan and all interest thereon and other Obligations then outstanding, (ii) on the date any repayment is due pursuant to Section 2.06, an amount equal to such required repayment amount and (iii) on the date any Shortfall Qualifying Amount is due pursuant to Section 5.01(c), an amount equal to such Shortfall Qualifying Amount plus any accrued and unpaid interest on the Shortfall Qualifying Amount then outstanding, all as set forth in Section 5.01(c). In addition, in the event of a Project Denial, Borrower shall be obligated to repay to Lender the outstanding principal balance of the Loan and all interest thereof on or before the Mandatory Prepayment Date.

(b) Except as described in subsection (a) above, the principal amount of the Loan is not repayable before the earlier of (i) the fourth anniversary of the Closing Date and (ii) the date on which all of the Investors have received USCIS approval of their respective I-829 Petitions (the period between the Closing Date and the earlier of the dates described in clauses (i) and (ii) above is referred to as the "Lockout Period"). Any prepayment of the Loan which occurs after the end of the Lockout Period and prior to the Maturity Date (the "Yield Maintenance Period") shall be subject to a yield maintenance payment equal to interest accrued to the date of such prepayment plus the greater of (i) 100% of the principal amount of the Loan being prepaid and (ii) the sum of the present values of the remaining scheduled payments of principal and interest thereon (exclusive of interest accrued to the date of prepayment) discounted to such prepayment date on a semi-annual basis (assuming a 360-day year consisting of twelve 30-day months) at a discount rate equal to 10 basis points above the then current "Treasury Rate" (as defined below). For purposes of the foregoing, "Treasury Rate" means, as if the date of any prepayment of principal of the Loan, the rate per annum equal to the semi-annual equivalent yield to maturity or interpolated (on a day count basis) of the comparable treasury issue.

SECTION 2.04 Default Interest. If an Event of Default shall occur and be continuing, the unpaid principal amount of the Loan will bear interest at a rate per annum equal to 2.00% per annum in excess of the Interest Rate.

SECTION 2.05 Statement of Obligations. Upon Borrower's request, Lender shall from time to time deliver to Borrower a statement of the Obligations of Borrower to Lender, including aggregate outstanding principal, interest and Lender Costs owing, and such statement shall be conclusively presumed to be correct and accurate and constitute an account stated between Borrower and Lender, absent manifest error, unless Borrower shall deliver to Lender written objection thereto specifying the error or errors, if any, contained in such statement.

SECTION 2.06 Repayment for Failed Investors. Notwithstanding anything to the contrary contained herein, Borrower acknowledges that Lender has advised Borrower that Lender is issuing limited partnership units to Investors pursuant to the Program and that the proceeds from the subscriptions for such units are being utilized by Lender to fund the Loan. If all or any portion of the Loan is advanced to Borrower and one or more Investors whose subscription funded the advances under the Loan has his or her I-526 Petition denied or is otherwise denied a conditional U.S. Visa pursuant to the Program (each a "Failed Investor"), then Lender shall provide written notice thereof to Borrower and, thereafter, Lender will use its reasonable efforts to seek for a period of up to 60 days to substitute a replacement Investor (each a "Replacement Investor") for each such Failed Investor. If the Lender is able to find a Replacement Investor for a Failed Investor, in order to comply with applicable guidelines under the Program, Borrower agrees that it will repay to the Lender an amount equal to \$500,000 for such Failed Investor and Lender agrees to immediately re-advance such amount to Borrower out of the amounts received from the Replacement Investor(s), provided, that no such replacement shall occur if an Investor becomes a Failed Investor after the Project has been completed and the Job Creation Requirement has been satisfied. If, however, Lender is unable to find a Replacement Investor for a Failed Investor during the applicable 60-day period, then Lender shall so notify Borrower in writing and Borrower shall, within thirty (30) days following receipt of such written notice, repay to Lender an amount equal to \$500,000 for each such Failed Investor.

SECTION 2.07 Term of Agreement. This Agreement shall remain in effect until all of the Obligations of Borrower hereunder (other than unasserted contingent Obligations) have been paid and performed in full. Notwithstanding the foregoing, the obligations set forth in Section 7.04 hereof shall expressly survive the repayment of the Obligations

ARTICLE III

CONDITIONS PRECEDENT

SECTION 3.01 Conditions Precedent to Initial Advance. The obligation of Lender to make the initial advance of the Loan on the Closing Date shall not become effective until the date on which each of the following conditions is satisfied or waived by Lender:

- (a) Lender shall have received each of the agreements, documents and instruments:
 - (i) the duly executed Note;
 - (ii) an opinion of counsel to Borrower in form and substance reasonably acceptable to Lender;

(iii) certified copies of resolutions of the Board of Directors or equivalent managing body of Borrower approving the transactions contemplated by this Agreement and of all other Loan Documents evidencing other necessary organizational action of Borrower with respect to this Agreement and the other Loan Documents;

(iv) a certificate of the Secretary or an Assistant Secretary of Borrower certifying (A) the names and true signatures of the officers of Borrower authorized to sign this Agreement and the other documents to be delivered hereunder; (B) that attached thereto are true and correct copies of the organizational documents of Borrower, in each case in effect on such date; and (C) that attached thereto are true and correct copies of all governmental and regulatory authorizations and approvals required for the due execution, delivery and performance by Borrower of this Agreement and the other Loan Documents;

(v) a certificate signed by any of the chief financial officer, principal accounting officer or treasurer of Borrower stating that (A) the representations and warranties contained in Section 4.01 are correct on and as of the date of such certificate as though made on and as of such date and (B) no Event of Default or Unmatured Event of Default has occurred and is continuing on the date of such certificate;

(vi) good standing certificate for Borrower evidencing its good standing in Pennsylvania; and

(vii) such other documents, agreements and instruments as Lender may have reasonably requested.

(b) Borrower shall have effected payment in full of the Origination Fee.

SECTION 3.02 Conditions Precedent to Each Advance. The obligation of Lender to make any advance of the Loan shall be subject to the satisfaction of the following conditions: (a) Lender shall have received a duly completed Borrowing Request for such advance, (b) the amount of the requested advance is available to Lender from Investors and (c) on the date of such advance the following statements shall be true (it being agreed that the request by Borrower for such advance shall constitute a representation and warranty thereof):

(i) the representations and warranties of Borrower contained in Section 4.01 (excluding the representations and warranties set forth in Section 4.01(e)(ii) and the first sentence of Section 4.01(f)) are correct on and as of the date of such advance, before and after giving effect to such advance and the application of the proceeds therefrom, as though made on and as of such date;

(ii) no event has occurred and is continuing, or would result from such advance or from the application of the proceeds therefrom, that constitutes an Event of Default or Unmatured Event of Default with respect to Borrower; and

(iii) no event has occurred and is continuing which is reasonably likely to have a Material Adverse Effect on the ability of Borrower to complete the Project in all material respects in accordance with the business plan presented to Lender.

ARTICLE IV

REPRESENTATIONS AND WARRANTIES

SECTION 4.01 Representations and Warranties of Borrower. Borrower represents and warrants as follows:

(a) Borrower is a corporation duly organized, validly existing and in good standing under the laws of the Commonwealth of Pennsylvania.

(b) The execution, delivery and performance by Borrower of this Agreement and the other Loan Documents are within Borrower's corporate powers, have been duly authorized by all necessary organizational action on the part of Borrower, and do not and will not contravene (i) the organizational documents of Borrower, (ii) applicable law or (iii) any contractual or legal restriction binding on or affecting the properties of Borrower or any Subsidiary.

(c) No authorization or approval or other action by, and no notice to or filing with, any governmental authority or regulatory body is required for the due execution, delivery and performance by Borrower of this Agreement or the other Loan Documents, except any order that has been duly obtained and is (x) in full force and effect and (y) sufficient for the purposes hereof.

(d) This Agreement and each other Loan Document is a legal, valid and binding obligation of Borrower, enforceable against Borrower in accordance with its terms, except as the enforceability thereof may be limited by equitable principles or bankruptcy, insolvency, reorganization, moratorium or similar laws affecting the enforcement of creditors' rights generally.

(e) (i) The consolidated balance sheet of Borrower and its Subsidiaries as at December 31, 2017 and the related consolidated statements of operations and comprehensive income, changes in shareholders' equity and cash flows of Borrower and its Subsidiaries for the fiscal year then ended, certified by PricewaterhouseCoopers LLP, and the unaudited consolidated balance sheet of Borrower and its Subsidiaries as of March 31, 2018, and the related unaudited statement of operations and comprehensive income for the nine-month period then ended, copies of which have been furnished to Lender, fairly present in all material respects the consolidated financial condition of Borrower and its Subsidiaries as at such dates and the consolidated results of the operations of Borrower and its Subsidiaries for the periods ended on such dates in accordance with GAAP; and (ii) since December 31, 2017, there has been no Material Adverse Change.

(f) Except as disclosed in Borrower's Annual, Quarterly or Current Reports, each as filed with the Securities and Exchange Commission and delivered to Lender prior to the later of the date of execution and delivery of this Agreement or the date of the most recent advance of the Loan hereunder, there is no pending or, to the knowledge of Borrower after due inquiry, threatened action, investigation or proceeding affecting Borrower or any Subsidiary before any court, governmental agency or arbitrator that may reasonably be anticipated to have a Material Adverse Effect. There is no pending or, to the knowledge of Borrower after due inquiry,

threatened action or proceeding against Borrower or any Subsidiary that purports to affect the legality, validity, binding effect or enforceability against Borrower of this Agreement.

(g) Borrower is not engaged in the business of extending credit for the purpose of purchasing or carrying margin stock (within the meaning of Regulation U issued by the Board of Governors of the Federal Reserve System), and no proceeds of any advance will be used to purchase or carry any margin stock or to extend credit to others for the purpose of purchasing or carrying any margin stock. Not more than 25% of the value of the assets of Borrower and its Subsidiaries is represented by margin stock.

(h) Borrower is not required to register as an “investment company” under the Investment Company Act of 1940.

(i) During the twelve consecutive month period prior to the date of the execution and delivery of this Agreement and prior to the date of any advance of the Loan, no steps have been taken to terminate any Plan (excluding any termination arising out of the institution by or against any ComEd Entity of any bankruptcy, insolvency or similar proceeding so long as such termination will not constitute an Event of Default or Unmatured Event of Default under Section 6.01(g)), and there is no “accumulated funding deficiency” (as defined in Section 412 of the Code or Section 302 of ERISA) with respect to any Plan. No condition exists or event or transaction has occurred with respect to any Plan (including any Multiemployer Plan) which might result in the incurrence by Borrower or any other member of the Controlled Group of any material liability (other than to make contributions, pay annual PBGC premiums or pay out benefits in the ordinary course of business), fine or penalty (excluding any condition, event or transaction arising out of the institution by or against any ComEd Entity of any bankruptcy, insolvency or similar proceeding so long as such condition, event or transaction does not constitute an Event of Default or Unmatured Event of Default under Section 6.01(g)).

(j) Borrower has implemented and maintains in effect policies and procedures designed to ensure compliance by Borrower, its Subsidiaries and Affiliates and their respective directors, officers, employees and agents with Anti-Corruption Laws and applicable Sanctions, and Borrower, its Subsidiaries and Affiliates and their respective officers and employees and to the knowledge of Borrower its directors and agents, are in compliance with Anti-Corruption Laws and applicable Sanctions in all material respects. None of (a) Borrower, any Subsidiary or Affiliate or any of their respective directors, officers or employees, or (b) to the knowledge of Borrower, any agent of Borrower or any Subsidiary or Affiliate that will act in any capacity in connection with or benefit from the credit facility established hereby, is a Sanctioned Person. No advance of the Loan, use of proceeds or other transaction contemplated by this Agreement will violate Anti-Corruption Laws or applicable Sanctions.

ARTICLE V

COVENANTS OF BORROWER

SECTION 5.01 Affirmative Covenants. Borrower agrees that so long as any Obligations remain unpaid or the Commitment has not been irrevocably terminated, Borrower will, and, in

the case of Section 5.01(a), will cause its Principal Subsidiaries to, unless Lender shall otherwise consent in writing:

(a) Keep Books; Existence; Maintenance of Properties; Compliance with Laws; Insurance; Taxes.

(i) keep proper books of record and account, all in accordance with generally accepted accounting principles in the United States, consistently applied;

(ii) subject to Section 5.02(b), preserve and keep in full force and effect its existence;

(iii) maintain and preserve all of its properties (except such properties the failure of which to maintain or preserve would not have, individually or in the aggregate, a Material Adverse Effect) which are used or useful in the conduct of its business in good working order and condition, ordinary wear and tear excepted;

(iv) comply in all material respects with the requirements of all applicable laws, rules, regulations and orders (including those of any governmental authority and including with respect to environmental matters) to the extent the failure to so comply, individually or in the aggregate, would have a Material Adverse Effect;

(v) maintain in effect and enforce policies and procedures designed to ensure compliance by Borrower, its Subsidiaries and Affiliates and their respective directors, officers, employees and agents with Anti-Corruption Laws and applicable Sanctions;

(vi) maintain insurance with responsible and reputable insurance companies or associations, or self-insure, as the case may be, in each case in such amounts and covering such contingencies, casualties and risks as is customarily carried by or self-insured against by companies engaged in similar businesses and owning similar properties in the same general areas in which Borrower and its Principal Subsidiaries operate;

(vii) at any reasonable time and from time to time, pursuant to prior notice delivered to Borrower, permit Lender, or any agent or representative of any thereof, to examine and, at Lender's expense, make copies of, and abstracts from the records and books of account of, and visit the properties of, Borrower and any Principal Subsidiary and to discuss the affairs, finances and accounts of Borrower and any Principal Subsidiary with any of their respective officers; provided that any non-public information (which has been identified as such by Borrower or the applicable Principal Subsidiary) obtained by Lender or any of its agents or representatives pursuant to this clause (vii) shall be treated confidentially by such Person; provided, further, that such Person may disclose such information to (x) any other party to this Agreement, its examiners, Affiliates, outside auditors, counsel or other professional advisors in connection with this Agreement or (y) if otherwise required to do so by law or regulatory process (it being understood that, unless prevented from doing so by any applicable law or governmental authority, such Person shall use reasonable efforts to notify Borrower of any demand or

request for any such information promptly upon receipt thereof so that Borrower may seek a protective order or take other appropriate action);

(viii) promptly after receipt of a reasonably detailed invoice therefor, reimburse Lender for reasonable sums expended by Lender for Lender Costs; and

(ix) pay, prior to delinquency, all of its federal income taxes and other material taxes and governmental charges, except to the extent that (a) such taxes or charges are being contested in good faith and by proper proceedings and against which adequate reserves are being maintained or (b) failure to pay such taxes or charges would not reasonably be expected to have a Material Adverse Effect.

(b) Reporting Requirements. Furnish to Lender:

(i) as soon as possible, and in any event within five Business Days after Borrower becomes aware of the existence of any Event of Default or Unmatured Event of Default with respect to Borrower continuing on the date of such statement, after due inquiry, a statement of an authorized officer of Borrower setting forth details of such Event of Default or Unmatured Event of Default and the action which Borrower proposes to take with respect thereto;

(ii) as soon as available and in any event within 60 days after the end of each of the first three quarters of each fiscal year of Borrower, a copy of Borrower's Quarterly Report on Form 10-Q filed with the Securities and Exchange Commission with respect to such quarter (or, if Borrower is not required to file a Quarterly Report on Form 10-Q, copies of an unaudited consolidated balance sheet of Borrower as of the end of such quarter and the related consolidated statement of operations and comprehensive income of Borrower for the portion of Borrower's fiscal year ending on the last day of such quarter, in each case prepared in accordance with GAAP, subject to the absence of footnotes and to year-end adjustments), together with a certificate of an authorized officer of Borrower stating that no Event of Default or Unmatured Event of Default has occurred and is continuing or, if any such Event of Default or Unmatured Event of Default has occurred and is continuing, a statement as to the nature thereof and the action which Borrower proposes to take with respect thereto;

(iii) as soon as available and in any event within 105 days after the end of each fiscal year of Borrower, a copy of Borrower's Annual Report on Form 10-K filed with the Securities and Exchange Commission with respect to such fiscal year (or, if Borrower is not required to file an Annual Report on Form 10-K, the consolidated balance sheet of Borrower and its subsidiaries as of the last day of such fiscal year and the related consolidated statements of operations and comprehensive income, changes in shareholders' equity (if applicable) and cash flows of Borrower for such fiscal year, certified by PricewaterhouseCoopers LLP or other certified public accountants of recognized national standing), together with a certificate of an authorized officer of Borrower stating that no Event of Default or Unmatured Event of Default has occurred and is continuing or, if any such Event of Default or Unmatured Event of Default has

occurred and is continuing, a statement as to the nature thereof and the action which Borrower proposes to take with respect thereto;

(iv) concurrently with the delivery of the quarterly and annual reports referred to in Sections 5.01(b)(ii) and 5.01(b)(iii), a compliance certificate in substantially the form set forth in Exhibit D, duly completed and signed by the Chief Financial Officer, Treasurer or an Assistant Treasurer of Borrower;

(v) except as otherwise provided in clause (ii) or (iii) above, promptly after the sending or filing thereof, copies of all reports that Borrower sends to any of its security holders, and copies of all Reports on Form 10-K, 10-Q or 8-K, and registration statements and prospectuses that Borrower or any Subsidiary files with the Securities and Exchange Commission or any national securities exchange (except to the extent that any such registration statement or prospectus relates solely to the issuance of securities pursuant to employee purchase, benefit or dividend reinvestment plans of Borrower or a Subsidiary);

(vi) promptly upon becoming aware of the institution of any steps by Borrower or any other Person to terminate any Plan, or the failure to make a required contribution to any Plan if such failure is sufficient to give rise to a lien under section 430(k) of the Code, or the taking of any action with respect to a Plan which could result in the requirement that Borrower furnish a bond or other security to the PBGC or such Plan, or the occurrence of any event with respect to any Plan which could result in the incurrence by Borrower or any other member of the Controlled Group of any material liability, fine or penalty, notice thereof and a statement as to the action Borrower or such member of the Controlled Group proposes to take with respect thereto; and

(vii) such other information respecting the business, operations or condition, financial or otherwise, of Borrower or any Subsidiary as Lender may from time to time reasonably request (including any information that has been requested by the USCIS).

Borrower may provide the financial statements and other information, documents and materials that it is obligated to furnish to Lender pursuant to clauses (i) through (v) of this Section 5.01(b) electronically (including by posting such documents, or providing a link thereto, on Exelon's Internet website). Notwithstanding the foregoing, Borrower agrees that, to the extent requested by Lender, it will continue to provide "hard copies" of such items to Lender.

(c) Job Creation Requirement; Shortfall Qualifying Amount.

(i) Create a minimum of ten (10) new full-time direct and/or indirect jobs for each Five Hundred Thousand Dollars (\$500,000) advanced under the Loan (the "Job Creation Requirement") during the Job Creation Period; it being understood and agreed by Lender and Borrower that a Loan having a principal balance of \$50,000,000 would require the creation of one thousand (1,000) jobs which satisfy the eligibility requirements of the Program. Borrower shall cause the proceeds of each advance under the Loan to be used for Qualifying Expenditures incurred for the Project, including to reimburse for amounts previously spent as part of the Project during the Job Creation

Period. Lender agrees that the Job Creation Requirement will be fully satisfied by (x) the funding of Qualifying Expenditures for the Project, materially as described in the Economic Impact Study and (y) the completion and operation of the Project, in accordance with Borrower's business plan for the Project which is used as the basis for the inputs into the Economic Impact Study.

(ii) Until such time as Borrower has satisfied, or caused to be satisfied, the Job Creation Requirement, Borrower will provide Lender the following information:

(A) on a quarterly basis, reports of Project status, costs incurred to date and percentage of work completed related to the Project;

(B) on a quarterly basis, the most recent (x) System 2020 Performance report (work streams report), (y) Vendor Spending report and (z) a report showing spending for the project on a geographical basis (by census tract);

(C) on an annual basis (x) a copy of the Elec Annual Asset Optimization Plan submitted to the PaPUC and (y) the LTIP Financial Report; and

(D) from time to time, any supplementary documentation reasonably requested by Lender and/or the USCIS.

(iii) If Borrower has not met the Job Creation Requirement by the end of the Job Creation Period because of the failure to spend sufficient funds for Qualifying Expenditures in accordance with the Economic Impact Study, Borrower, within thirty (30) days following notice thereof from Lender, shall repay to Lender the portion of the principal amount of the Loan that was attributable to the amount of Qualifying Expenditures that Borrower failed to incur (a "Shortfall Qualifying Amount") plus any accrued and unpaid interest on the Shortfall Qualifying Amount then outstanding.

SECTION 5.02 Negative Covenants. Borrower agrees that so long as any Obligations remain unpaid or the Commitment has not been irrevocably terminated, Borrower will not, without the written consent of Lender:

(a) Limitation on Liens. Create, incur, assume or suffer to exist any Lien on its property, revenues or assets, whether now owned or hereafter acquired, except:

(i) Liens imposed by law, such as carriers', warehousemen's and mechanics' Liens and other similar Liens arising in the ordinary course of business;

(ii) Liens on the capital stock of or any other equity interest in any Subsidiary to secure Nonrecourse Indebtedness;

(iii) Liens upon or in any property acquired in the ordinary course of business to secure the purchase price of such property or to secure any obligation incurred solely for the purpose of financing the acquisition of such property;

(iv) Liens existing on property at the time of the acquisition thereof (other than any such Lien created in contemplation of such acquisition unless permitted by the preceding clause (iii));

(v) Liens granted in connection with any financing arrangement for the financing of pollution control facilities, limited to the facilities so purchased or acquired;

(vi) Liens arising in connection with sales or transfers of, or financing secured by, accounts receivable or related contracts, provided that any such sale, transfer or financing shall be on arms' length terms;

(vii) Permitted Encumbrances;

(viii) Liens created under the PECO Mortgage and "excepted encumbrances" as defined in the PECO Mortgage as in effect on the date hereof;

(ix) Liens securing Borrower's notes collateralized solely by mortgage bonds of Borrower issued under the terms of the PECO Mortgage;

(x) Liens arising in connection with sale and leaseback transactions, but only to the extent that (A) except as permitted by the following clause (B), the proceeds received from such sale are immediately applied to retire mortgage bonds of Borrower issued under the terms of the PECO Mortgage and (B) the aggregate purchase price of all assets sold by Borrower during the term of this Agreement pursuant to sale and leaseback transactions where such proceeds are not applied as provided in clause (A) does not exceed \$1,000,000,000; and

(xi) Liens, other than those described in clauses (i) through (x) of this Section 5.02(a), granted by Borrower in the ordinary course of business securing Debt; provided that the aggregate amount of all Debt secured by Liens permitted by this clause (xi) shall not exceed in the aggregate at any one time outstanding \$50,000,000.

(b) Mergers and Consolidations; Disposition of Assets. Merge with or into or consolidate with or into, or sell, assign, lease or otherwise dispose of (whether in one transaction or in a series of transactions) all or substantially all of its assets (whether now owned or hereafter acquired) to any Person or permit any Principal Subsidiary to do so, except that (i) any Principal Subsidiary may merge with or into or consolidate with or transfer assets to any other Principal Subsidiary, (ii) any Principal Subsidiary may merge with or into or consolidate with or transfer assets to Borrower, and (iii) Borrower or any Principal Subsidiary may merge with or into or consolidate with or transfer assets to any other Person, provided that, in each case, immediately before and after giving effect thereto, no Event of Default or Unmatured Event of Default shall have occurred and be continuing and (A) in the case of any such merger, consolidation or transfer of assets to which Borrower is a party, either (x) Borrower shall be the surviving entity or (y) the surviving entity shall be an Eligible Successor and shall have assumed all of the obligations of Borrower under this Agreement pursuant to a written instrument in form and substance satisfactory to Lender and Lender shall have received an opinion of counsel in form and substance satisfactory to it as to the enforceability of such obligations assumed and (B)

subject to clause (A) above, in the case of any such merger, consolidation or transfer of assets to which any Principal Subsidiary is a party, a Principal Subsidiary shall be the surviving entity.

(c) Interest Coverage Ratio. Permit the Interest Coverage Ratio as of the last day of any fiscal quarter to be less than 2.00 to 1.00.

(d) Continuation of Businesses. Engage, or permit any Subsidiary to engage, in any line of business which is material to Borrower and its Subsidiaries, taken as a whole, other than businesses engaged in by Borrower and its Subsidiaries as of the date hereof and reasonable extensions thereof.

(e) Use of Proceeds. Borrower will not request any advance of the Loan, and Borrower shall not use, and shall procure that its Subsidiaries and Affiliates and their respective directors, officers, employees and agents shall not use, the proceeds of any advance of the Loan (A) in furtherance of an offer, payment, promise to pay, or authorization of the payment or giving of money, or anything else of value, to any Person in violation of any Anti-Corruption Laws, (B) for the purpose of funding, financing or facilitating any activities, business or transaction of or with any Sanctioned Person, or in any Sanctioned Country, or (C) in any manner that would result in the violation of any Sanctions applicable to any party hereto.

(f) Changes to Spending Plans for Project. Make any material change to the spending plans for the Project which, based on the methodology used in the Economic Impact Study, would reduce the number of jobs created by the Project to a level which may impact the ability of any Investor to obtain approval of such Investor's I-829 Petition.

ARTICLE VI

EVENTS OF DEFAULT

SECTION 6.01 Events of Default. If any of the following events shall occur and be continuing (any such event an "Event of Default"):

(a) Borrower shall fail to pay (i) any principal of the Loan when the same becomes due and payable or (ii) any interest on the Loan or any other amount payable by Borrower hereunder within three Business Days after the same becomes due and payable; or

(b) Any representation or warranty made by Borrower herein or by Borrower (or any of its officers) pursuant to the terms of this Agreement shall prove to have been incorrect or misleading in any material respect when made; or

(c) Borrower shall fail to perform or observe (i) any term, covenant or agreement contained in Section 5.01(b)(i) or Section 5.02 or (ii) any other term, covenant or agreement contained in this Agreement on its part to be performed or observed if the failure to perform or observe such other term, covenant or agreement shall remain unremedied for 30 days after written notice thereof shall have been given to Borrower by Lender; or

(d) Borrower or any Principal Subsidiary shall fail to pay any principal of or premium or interest on any Debt that is outstanding in a principal amount in excess of \$50,000,000 in the aggregate (but excluding Debt hereunder and Nonrecourse Indebtedness) when the same becomes due and payable (whether by scheduled maturity, required prepayment, acceleration, demand or otherwise), and such failure shall continue after the applicable grace period, if any, specified in the agreement or instrument relating to such Debt; or any other event shall occur or condition shall exist under any agreement or instrument relating to any such Debt and shall continue after the applicable grace period, if any, specified in such agreement or instrument, if the effect of such event or condition is to accelerate, or to permit the acceleration of, the maturity of such Debt; or any such Debt shall be declared to be due and payable, or required to be prepaid (other than by a regularly scheduled required prepayment), prior to the stated maturity thereof, other than any acceleration of any Debt secured by equipment leases or fuel leases of Borrower or a Principal Subsidiary as a result of the occurrence of any event requiring a prepayment (whether or not characterized as such) thereunder, which prepayment will not result in a Material Adverse Change; or

(e) Borrower or any Principal Subsidiary shall generally not pay its debts as such debts become due, or shall admit in writing its inability to pay its debts generally, or shall make a general assignment for the benefit of creditors; or any proceeding shall be instituted by or against Borrower or any Principal Subsidiary seeking to adjudicate it as bankrupt or insolvent, or seeking liquidation, winding up, reorganization, arrangement, adjustment, protection, relief, or composition of it or its debts under any law relating to bankruptcy, insolvency or reorganization or relief of debtors, or seeking the entry of an order for relief or the appointment of a receiver, trustee, custodian or other similar official for it or for any substantial part of its property and, in the case of any such proceeding instituted against it (but not instituted by it), either such proceeding shall remain undismissed or unstayed for a period of 60 days, or any of the actions sought in such proceeding (including the entry of an order for relief against, or the appointment of a receiver, trustee, custodian or other similar official for, it or for any substantial part of its property,) shall occur; or Borrower or any Principal Subsidiary shall take any action to authorize or to consent to any of the actions set forth above in this Section 6.01(e); or

(f) One or more judgments or orders for the payment of money in an aggregate amount exceeding \$50,000,000 (excluding any such judgments or orders which are fully covered by insurance, subject to any customary deductible, and under which the applicable insurance carrier has acknowledged such full coverage in writing) shall be rendered against Borrower or any Principal Subsidiary and either (i) enforcement proceedings shall have been commenced by any creditor upon such judgment or order or (ii) there shall be any period of 30 consecutive days during which a stay of enforcement of such judgment or order, by reason of a pending appeal or otherwise, shall not be in effect; or

(g) (i) Any Reportable Event that Lender determines in good faith is reasonably likely to result in the termination of any Single Employer Plan or in the appointment by the appropriate United States District Court of a trustee to administer a Single Employer Plan shall have occurred and be continuing 60 days after written notice to such effect shall have been given to Borrower by Lender; (ii) any Single Employer Plan shall be terminated; (iii) a trustee shall be appointed by an appropriate United States District Court to administer any Single Employer Plan; (iv) the PBGC shall institute proceedings to terminate any Single Employer Plan or to

appoint a trustee to administer any Single Employer Plan; or (v) Borrower or any other member of the Controlled Group withdraws from any Multiemployer Plan; provided that on the date of any event described in clauses (i) through (v) above, the Unfunded Liabilities of the applicable Plan exceed \$50,000,000; and provided, further, that no event described in this Section 6.01(g) that arises out of the institution by or against any ComEd Entity of any bankruptcy, insolvency or similar proceeding shall constitute an Event of Default unless 15 days shall have elapsed after Lender has reasonably determined, and notified Borrower in writing, that such event has had or is reasonably likely to have a Material Adverse Effect (disregarding, solely for purposes of this Section 6.01(g), the proviso to clause (i) of the definition of Material Adverse Effect);

then, and in any such event, Lender may, by notice to Borrower, (i) declare the Commitment to be terminated, whereupon the same shall forthwith terminate, and/or (ii) declare the outstanding principal amount of the Loan, all interest thereon and all other amounts payable under this Agreement by Borrower to be forthwith due and payable, whereupon the outstanding principal amount of the Loan, all such interest and all such other amounts shall become and be forthwith due and payable, without presentment, demand, protest or further notice of any kind, all of which are hereby expressly waived by Borrower; provided that in the event of an Event of Default under Section 6.01(e), (A) the obligation of Lender to make any advance of the Loan to Borrower shall automatically be terminated and (B) the outstanding principal amount of the Loan, all interest thereon and all other amounts payable by Borrower hereunder shall automatically and immediately become due and payable, without presentment, demand, protest or any notice of any kind, all of which are hereby expressly waived by Borrower.

ARTICLE VII

MISCELLANEOUS

SECTION 7.01 Amendments, Etc. No amendment or waiver of any provision of this Agreement, nor consent to any departure by Borrower therefrom, shall in any event be effective unless the same shall be in writing and signed by Lender and, in the case of an amendment, Borrower, and then such waiver or consent shall be effective only in the specific instance and for the specific purpose for which given.

SECTION 7.02 Notices, Etc. All notices and other communications provided for hereunder shall be in writing (including facsimile transmission) and mailed, sent by facsimile or delivered, if to Borrower, at 10 S. Dearborn, 52nd Floor, Chicago, IL 60603, Attention: Treasurer, facsimile: (312) 394-8867; and if to Lender, c/o CanAm Enterprises, LLC at its address at 88 Pine St., Wall Street Plaza, Suite 2010, New York, NY 10005, Attention: Tom Rosenfeld, facsimile: (212) 668-0693 or, as to each party, at such other address as shall be designated by such party in a written notice to the other parties. All such notices and communications shall be effective (a) if mailed, three Business Days after being deposited in the U.S. mail, postage prepaid, (b) if sent by facsimile, when the sender receives electronic confirmation of receipt, and (c) otherwise, when delivered.

SECTION 7.03 No Waiver; Remedies. No failure on the part of Lender to exercise, and no delay in exercising, any right hereunder shall operate as a waiver thereof; nor shall any single or partial exercise of any such right preclude any other or further exercise thereof or the exercise

of any other right. The remedies herein provided are cumulative and not exclusive of any remedies provided by law.

SECTION 7.04 Costs and Expenses; Indemnification.

(a) Borrower agrees to pay on demand all costs and expenses incurred by Lender in connection with the preparation, execution, delivery, administration, syndication, modification and amendment of this Agreement and the other documents to be delivered hereunder, including the reasonable fees, internal charges and out-of-pocket expenses of counsel (including in-house counsel) for Lender with respect thereto and with respect to advising Lender as to its respective rights and responsibilities under this Agreement. Borrower further agrees to pay on demand all costs and expenses, if any (including counsel fees and expenses of outside counsel and of internal counsel), incurred by Lender in connection with the collection and enforcement (whether through negotiations, legal proceedings or otherwise) of Borrower's obligations under this Agreement and the other documents to be delivered by Borrower hereunder, including reasonable counsel fees and expenses in connection with the enforcement of rights under this Section 7.04(a).

(b) Borrower agrees to indemnify and hold Lender and each of its Affiliates, officers, directors and employees (each, an "Indemnified Person") harmless from and against any claim, damage, loss, liability, cost or expense (including reasonable attorney's fees and expenses, whether or not such Indemnified Person is named as a party to any proceeding or is otherwise subjected to judicial or legal process arising from any such proceeding) that any of them may pay or incur arising out of or relating to this Agreement or the transactions contemplated hereby, or the use by Borrower or any Subsidiary of the proceeds of any advance of the Loan; provided that Borrower shall not be liable for any portion of any such claim, damage, loss, liability, cost or expense resulting from such Indemnified Person's gross negligence or willful misconduct. Borrower's obligations under this Section 7.04(b) shall survive the repayment of all amounts owing by Borrower to Lender under this Agreement and the termination of the Commitment. If and to the extent that the obligations of Borrower under this Section 7.04(b) are unenforceable for any reason, Borrower agrees to make the maximum contribution to the payment and satisfaction thereof which is permissible under applicable law.

SECTION 7.05 Binding Effect. This Agreement shall be binding upon and inure to the benefit of Borrower and Lender and their respective successors and assigns, provided that (except as permitted by Section 5.02(b)(iii)) Borrower shall not have the right to assign rights hereunder or any interest herein without the prior written consent of Lender.

SECTION 7.06 Governing Law. **THIS AGREEMENT SHALL BE GOVERNED BY, AND CONSTRUED IN ACCORDANCE WITH, THE LAWS OF THE COMMONWEALTH OF PENNSYLVANIA.**

SECTION 7.07 Consent to Jurisdiction; Certain Waivers. **(a) BORROWER HEREBY IRREVOCABLY SUBMITS TO THE NON-EXCLUSIVE JURISDICTION OF THE COURTS OF THE COMMONWEALTH OF PENNSYLVANIA AND ANY UNITED STATES DISTRICT COURT SITTING IN THE COMMONWEALTH OF PENNSYLVANIA IN ANY ACTION OR PROCEEDING ARISING OUT OF OR**

RELATING TO THIS AGREEMENT AND BORROWER HEREBY IRREVOCABLY AGREES THAT ALL CLAIMS IN RESPECT OF SUCH ACTION OR PROCEEDING MAY BE HEARD AND DETERMINED IN ANY SUCH COURT AND IRREVOCABLY WAIVE ANY OBJECTION IT MAY NOW OR HEREAFTER HAVE AS TO THE VENUE OF ANY SUCH SUIT, ACTION OR PROCEEDING BROUGHT IN SUCH A COURT OR THAT SUCH COURT IS AN INCONVENIENT FORUM. NOTHING HEREIN SHALL LIMIT THE RIGHT OF LENDER TO BRING PROCEEDINGS AGAINST BORROWER IN THE COURTS OF ANY OTHER JURISDICTION.

(b) EXCEPT AS PROHIBITED BY LAW, EACH PARTY HERETO HEREBY WAIVES ANY RIGHT IT MAY HAVE TO CLAIM OR RECOVER IN ANY LITIGATION ARISING OUT OF OR RELATING TO THIS AGREEMENT ANY SPECIAL, EXEMPLARY, PUNITIVE OR CONSEQUENTIAL DAMAGES OR ANY DAMAGES OTHER THAN, OR IN ADDITION TO, ACTUAL DAMAGES.

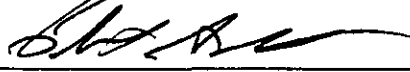
SECTION 7.08 Waiver of Jury Trial. EACH PARTY HERETO HEREBY WAIVES, TO THE FULLEST EXTENT PERMITTED BY APPLICABLE LAW, ANY RIGHT IT MAY HAVE TO A TRIAL BY JURY IN ANY LEGAL PROCEEDING DIRECTLY OR INDIRECTLY ARISING OUT OF OR RELATING TO THIS AGREEMENT OR THE TRANSACTIONS CONTEMPLATED HEREBY (WHETHER BASED ON CONTRACT, TORT OR ANY OTHER THEORY). EACH PARTY HERETO (A) CERTIFIES THAT NO REPRESENTATIVE, AGENT OR ATTORNEY OF ANY OTHER PARTY HAS REPRESENTED, EXPRESSLY OR OTHERWISE, THAT SUCH OTHER PARTY WOULD NOT, IN THE EVENT OF LITIGATION, SEEK TO ENFORCE THE FOREGOING WAIVER AND (B) ACKNOWLEDGES THAT IT AND THE OTHER PARTIES HERETO HAVE BEEN INDUCED TO ENTER INTO THIS AGREEMENT BY, AMONG OTHER THINGS, THE MUTUAL WAIVERS AND CERTIFICATIONS IN THIS SECTION.

SECTION 7.09 Execution in Counterparts; Integration. This Agreement may be executed in any number of counterparts and by different parties hereto in separate counterparts, each of which when so executed shall be deemed to be an original and all of which taken together shall constitute one and the same agreement. This Agreement constitutes the entire agreement and understanding among the parties hereto and supersedes all prior and contemporaneous agreements and understandings, oral or written, relating to the subject matter hereof.

[Signature Pages Follow]

IN WITNESS WHEREOF, the parties hereto have caused this Agreement to be executed by their respective officers thereunto duly authorized, as of the date first above written.

PECO ENERGY COMPANY

By: 
Name: Phillip S. Barnett
Title: Senior Vice President, Chief Financial
Officer and Treasurer

**CANAM PIDC REGIONAL CENTER, LP
XXXV**

By: CanAm GP XXXV, LLC, it General Partner

By: _____
Name: Tom Rosenfeld
Title: Manager

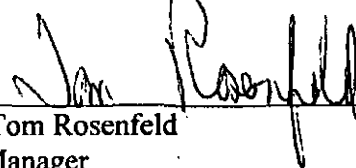
IN WITNESS WHEREOF, the parties hereto have caused this Agreement to be executed by their respective officers thereunto duly authorized, as of the date first above written.

PECO ENERGY COMPANY

By: _____
Name: Phillip S. Barnett
Title: Senior Vice President, Chief Financial
Officer and Treasurer

**CANAM PIDC REGIONAL CENTER, LP
XXXV**

By: CanAm GP XXXV, LLC, its General Partner

By:  _____
Name: Tom Rosenfeld
Title: Manager

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PA PUBLIC UTILITY COMMISSION
SECRETARY'S BUREAU

EXHIBIT A

Economic Impact Study

(Attached)



**EB-5 EMPLOYMENT IMPACT ANALYSIS
FOR THE PECO LONG-TERM
INFRASTRUCTURE IMPROVEMENT PLAN
("LTIIP") PROJECT**



July 21, 2017

FINAL REPORT SUBMITTED TO:

Phillip S. Barnett
PECO
2301 Market Street
Philadelphia, PA 19103

FINAL REPORT SUBMITTED BY:

Econsult Solutions
1435 Walnut Street
Philadelphia, PA 19102



LETTER OF TRANSMITTAL



1435 Walnut Street, Ste. 300
Philadelphia, PA 19102
215-717-2777
econsultsolutions.com

July 21, 2017

PECO
Attn: Phillip S. Barnett
2301 Market Street
Philadelphia, PA 19103

Dear Mr. Barnett:

Attached with this letter please find the job creation impact analysis resulting from the PECO Long-term Infrastructure Investment Plan ("LTIP") Project. (the "PECO LTIP Project" or the "Project"). This report is intended to assist the U.S. Citizenship and Immigration Services ("USCIS") in their evaluation of the PECO LTIP Project under the auspices of the Immigrant Investor Program ("EB- 5 Program"). As per USCIS guidance, this analysis quantifies the likely net economic and job creation impacts associated with the proposed commercial activity that will result from the construction and subsequent operation of the Project.

Econsult Solutions, Inc. used a variety of data sources in undertaking this analysis, including data supplied by your team, various third-party commercial data sources, government data sources, industry averages, and our past experience. We have assumed the data provided by third parties and your team to be correct. We also completed additional research and analysis to check and corroborate the provided data for reasonableness. Using industry specific metrics, statewide and regional data sources, and third-party sources of data, we believe the information proved to be reasonable and appropriate for the purposes of estimating EB-5 job creation impacts associated with the Project.

We conclude that the proposed PECO LTIP Project will result in the creation of **1,606 "model-derived" EB-5 eligible jobs**. It is important to note that any changes in the specifics of the Project may cause the impacts to be different from those reported here.

We appreciated the opportunity to work with you and your team on this project.

Sincerely,

A handwritten signature in black ink that reads 'Daniel M. Miles'.

Daniel M. Miles, PhD
Vice President and Associate Principal
Econsult Solutions, Inc.



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HIGHLIGHTS AND FINDINGS

- PECO Energy Company (“PECO” or the “Borrower”) is Pennsylvania’s largest electric and natural gas utility delivering power to more than 1.6 million electricity customers and more than 511,000 natural gas customers throughout a 2,100 square-mile authorized service territory in southeastern Pennsylvania encompassing the Counties of Bucks, Chester, Delaware, Montgomery, York, Lancaster and Philadelphia (including the City of Philadelphia). PECO is classified as a “public utility” subject to regulation and oversight by state and federal authorities.
- In 2015, the Pennsylvania Public Utility Commission approved PECO’s petition for a Long-term Infrastructure Improvement Plan (“LTIIP”), also known as “System 2020,” which covers a five-year period (2016-2020) and is intended to accelerate infrastructure improvements to enhance reliability by strengthening and modernizing the company’s electric distribution system.
- The PECO LTIIP Project as described in this economic impact analysis (the “Job Study”) consists of three primary work streams, which are expected to be implemented solely in designated targeted employment areas (“TEA”) located within the Counties of Bucks, Chester, Delaware, Montgomery, and Philadelphia, as described below:
 - **Storm Hardening & Resiliency Measures:** PECO intends to utilize an index that tracks the number of customers that have experienced more than a specified number of interruptions in a given period (the “Customers Experiencing Multiple Interruptions” or “CEMI” index) to determine the circuits and areas that have been adversely affected by major storm events, and to focus storm hardening and resiliency efforts in those areas. In this regard, PECO plans to replace bare open wires with a more resilient type of cable; implement smart switching equipment to be able to quickly restore power to customers within a matter of minutes; and upgrade its distribution facilities to operate at higher voltages consistent with more modern methods of operations. PECO anticipates completing approximately fifty-four (54) CEMI-related improvements within designated TEAs in Bucks, Chester, Delaware, Montgomery, and Philadelphia Counties during the five-year LTIIP period. PECO also intends to retire some twenty-three (23) aging unit substations within designated TEAs in Bucks, Chester, Montgomery, and Philadelphia Counties, which have experienced increasing failure rates and upgrade the company’s downstream low-voltage supply facilities to operate at higher-voltages consistent with modern modes of operation.

- **Underground Cable Replacement:** PECO carefully assesses its reliability experience (e.g., equipment failure rates) to take appropriate action to reverse negative trends before reliability problems are experienced. Accordingly, PECO intends to replace two types of underground distribution cable throughout its Service Territory: (i) Main Stem cable, which supplies power at medium voltage through conduits to underground distribution transformers and secondary wires as well as providing supply from some substations to aerial distribution circuits; and (ii) Underground Residential Development (“URD”) cable, which is lower voltage distribution cable that is direct-buried primarily in suburban residential developments. PECO anticipates replacing approximately 200 miles of Main Stem and URD cables located within designated TEAs in Bucks, Chester, Delaware, and Philadelphia Counties during the five-year LTIP term.
- **Building Substation Retirement:** PECO’s electric distribution system currently contains 23 Building Substations that supply power to downstream facilities that serve large numbers of customers. Nearly 90% of PECO’s existing Building Substations were constructed over fifty (50) years ago, and many contain obsolete equipment requiring customized replacement parts and have limited capabilities for remotely monitoring loading and equipment status. In order to address the reliability risk posed by Building Substations, PECO has incorporated into its LTIP a program for accelerating the retirement and removal of problematic substations and redesigning and upgrading portions of the distribution system supplied by those substations. Presently, the PECO LTIP Project includes the retirement of one (1) Building Substation located within a designated TEA in Delaware County beginning in 2020.
- To model the economic and employment impacts resulting from the direct activities for the design, construction, and procurement of materials and equipment associated with the proposed PECO LTIP Project, Econsult Solutions, Inc. (“ESI”) prepared a customized economic impact model using RIMS II multipliers developed by the U.S. Department of Commerce’s Bureau of Economic Analysis. Notably, the RIMS II multipliers have been customized to measure the economic linkages within a ten-county region, consisting of the five counties comprising the PIDC Regional Center’s approved geographic area – Bucks, Chester, Delaware, Montgomery, and Philadelphia Counties – as well as Lancaster and York County in Pennsylvania and Camden, Burlington, and Gloucester Counties in New Jersey (collectively, the “Study Area”). All the counties comprising the Study Area have demonstrated strong economic ties and the relevant commuting pattern data reflects that most of the individuals that will work on the development of the Project will likely come from one of the counties that comprise the Study Area. The RIMS II multipliers represent an industry standard approach to assess the economic and job creation impacts of economic development projects, the creation of new businesses, and public policy changes.

- The Job Study shows that the proposed PECO LTIP Project, constructed as planned, is likely to result in significant economic impacts within the Study Area and the remainder of the U.S. economy overall. Most importantly, from the perspective of USCIS and the EB-5 Program, **the impacts include 1,606 “model-derived” EB-5 eligible jobs.**
- The total estimated budget for the PECO LTIP Project is \$275.0 million over the five-year period (2016-2020), which includes approximately \$35.5 million of expenditures that have already been incurred as of April 30, 2017. The remaining approximately \$239.5 million of development expenditures that are analyzed in the Job Study are expected to be incurred over an approximately 44-month construction period running from May 2017 until December 2020. Because the remaining construction timeframe exceeds the 24-month threshold for the inclusion of model-derived direct jobs in accordance with USCIS policy, **the model-derived direct and indirect and induced employment impacts associated with the spending in the construction industry are eligible for EB-5 purposes.**
- Of the approximately \$239.5 million of development spending remaining, ESI excluded some \$29.6 million of spending contingency costs and other non-eligible spending. All told, the PECO LTIP Project is anticipated to incur approximately **\$209.9 million in EB-5 eligible expenditures**, which includes approximately \$139.6 million for construction and project management activities, approximately \$23.2 million for design and engineering, and approximately \$47.1 million in materials and equipment procurement spending.
- The approximately **\$162.8 million** in EB-5 eligible construction, project management, and design and engineering expenditures are estimated to support **1,364 model-derived EB-5 eligible jobs, including 1,129 model-derived indirect and induced jobs and 235 model-derived annualized direct jobs.**
- The Project will also involve significant spending on materials and equipment. This includes electrical wire, conduit, conduit ducts and manholes, electrical poles, and transformers, switchgear, and other electrical devices. The spending associated with the manufacturing of the materials and equipment will generate additional economic and job creation impacts. The **\$47.1 million** in EB-5 eligible materials and equipment procurement spending is estimated to support **242 model-derived EB-5 eligible indirect and induced jobs.**
- Based on local economic conditions, it is clear that the vast majority of employment supported by the development of the Project will indeed result in the creation of net-new jobs in Pennsylvania and the MSA, and not simply a redistribution of existing employment activity.

- **All told, EB-5 eligible expenditures projected to be incurred by the PECO LTIP Project are estimated to result in the creation of 1,606 model-derived EB-5 eligible jobs (see Table ES.1) and support a maximum of \$80.3 Million in EB-5 borrowing (see Table ES.2)**

Table ES.1: Model-Derived EB-5 Eligible Job Creation Impacts Resulting from the PECO LTIP Project

PECO LTIP Project	EB-5 Eligible Direct Jobs	EB-5 Eligible Indirect and Induced Jobs	Total EB-5 Eligible Jobs
Development Expenditures	235	1,129	1,364
Materials and Equipment Expenditures	0	242	242
Total	235	1,371	1,606

Source: Econsult Solutions, Inc. (2017)
Totals may not sum due to rounding.

Table ES.2: EB-5 Financing Available from Employment Impacts Resulting from the PECO LTIP Project

PECO LTIP Project	Total EB-5 Eligible Jobs	EB-5 Financing Available per 10 Jobs	EB-5 Financing Available
Development Expenditures	1,364	\$500,000	\$68.2 million
Materials and Equipment Expenditures	242	\$500,000	\$12.1 million
Total	1,606		\$80.3 million

Source: Econsult Solutions, Inc. (2017)
Totals may not sum due to rounding.

1.0 INTRODUCTION

DESCRIPTION OF PROJECT

PECO Energy Company (“PECO” or the “Borrower”) is Pennsylvania’s largest electric and natural gas utility delivering power to more than 1.6 million electricity customers and more than 511,000 natural gas customers throughout a 2,100 square-mile authorized service territory in southeastern Pennsylvania encompassing the Counties of Bucks, Chester, Delaware, Montgomery, York, Lancaster and Philadelphia (including the City of Philadelphia). PECO is classified as a “public utility” subject to regulation and oversight by state and federal authorities.

In 2015, the Pennsylvania Public Utility Commission approved PECO’s petition for a Long-term Infrastructure Improvement Plan (“LTIIP”), also known as “System 2020,” which covers a five-year period (2016-2020) and is intended to accelerate infrastructure improvements in order to enhance reliability by strengthening and modernizing the company’s electric distribution system.

The PECO LTIIP Project as described in this Job Study consists of three primary work streams to be implemented in designated targeted employment areas (“TEA”) within the Counties of Bucks, Chester, Delaware, Montgomery, and Philadelphia:

- **Storm Hardening & Resiliency Measures:** PECO intends to utilize an index that tracks the number of customers that have experienced more than a specified number of interruptions in a given period (the “Customers Experiencing Multiple Interruptions” or “CEMI” index) to determine the circuits and areas that have been adversely affected by major storm events, and to focus storm hardening and resiliency efforts in those areas. In this regard, PECO plans to replace bare open wires with a more resilient type of cable; implement smart switching equipment to be able to quickly restore power to customers within a matter of minutes; and upgrade its distribution facilities to operate at higher voltages consistent with more modern methods of operations. PECO anticipates completing approximately fifty-four (54) CEMI-related improvements located within designated TEAs in Bucks, Chester, Delaware, Montgomery, and Philadelphia Counties during the five-year LTIIP period. PECO also intends to retire some twenty-three (23) aging unit substations located in designated TEAs primarily in Bucks, Chester, Montgomery, and Philadelphia Counties, which have experienced increasing failure rates and upgrade the company’s downstream low-voltage supply facilities to operate at higher-voltages consistent with modern modes of operation.

- **Underground Cable Replacement:** PECO carefully assesses its reliability experience (e.g., equipment failure rates) to take appropriate action to reverse negative trends before reliability problems are experienced. Accordingly, PECO intends to replace two types of underground distribution cable throughout its Service Territory: (i) Main Stem cable, which supplies power at medium voltage through conduits to underground distribution transformers and secondary wires as well as providing supply from some substations to aerial distribution circuits; and (ii) Underground Residential Development (“URD”) cable, which is lower voltage distribution cable that is direct-buried primarily in suburban residential developments. PECO anticipates replacing approximately 200 miles of Main Stem and URD cables located in designated TEAs in Bucks, Chester, Delaware, and Philadelphia Counties.
- **Building Substation Retirement:** PECO’s electric distribution system currently contains 23 Building Substations that supply power to downstream facilities that serve large numbers of customers. Nearly 90% of PECO’s existing Building Substations were constructed over fifty (50) years ago, and many contain obsolete equipment requiring customized replacement parts and have limited capabilities for remotely monitoring loading and equipment status. In order to address the reliability risk posed by Building Substations, PECO has incorporated into its LTIP a program for accelerating the retirement and removal of problematic substations and redesigning and upgrading portions of the distribution system supplied by those substations. Presently, the PECO LTIP Project includes the retirement of one (1) Building Substation located in a designated TEA in Delaware County.

The economic impact analysis shows that the proposed PECO’s LTIP projects, constructed as planned, would result in significant economic impacts for the Commonwealth of Pennsylvania, the U.S. economy overall, and the study area. Most importantly from the perspective of USCIS and the EB-5 Program, ***the impacts would include 1,607 “model-derived” EB-5 Eligible jobs within the approved geographic boundaries of the Regional Center, including:***¹

- **235** “model-derived” EB-5 Eligible direct jobs from the construction of the projects;
- **1,129** “model-derived” EB-5 Eligible indirect and induced jobs from the construction of the projects; and
- **242** “model-derived” EB-5 Eligible indirect and induced jobs from procurement of materials and equipment.

¹ Totals may not sum due to rounding.

DESCRIPTION OF TRADE AREA AND LOCAL ECONOMY

The work streams associated with PECO LTIP Project will be implemented throughout Bucks, Chester, Delaware, Montgomery, and Philadelphia Counties in Pennsylvania. For purposes of this Job Study, ESI assumes that the relevant geographic region for estimating the economic and job creation impacts of the Project consists of the aforementioned five counties, as well as York and Lancaster Counties in Pennsylvania and Camden, Burlington, and Gloucester counties in New Jersey (the “Study Area”). The ten counties that comprise the Study Area have strong economic ties as evidenced by the fact that 82% of the people that work in study also live in the trade area.² In addition, 93% of PECO’s workforce lives in the study area as defined and also all of the contractors that have worked on the projects thus far are located within the Study Area. Given the size of the investment and commuting patterns, most of the individuals that will work on the Project will likely come from one of the ten counties that comprise the study area (see Figure 1.1 and Table 1.1).

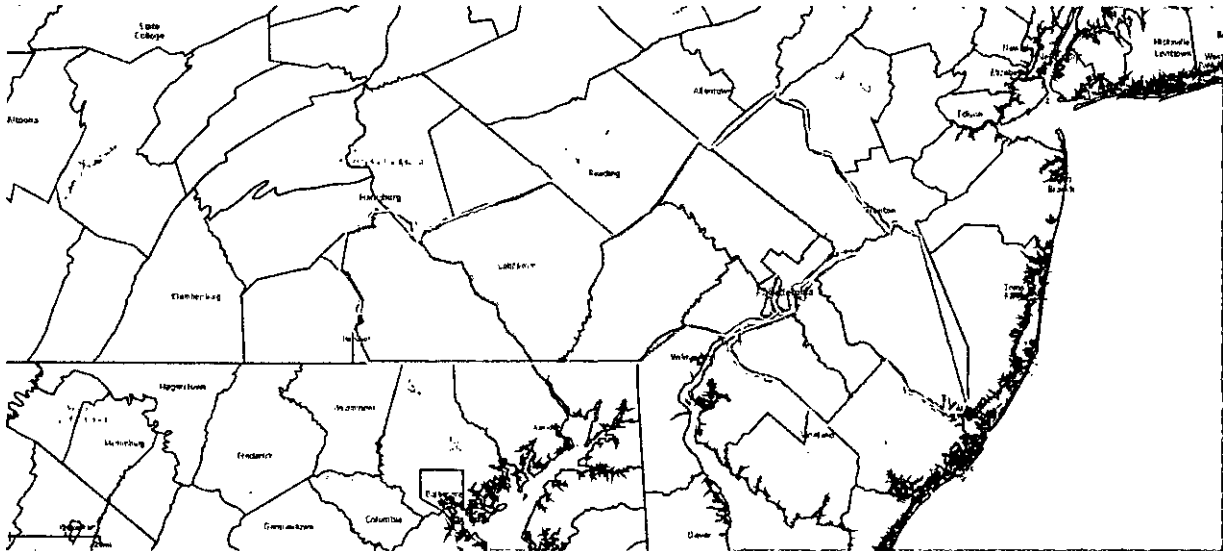
Table 1.1: Counties Included In the Study Area

State	Counties
Pennsylvania	Bucks, Chester, Delaware, Montgomery, Philadelphia, Lancaster, and York
New Jersey	Camden, Burlington, and Gloucester

Source: US Census Bureau (2017), Econsult Solutions, Inc. (2017)

² See Appendix D for additional details.

Figure 1.1: Primary Trade Area for the Construction of PECO's LTIP Projects



Source: ESRI (2017), Econsult Solutions, Inc. (2017)

The primary trade area is home to approximately 6.4 million people. As illustrated in Table 1.2, the trade area is expected to grow in population, households, and income over the 2017 to 2022 period.

Table 1.2: Selected Demographic Information for the Primary Trade Area

2017	Trade Area	Pennsylvania	US
Population	6,420,344	12,976,662	327,745,538
Households	2,422,803	5,113,907	123,158,887
Median HH Inc.	\$64,357	\$56,184	\$56,124

2022	Trade Area	Pennsylvania	US
Population	6,561,852	13,138,130	341,323,594
Households	2,470,850	5,171,350	128,069,416
Median HH Inc.	\$74,105	\$63,216	\$62,316

2016-2021 CAGR ³	Trade Area	Pennsylvania	US
Population	0.44%	0.25%	0.83%
Households	0.39%	0.22%	0.79%
Median HH Inc.	2.86%	2.39%	2.12%

Source: ESRI (2017), Econsult Solutions, Inc. (2017)

OVERVIEW OF THE REPORT

PECO requested that Econsult Solutions, Inc. (“ESI”) produce this report to assist the USCIS in its evaluation of PECO LTIP Project’s EB-5 eligible job creation and economic impacts. As per USCIS guidance, this analysis quantifies the likely net economic and job creation impacts associated with the proposed commercial activity that will result from the development of the Project.

This report begins by discussing the input-output modeling theory and explains the methodological approach used to translate the direct commercial activities of the project into the total amount of employment supported by them (Section 2). The report then identifies the proposed commercial activities that are to take place within the Study Area over the next couple of years (Section 3), and then provides estimates of total and EB-5 eligible job creation (Section 4). The report concludes by demonstrating that the proposed Project is feasible (i.e. that it will actually occur at the levels anticipated by the applicant), and that the total employment it supports is net new in nature (i.e. that it

³ Compounded Annual Growth Rate.

absorbs new demand and thus represents new job creation, and does not represent a shifting of existing demand and therefore of existing jobs) (Section 5).

OVERVIEW OF THE FIRM AUTHORIZING REPORT

This report was produced by Econsult Solutions, Inc.⁴ ESI is a Philadelphia-based economic consulting firm that provides businesses and public policy makers with economic consulting services in urban economics, real estate economics, transportation, public infrastructure, development, public policy and finance, community and neighborhood development, and planning, as well as expert witness services in support of litigation. Its principals are nationally recognized experts in urban development, real estate, government and public policy, planning, transportation, non-profit management, and business strategy and administration, as well as litigation and commercial damages. Staff members have outstanding professional and academic credentials, including active positions at the university level, wide experience at the highest levels of the public policy process, and extensive consulting experience. ESI has completed a number of EB-5 economic impact assignments over the last 5 years.

⁴ See Appendix A for additional detail on Econsult Solutions, Inc. and Appendix B for biographies of the principals responsible for the production of this report.

2.0 INPUT-OUTPUT METHODOLOGY

The Immigrant Investor (EB-5) Program is based on the fact the U.S. economy will benefit from an immigrant investor's investment of capital into a commercial enterprise that, as a result of the investment, creates at least ten jobs for US workers. The investment can be in a new commercial enterprise or into existing business, provided that the business will be restructured or expanded through the immigrant investor's investment of capital resulting in a substantial change in the net worth or number of employees as a result of the invested capital.

The EB-5 Program permits designated "Regional Centers" to use approved input-output modeling systems to quantify "model-derived" direct, indirect and induced job impacts to meet the job requirements. Such input-output models are widely used to quantify a number of economic impacts such as earnings, revenue and employment in a region, and include RIMS II, IMPLAN and REMI, among others.

INPUT-OUTPUT THEORY

The total impact resulting from any initial round of commercial activity (such as a construction project or the ongoing operations of the project) can be modeled by constructing an input-output model. Such models are designed to estimate two sets of spillover impacts from the initial activity: the indirect effect, which measures the multiplier effect from the purchase of goods and services from local vendors, and the induced effect, which measures the multiplier effect from the spending of labor income by employees within a particular geography.

Initial rounds of commercial activity generate employment impacts in three ways. First, people are directly employed from the commercial activity itself; this can be considered the direct employment effect. Second, people are indirectly employed as a result of the increase in demand associated with the purchase of goods and services from local vendors; this can be considered the indirect employment effect. Third, the direct employment effect and the indirect employment effect results in additional labor income, which in turn is spent within a local economy and thus supports additional employment; this can be considered the induced employment effect.

EMPLOYMENT IMPACT METHODOLOGY⁵

To model the employment impacts resulting from the direct activities that will be generated by the proposed mixed-use project, ESI developed a customized economic impact model using RIMS II multipliers developed by the US Department of Commerce's Bureau of Economic Analysis. The RIMS II multipliers represent an industry standard approach to assess the economic and job creation impacts of economic development projects, the creation of new businesses, and public policy changes.

The RIMS II multipliers are based on the BEA's national Input/output (I/O) table, which shows the input/output structure of approximately 500 US industries and BEA's regional economic accounts, which are used to adjust the national I/O tables to the local level. The use of the regional economic accounts data allows BEA to produce multipliers at the individual county-level. The individual county-level multipliers can then be aggregated up to develop multipliers for any region composed of one or more contiguous counties.

The size of the individual multipliers will vary from county-to-county, region-to-region and industry-to-industry, with some industries and regions having large multipliers and others having smaller multipliers. In general, the larger the region, the larger the multipliers. For the purposes of this report, the geography of interest is the 10 counties located in Southeastern Pennsylvania and Southern New Jersey that comprise the "Study Area" (See Table 1.1 and Figure 1.1).

The RIMS II model produces three different types of multipliers – output, earnings, and employment – and the choice of which multiplier to use depends on the available data. For example, if data is available on the change in final demand of an industry, then one should use the final demand multiplier (e.g. \$1 million of spending in the construction industry). If one knows the change in employment, then one should use the direct effect employment multiplier. In theory, it does not matter which multiplier is chosen, each should produce consistent results. For the purposes of this analysis, ESI used the final demand multipliers to estimate the resulting changes in total output, employment, and wages associated with the spending generated by the project.⁶

⁵ See Appendix C for additional detail on Econsult Solutions, Inc. economic impact methodology.

⁶ Please see Appendix E for the multipliers used in this analysis.

INPUTS USED – TRANSPARENCY, APPLICABILITY, RELIABILITY, UP-TO-DATE

ESI used a variety of data sources in undertaking this analysis, including data supplied by PECO, various third-party data sources, including RIMS II Input/output data from the U.S. Department of Commerce's Bureau of Economic Analysis (BEA), as well as commercial data sources, including IMPLAN and ESRI, other government data sources, and industry averages. The client provided data on the estimated construction costs of the various components of the project from its vendors, the spend-to-date amounts, associated Project timelines, and estimates of revenue that will be generated by the annual operations of the Project.

Additional research and analysis was completed by ESI to check and corroborate the client provided data for reasonableness. Using industry specific metrics, statewide and regional data sources, and third-party sources of data, the data proved to be reasonable and appropriate for the purposes of estimating EB-5 job creation impacts associated with the project.

The credibility of the Job Study's job creation estimates depends on the reliability and reasonableness of the inputs used. Below, please find a discussion of the data inputs used in the analysis.

Construction Cost Estimates

Transparency – The Job Study relies on construction cost and timeline estimates provided by PECO Energy Company, Pennsylvania's largest electric and natural gas utility provider. These estimates detail the construction, design and engineering and material and equipment costs associated with the PECO LTIIP Project.

The construction costs are based on historic costs of similar projects undertaken by PECO. For the Storm Hardening & Resiliency Measures work stream 5 years of historical cost data were used, and for the Underground Cable Replacement and Building Substation Retirement work streams average cost data obtained from similar projects undertaken over the last 10 years was utilized. Specific project-by-project costs are refined through detailed design and, where appropriate the contract bid process. Detailed designs have been completed for approximately 90% of all 2017 projects and 20% of 2018 projects.

PECO's LTIIP reflects a five-year development period running from 2016 until December 2020. As of May 2017, there are 44 months remaining in the PECO LTIIP Project (May 2017 to December 2020), which exceeds the 24-month threshold for the inclusion of model-derived direct jobs in accordance with USCIS policy. As such, the model-derived direct and model-derived indirect and induced employment impacts associated with qualifying design and construction expenditures are eligible for EB-5 purposes.

Applicability – The resulting spending on the design and construction of the PECO LTIIP Project will be revenue for the contractors that will undertake the project work, as such it is an applicable input for the Construction and Architecture/Engineering industries final demand multipliers. The revenue to each industry represents a net-change in the final demand for each industry. Please see Appendix E for the RIMS II multiplier industries applied to each of the construction spending inputs.

Reliability – The construction and design estimates are reliable indicators of the final demand change that will likely occur in the impacted industries. Various aspects of PECO's LTIIP have been implemented since 2016. In addition, PECO is constantly updating and upgrading its system, and as such the company has many completed projects to draw upon to estimate the design and construction costs for the remainder of the Project. This past experience should allow PECO to accurately estimate the design/engineering and construction costs associated with the various work streams. Furthermore, it should be noted that PECO's LTIIP was evaluated and approved by the Pennsylvania Public Utilities Commission ("PAPUC"), which determined that the expenditures associated with the implementation of the plan were reasonable, cost effective, and designed to ensure and maintain efficient service.

Up-to-date – The construction and timeline estimates are current as of July 2017, and are therefore considered up-to-date for purposes of this analysis.

Materials Spending

Transparency – The Job Study relies on materials and equipment procurement estimates provided by the PECO. The material and equipment costs are based on historic cost of similar projects undertaken by PECO. For the Storm Hardening & Resiliency Measures work stream, 5 years of historic projects, for the Underground Cable Replacement and the Building Substation Retirement work

streams, projects undertaken over the last 10 years were utilized. Specific project-by-project costs are refined through detailed design and, where appropriate the contract bid process. Detailed designs have been completed for approximately 90% of all 2017 projects and 20% of 2018 projects.

Applicability – The resulting spending on materials and equipment related to the PECO LTIP Project will be revenue for the manufacturers, so it is an applicable input for the use of the final demand multipliers for the respective manufacturing industries. The revenue to each industry represents a net-change in the final demand for each industry. Please see Appendix E for the RIMS II multiplier industries applied to each of the material and equipment categories.

Reliability – The materials and equipment procurement estimates are reliable indicators of the final demand change that will occur in the impacted industries. Various aspects of PECO's LTIP have been implemented since 2016. In addition, because PECO is constantly updating and upgrading its system, the company has many completed projects to draw upon to estimate the construction costs of the remaining PECO LTIP Project. This past experience should allow PECO to accurately estimate the material and equipment costs associated with the Project work streams.

PECO plans to use suppliers and equipment manufacturers with whom it has long-standing relationships, and, as such, the materials and equipment costs should not differ substantially from their past experience. Furthermore, it should be noted that PECO's LTIP was evaluated and approved by the PAPUC, which determined that the expenditures associated with the implementation of the plan were reasonable, cost effective, and designed to ensure and maintain efficient service.

Up-to-date – The materials and equipment procurement estimates are current as of July 2017, and therefore considered up-to-date for purposes of this analysis.

3.0 DIRECT PROJECT ACTIVITY

PECO LTIP PROJECT SPENDING

The total estimated budget for the PECO LTIP Project is approximately \$275 million over the five-year period (2016-2020), which includes approximately \$35.5 million of expenditures that have already been incurred as of April 30, 2017. The remaining approximately \$239.5 million of development expenditures that are analyzed in the Job Study are expected to be incurred over an approximately 44-month construction period from May 2017 until December 2020.

Of the approximately \$239.5 million of development spending remaining, ESI excluded some \$29.6 million of contingency costs and other non-eligible spending. All told, the PECO LTIP Project is anticipated to incur approximately **\$209.9 million in EB-5 eligible spending**, which includes approximately \$139.6 million of spending on construction and project management activities, approximately \$23.2 million of spending on design and engineering activities, and approximately \$47.1 million of spending on materials and equipment procurement.

Construction Spending⁷

The PECO LTIP Project consists of three work streams: (1) Storm Hardening and Resiliency; (2) Underground Cable Replacement; and (3) the Building Substation Retirement.

Storm Hardening and Resiliency

A significant portion of PECO's LTIP is dedicated to accelerating the company's investment in plant and equipment designed to achieve storm hardening and resiliency. In this regard, PECO intends to utilize an index that tracks the number of customers that have experienced more than a specified number of interruptions in a given period (the "Customers Experiencing Multiple Interruptions" or "CEMI" index) to determine the circuits and areas that have been adversely affected by major storm events, and to focus storm hardening and resiliency efforts in those areas. PECO anticipates undertaking fifty-four (54) CEMI-related improvements located within designated targeted employment areas ("TEA") in Bucks, Chester, Delaware, Montgomery, and Philadelphia Counties. PECO also intends to retire some twenty-three (23) aging unit substations within

⁷ Please see Appendix F for a breakdown of the spending by year.

designated TEAs in Bucks, Chester, Montgomery, and Philadelphia Counties, which are small, single transformer substations that convert electrical power from higher voltage to lower voltage levels. The unit substations contain obsolete equipment that is difficult and costly to repair, as replacement parts are not readily available off-the-shelf and require custom fabrications.

The storm hardening and resiliency measures are expected to cost approximately \$99.4 million to complete, excluding the procurement of materials and equipment. The activities are projected to take place between May 2016 and December 2020. As of April 30, 2017, PECO has already incurred approximately \$14.5 million of expenditures related to this work stream. For the purposes of estimating the number of EB-5 eligible jobs that will be supported by the Project, ESI only analyzes construction spending that is projected to occur as of May 2017. In addition, not all of the construction spending that is estimated to occur as of May 2017 is eligible for EB-5 purposes. Accordingly, ESI has excluded a combined \$14.8 million of construction contingency and minor costs related to CEMI activities that may be undertaken outside of the aforementioned five designated TEAs.

Table 3.1: Storm Hardening and Resiliency Measures Construction Costs

CEMI & Unit Substation Retirement (Combined)	Total Budget	Spending Through 04/30/2017	CEMI-related Spending Outside TEAs	Total Remaining Spending	Remaining EB-5 Eligible Spending
Project Management	\$11,848,465	\$1,099,465	\$494,974	\$10,254,026	\$10,254,026
Engineering and Design	\$11,976,192	\$1,406,192	\$487,730	\$10,082,270	\$10,082,270
Aerial Electrical Construction	\$36,850,837	\$5,600,837	\$1,429,388	\$29,820,612	\$29,820,612
Landscape Management	\$27,298,788	\$6,398,788	\$946,487	\$19,953,513	\$19,953,513
O&C Contingency	\$11,450,000	\$0	\$531,191	\$10,918,809	\$0
Total	\$99,425,282	\$14,505,282	\$3,889,770	\$81,029,230	\$70,110,421

Source: PECO (2017), Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

Underground Cable Replacement

PECO owns and operates approximately 15,258 miles of underground distribution cable throughout its service territory. Underground distribution cable is broadly divided between Main Stem cable and Underground Residential Development (“URD”) cable. PECO intends to replace approximately 200 miles of Main Stem cable and URD cable located

within five designated TEAs in Bucks, Chester, Delaware, and Philadelphia Counties.

The underground cable replacement measures are expected to cost approximately \$110.5 million to complete, excluding the procurement of materials and equipment. The activities are projected to take place between May 2016 and December 2020. As of April 30, 2017, PECO has incurred approximately \$15.0 million of expenditures related to this work stream. For the purposes of estimating the number of EB-5 eligible jobs that will be supported by the Project, ESI only analyzes construction spending that is projected to occur as of May 2017. In addition, not all of the construction spending that is projected to occur as of May 2017 is eligible for EB-5 purposes. Accordingly, ESI has excluded approximately \$12.5 million of construction contingency and other non-eligible expenses.

Table 3.2: Underground Cable Replacement Construction Costs

Main Stem Cable & URD Cable Replacement (Combined)	Total Budget	Spending Through 04/30/2017	Total Remaining Spending	Remaining EB-5 Eligible Spending
Project Management	\$13,254,016	\$1,054,016	\$12,200,000	\$12,200,000
Engineering and Design	\$13,372,381	\$1,172,381	\$12,200,000	\$12,200,000
Underground Electrical Construction	\$29,640,690	\$6,360,690	\$23,280,000	\$23,280,000
Civil Construction	\$41,753,323	\$6,433,323	\$35,320,000	\$35,320,000
Non O&C Contingency	\$6,250,000	\$0	\$6,250,000	\$0
O&C Contingency	\$6,250,000	\$0	\$6,250,000	\$0
Total	\$110,520,410	\$15,020,410	\$95,500,000	\$83,000,000

Source: PECO (2017), Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

Building Substation Retirement

PECO's electric distribution system currently contains twenty-three (23) Building Substations, which is a structure that typically contains multiple transformers that supply power to distribution facilities servicing large numbers of customers. In order to address the reliability risk posed by aging Building Substations, PECO has incorporated into its LTIIP a program for accelerating the retirement and removal of problematic substations and redesigning and upgrading portions of the distribution system supplied by those substations. Presently, the PECO LTIIP Project contemplates the retirement of one (1) Building Substation located in a designated TEA in Delaware County.

The implementation of the building substation retirement is expected to cost approximately \$11.0 million, excluding the procurement of materials and equipment. Not

all of the construction spending is eligible for EB-5 purposes. Accordingly, ESI has excluded approximately \$1.3 million of, construction contingency and other non-eligible expenses.

Table 3.3: Building Substation Retirement Construction Costs

Building Substation Retirement	Total Budget	Spending Through 04/30/2017	Total Remaining Spending	Remaining EB-5 Eligible Spending
Project Management	\$650,000	\$0	\$650,000	\$650,000
Engineering and Design	\$850,000	\$0	\$850,000	\$850,000
Substation Construction	\$1,850,000	\$0	\$1,850,000	\$1,850,000
Aerial Electrical Construction	\$2,500,000	\$0	\$2,500,000	\$2,500,000
Underground Electrical Construction	\$2,500,000	\$0	\$2,500,000	\$2,500,000
Civil Construction	\$1,300,000	\$0	\$1,300,000	\$1,300,000
Non O&C Contingency	\$650,000	\$0	\$650,000	\$0
O&C Contingency	\$650,000	\$0	\$650,000	\$0
Total	\$10,950,000	\$0	\$10,950,000	\$9,650,000

Source: PECO (2017), Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

The hard-and-soft costs related to the implementation of the work streams comprising the PECO LTIP Project represent spending by PECO in the construction and architecture and engineering industries, and as such represent revenue for each of the downstream industries.

All told, the construction and design/engineering spending associated with the PECO LTIP Project is estimated to amount to **\$162.8 million in EB-5 eligible spending** between approximately May 2017 and December 2020. ESI believes that these cost estimates are justified and appropriate.

Materials and Equipment⁸

In addition to the construction and design/engineering activities, the PECO LTIP Project will also involve the procurement of materials and equipment for each of the three work streams. In such instances, the USCIS has agreed to count the jobs indirectly created

⁸ Please see Appendix G for a detailed breakdown of the materials and equipment spending by year and category.

outside of the geographical boundaries of the Regional Center.⁹ All told, the three work streams comprising the Project will collectively generate approximately \$54.1 million in spending on materials and equipment, of which approximately \$6.0 million has already been incurred as of April 30, 2017 occurred, and an additional \$1.0 million in spending on materials and equipment pertaining to some minor CEMI-related work that may be undertaken outside of the five designated TEAs (Table 3.4).

Table 3.4: Total and Remaining Materials and Equipment Spending¹⁰

PECO LTIP Project Work Streams	Total Budget	Spending Through 04/30/2017	CEMI-related Spending Outside TEAs	Total Remaining Spending
Storm Hardening and Resiliency Measures	\$24,761,199	\$3,051,199	\$1,010,230	\$20,699,770
Underground Cable Replacement	\$27,289,893	\$2,939,893	\$0	\$24,350,000
Building Substation Retirement	\$2,050,000	\$0	\$0	\$2,050,000
Total	\$54,101,092	\$5,991,092	\$1,010,230	\$47,099,770

Source: PECO (2017), Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

Spending on materials and equipment includes equipment costs, as well the wholesale and transportation “margins” that would accrue to businesses located in the Study Area. In order to estimate the wholesale and transportation margins data from the RIMS II input/output model was used.¹¹ Of the approximately \$47.1 million in remaining materials and equipment spending, ESI estimates that the wholesale margin is equal to approximately \$2.4 million and the transportation margin is equal to approximately \$0.9 million.

⁹ The justification for counting the indirect and induced jobs associated with manufacturing of the specialized equipment is as follows: “The regulation at 8 CFR 204.6(m) provides that ...each regional center wishing to participate in the Immigrant Investor Pilot program shall submit a proposal which...contains a detailed prediction regarding the manner in which the regional center will have a positive impact on the regional or *national economy* in general as reflected by such factors as increased household earnings, greater demand for business services, utilities, maintenance and repair, and construction *both within and without the regional center*” (*emphasis added*).

¹⁰ Please see Appendix G for a breakdown of the materials and equipment spending by product category.

¹¹ Please see Appendix G for additional details on the wholesale and transportation margins.

Table 3.5: EB-5 Eligible Materials and Equipment Spending

PECO LTIIP Project Work Streams	Total Remaining Spending	Wholesale	Trucking	Total EB-5 Eligible Spending
Storm Hardening and Resiliency Measures	\$20,699,770	\$1,150,660	\$384,662	\$19,164,448
Underground Cable Replacement	\$24,350,000	\$1,195,741	\$439,784	\$22,714,475
Building Substation Retirement	\$2,050,000	\$104,339	\$31,170	\$1,914,491
Total	\$47,099,770	\$2,450,740	\$855,616	\$43,793,414

Source: PECO (2017), Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

All told, the spending on materials and equipment is estimated to amount to **\$43.8 million in EB-5 eligible spending** between approximately May 2017 and December 2020. ESI believes that these cost estimates are justified and appropriate.

PECO LTIIP Project Spending Summary

The total estimated budget for the PECO LTIIP Project is \$275.0 million over a five-year period (2016-2020), which includes approximately \$35.5 million of expenditures that have already been incurred as of April 30, 2017. The remaining approximately \$239.5 million of development expenditures that are analyzed in the Job Study are expected to be incurred over an approximately 44-month construction period from May 2017 until December 2020. Because the remaining construction timeframe exceeds the 24-month threshold for the inclusion of model-derived direct jobs in accordance with USCIS policy, ***the model-derived direct and indirect and induced employment impacts associated with the spending in the construction industry are eligible for EB-5 purposes.***

Of the approximately \$239.5 million of development spending remaining, ESI excluded approximately \$29.6 million of contingency costs and other non-eligible sending. ***All told, the PECO LTIIP Project is anticipated to incur approximately \$209.9 million in EB-5 eligible spending,*** which includes approximately \$139.6 million of expenditures related

to construction and project management activities, approximately \$23.2 million of expenditures related to design and engineering, and approximately \$47.1 million of expenditures related to materials and equipment procurement.

4.0 EMPLOYMENT IMPACT¹²

CONSTRUCTION

PECO's Long-term Infrastructure Improvement Plan ("LTIP"), also known as "System 2020," covers a five-year period (2016-2020) and is intended to accelerate infrastructure improvements in order to enhance reliability by strengthening and modernizing the company's electric distribution system. PECO's LTIP consists of three primary work streams, which, together, comprise the PECO LTIP Project. The work streams include storm hardening and resiliency measures, underground cable replacement, and building Substation Retirement.

Work on several of the work streams has been ongoing since 2016 and will continue through December 2020. In order to be conservative, the Job Study excludes Project expenditures incurred prior to April 30, 2017, and only analyzes the expenditures expected to be incurred over the remaining 44-month development period running from May 2017 until December 2020. During this period, the Project is expected to incur approximately \$209.9 million in EB-5 eligible spending, which will generate significant economic and employment impacts within the Study Area.

Since the remaining 44-month construction period exceeds the 24-month threshold for the inclusion of the model-derived direct construction jobs in accordance with USCIS policy, ***both the model-derived direct and model-derived indirect and induced employment impacts associated with the construction spending are eligible for EB-5 purposes.***

It is important to note that only the spending in the construction sector will occur over the remaining 44-month construction period; as such, ESI has only included the model-derived direct jobs that will result from this spending in the EB-5 eligible job-creation calculations. For all other spending, ESI has included the model-derived indirect and induced jobs as being eligible for EB-5 purposes.

¹² The RIMS II multipliers used in this analysis are based on 2015 data, as such all dollar values were deflated to their 2015 values before estimating the economic and employment impacts and the economic and wage impacts are in 2015\$. The dollar values in the Tables throughout this section are in 2015\$. Please see Appendix H for the deflation factors that were used for each industry.

Construction – Economic Impacts

Spending on the construction of the PECO LTIP Project is estimated to have a significant one-time economic impacts within the Study Area. The economic impacts were calculated using the RIMS II input/output model specific to this ten-county region. The Project is estimated to generate approximately \$335.7 million in total economic output within the Study Area, including \$160.7 million in direct and \$175.0 million in indirect and induced outputs. The economic activity will further support approximately 2,145 total model-derived jobs, including 1,020 direct jobs and 1,126 indirect and induced model-derived jobs, as well as approximately \$103.6 million in total earnings, including \$54.3 million in direct impacts and \$49.2 million in indirect and induced earnings (see Table 4.1).

Table 4.1: PECO LTIP Project Construction Period Economic Impacts

PECO LTIP Project	Storm Hardening and Resiliency Measures	Underground Cable Replacement	Building Substation Retirement	Total
Output				
Direct	\$69.5	\$81.9	\$9.3	\$160.7
Indirect and Induced	\$76.3	\$93.2	\$5.5	\$175.0
Total	\$145.7	\$175.1	\$14.9	\$335.7
Employment				
Direct	519	449	52	1,020
Indirect and Induced	480	581	65	1,126
Total	998	1,030	117	2,145
Earnings				
Direct	\$23.3	\$27.9	\$3.2	\$54.3
Indirect and Induced	\$21.0	\$25.4	\$2.9	\$49.2
Total	\$44.3	\$53.3	\$6.0	\$103.6

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

PECO LTIP Project EB-5 Eligible Employment Impacts

The construction of the PECO LTIP Project is estimated to have a significant one-time economic impact within the Study Area. As illustrated in Table 4.1, the construction



activities are estimated to generate a total of 2,145 jobs, of which only a certain portion is eligible for EB-5 purposes. The following tables detail the calculation of the EB-5 eligible portion of the 2,145 total jobs. The Job Study considers the three work streams comprising the Project separately.

Storm Hardening & Resiliency Measures

The following tables present the model-derived EB-5 eligible employment impacts of qualifying spending on Storm Hardening & Resiliency Measures during 2017-2020. These include spending in the project management, engineering, tree-trimming, and wholesale and trucking sectors. The wholesale and trucking impacts result from the spending on specialized materials and equipment. The employment impacts resulting from the materials and equipment spending are discussed separately (see page 49-57 of the Job Study).

Table 4.2: Estimated Total Employment Impacts Resulting from Spending on Storm Hardening & Resiliency Measures in 2017 (After April 30th)

Category ¹³	Direct Expenditures ¹⁴	Total Effect Employment Multipliers ¹⁵	Estimated Total Jobs ¹⁶
Project Management	\$1.7	12.434	21
Engineering and Design	\$1.5	13.705	20
Aerial Electrical Construction	\$4.0	12.434	50
Landscape Management	\$2.8	18.847	52
Wholesale	\$0.2	9.983	2
Trucking	\$0.1	12.220	1
Total	\$10.2		146

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

¹³ Please see Appendix I for the corresponding RIMS Industry and associated NAICS code for each spending category.

¹⁴ The RIMS II derived multipliers used in this analysis are based on 2015 data, as such all dollar values were deflated to their 2015 values before estimating the economic and employment impacts, as such, the dollar values in the Tables throughout this section are in 2015\$. Please see Appendix H for the deflation factors that were used for each industry

¹⁵ Please see Appendix I for the RIMS II industries assigned to each spending category.

¹⁶ The estimated total jobs were arrived at by multiplying the direct spending by the total effect employment multipliers. Using the construction spending as an example, the \$1.7 million in spending in the construction industry (NAICS 2300000) times 12.434 jobs per million dollars in spending results 21 total jobs. ($\$1.7 \times 12.434 = 21$).

Table 4.3: Estimated Total Direct and Indirect/Induced Employment Impacts Resulting from Storm Hardening & Resiliency Measures in 2017 (After April 30th)

Category	Total Jobs	Direct Effect Employment Multiplier	Estimated Direct Jobs ¹⁷	Estimated Indirect and Induced Jobs ¹⁸
Project Management	21	2.217	9	12
Engineering and Design	20	2.7533	7	13
Aerial Electrical Construction	50	2.217	23	27
Landscape Management	52	1.4891	35	17
Wholesale	2	2.5565	1	1
Trucking	1	2.4441	0	1
Total	146		75	71

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

Spending related to storm hardening and resiliency measures in 2017 is estimated to generate 146 total model-derived jobs, including 75 model-derived direct jobs and 71 model-derived indirect and induced jobs.

¹⁷ The direct jobs were arrived at by dividing the total number of jobs by the direct effect multiplier. Using the construction spending as an example, the \$1.7 million in spending in the construction industry (NAICS 2300000) supports 22 total jobs, which can be broken down into 9 direct jobs ($21 \text{ total jobs} / 2.247 = 9$)

¹⁸ The indirect and induced jobs were calculated by subtracting the direct jobs from the total jobs. Using the construction spending as an example, the \$1.7 million in spending in the construction industry (NAICS 2300000) supports 21 total jobs, which can be broken down into 9 direct jobs and 12 indirect and induced jobs ($21 \text{ total jobs} - 9 \text{ direct jobs} = 12 \text{ indirect and induced jobs}$).

Table 4.4: Estimated Total Employment Impacts Resulting from Spending on Storm Hardening & Resiliency Measures in 2018

Category	Direct Expenditures	Total Effect Employment Multipliers	Estimated Total Jobs
Project Management	\$2.8	12.434	35
Engineering and Design	\$2.8	13.705	38
Aerial Electrical Construction	\$8.3	12.434	104
Landscape Management	\$5.6	18.847	106
Wholesale	\$0.3	9.983	3
Trucking	\$0.1	12.220	1
Total	\$19.9		287

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

Table 4.5: Estimated Total Direct and Indirect/Induced Employment Impacts Resulting from Spending on Storm Hardening & Resiliency Measures in 2018

Category	Total Jobs	Direct Effect Employment Multiplier	Estimated Direct Jobs	Estimated Indirect and Induced Jobs
Project Management	35	2.217	16	19
Engineering and Design	38	2.7533	14	24
Aerial Electrical Construction	104	2.217	47	57
Landscape Management	106	1.4891	71	35
Wholesale	3	2.5565	1	2
Trucking	1	2.4441	1	0
Total	287		150	137

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

Spending related to storm hardening and resiliency measures in 2018 is estimated to generate 287 total model-derived jobs, including 150 model-derived direct jobs and 137 model-derived indirect and induced jobs.

Table 4.6: Estimated Total Employment Impacts Resulting from Spending on Storm Hardening & Resiliency Measures in 2019

Category	Direct Expenditures	Total Effect Employment Multipliers	Estimated Total Jobs
Project Management	\$2.7	12.434	34
Engineering and Design	\$2.8	13.705	38
Aerial Electrical Construction	\$8.2	12.434	103
Landscape Management	\$5.6	18.847	105
Wholesale	\$0.3	9.983	3
Trucking	\$0.1	12.220	1
Total	\$19.7		284

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

Table 4.7: Estimated Direct and Indirect/Induced Employment Impacts Resulting from Spending on Storm Hardening & Resiliency Measures in 2019

Category	Total Jobs	Direct Effect Employment Multiplier	Estimated Direct Jobs	Estimated Indirect and Induced Jobs
Project Management	34	2.217	15	19
Engineering and Design	38	2.7533	14	24
Aerial Electrical Construction	103	2.217	46	57
Landscape Management	105	1.4891	70	35
Wholesale	3	2.5565	1	2
Trucking	1	2.4441	1	0
Total	284		147	137

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

Spending related to storm hardening and resiliency measures in 2019 is estimated to generate 284 total model-derived jobs in 2019, including 147 model-derived direct jobs and 137 model-derived indirect and induced jobs.

Table 4.8: Estimated Total Direct Employment Impacts Resulting from Spending on Storm Hardening & Resiliency Measures in 2020

Category	Direct Expenditures	Total Effect Employment Multipliers	Estimated Total Jobs
Project Management	\$2.7	12.434	34
Engineering and Design	\$2.7	13.705	38
Aerial Electrical Construction	\$8.2	12.434	102
Landscape Management	\$5.5	18.847	104
Wholesale	\$0.3	9.983	3
Trucking	\$0.1	12.220	1
Total	\$19.6		282

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

Table 4.9: Estimated Direct and Indirect/Induced Employment Impacts Resulting from Spending on Storm Hardening & Resiliency Measures in 2020

Category	Total Jobs	Direct Effect Employment Multiplier	Estimated Direct Jobs	Estimated Indirect and Induced Jobs
Project Management	34	2.217	15	19
Engineering and Design	38	2.7533	14	24
Aerial Electrical Construction	102	2.217	46	56
Landscape Management	104	1.4891	70	34
Wholesale	3	2.5565	1	2
Trucking	1	2.4441	1	0
Total	282		147	135

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

Spending related to storm hardening and resiliency measures in 2019 is estimated to generate 282 model-derived total jobs in 2020, including 147 model-derived direct and 135 model-derived indirect and induced jobs.

Because only the hard-cost expenditures in the construction industry is expected to occur over the remaining 44-month construction period of the PECO LTIIP Project, the model-derived direct jobs included in the EB-5 calculations are derived solely from spending on project management, aerial electrical construction, and landscape management. For all other spending categories, ESI has included only the model-derived indirect and induced jobs as being eligible for EB-5 purposes. Table 4.10 summarizes the total model-derived direct employment impacts and Table 4.11 summarizes the total model-derived EB-5 eligible direct employment impacts.

Table 4.10: Summary of Total Model-Derived Direct Jobs Resulting from Spending on Storm Hardening & Resiliency Measures between 2017 and 2020

Category	2017	2018	2019	2020	Estimated Total Direct Jobs
Project Management	9	16	15	15	55
Engineering and Design	7	14	14	14	49
Aerial Electrical Construction	23	47	46	46	162
Landscape Management	35	71	70	70	246
Wholesale	1	1	1	1	4
Trucking	0	1	1	1	3
Total	75	150	147	147	519

Source: Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

Table 4.11: Summary of Total Model-Derived EB-5 Eligible Direct Jobs Resulting from Spending on Storm Hardening & Resiliency Measures between 2017-2020

Category	2017	2018	2019	2020	Estimated Total Direct Jobs
Project Management	9	16	15	15	55
Engineering and Design	N/A	N/A	N/A	N/A	N/A
Aerial Electrical Construction	23	47	46	46	162
Landscape Management	35	71	70	70	246
Wholesale	N/A	N/A	N/A	N/A	N/A
Trucking	N/A	N/A	N/A	N/A	N/A
Total	67	134	131	131	463

Source: Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

Table 4.12: Summary of Total Model-Derived EB-5 Eligible Indirect and Induced Jobs Resulting from Spending on Storm Hardening & Resiliency Measures between 2017-2020

Category	2017	2018	2019	2020	Estimated Total EB-5 Eligible Indirect/Induced Jobs
Project Management	12	19	19	19	69
Engineering and Design	13	24	24	24	85
Aerial Electrical Construction	27	57	57	56	197
Landscape Management	17	35	35	34	121
Wholesale	1	2	2	2	7
Trucking	1	0	0	0	1
Total	71	137	137	135	480

Source: Econsult Solutions, Inc. (2017)
Totals may not sum due to rounding

All told, the implementation of the storm hardening and resiliency measures is estimated to result in a total of **611 model-derived EB-5 eligible jobs** (Table 4.13). To remain conservative, ESI has included in this total the lower number of the direct jobs that are expected to be generated during the next full two-year period of the Project (131 EB-5 eligible direct jobs in 2019)

Table 4.13: Summary of Total Model-Derived EB-5 Eligible Jobs Resulting from Spending on Storm Hardening & Resiliency Measures between 2017 and 2020

	Total Jobs	EB-5 Eligible Jobs
Direct Jobs	519	131
Indirect and Induced Jobs	480	480
Total Impact	998	611

Source: BEA (2017) and Econsult Solutions, Inc. (2017)
Totals may not sum due to rounding

Underground Cable Replacement

In the following tables we present the model-derived EB-5 eligible employment impacts of qualifying spending related to Underground Cable Replacement from 2017-2020. These

include spending in the project management, construction, engineering, and wholesale and trucking sectors. The wholesale and trucking impacts result from the spending on specialized materials and equipment. We consider the employment impacts resulting from the material and equipment spending separately (see pages 49-57 of the Job Study).

Table 4.14: Estimated Total Employment Impacts Resulting from Spending on Underground Cable Replacements in 2017 (After April 30th)

Category	Direct Expenditures	Total Effect Employment Multipliers	Estimated Total Jobs
Project Management	\$2.5	12.434	31
Engineering and Design	\$2.5	13.705	34
Underground Electrical Construction	\$3.8	12.434	47
Civil Construction	\$6.1	12.434	76
Wholesale	\$0.2	9.983	2
Trucking	\$0.1	12.220	1
Total	\$15.2		191

Source: BEA (2017) and Econsult Solutions, Inc. (2017)
 Totals may not sum due to rounding

Table 4.15: Estimated Total Direct and Indirect/Induced Employment Impacts Resulting from Spending on Underground Cable Replacements in 2017 (After April 30th)

Category	Total Jobs	Direct Effect Employment Multiplier	Estimated Direct Jobs	Estimated Total Indirect and Induced Jobs
Project Management	31	2.217	14	17
Engineering and Design	34	2.753	12	22
Underground Electrical Construction	47	2.217	21	26
Civil Construction	76	2.217	34	42
Wholesale	2	2.557	1	1
Trucking	1	2.444	0	1
Total	191		82	109

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

Spending related to underground cable replacements in 2017 is estimated to generate 191 total model-derived jobs in 2017, including 82 model-derived direct jobs and 109 model-derived indirect and induced jobs.

Table 4.16: Estimated Total Employment Impacts Resulting from Spending on Underground Cable Replacements in 2018

Category	Direct Expenditures	Total Effect Employment Multipliers	Estimated Total Jobs
Project Management	\$3.4	12.434	42
Engineering and Design	\$3.4	13.705	47
Underground Electrical Construction	\$6.8	12.434	85
Civil Construction	\$10.2	12.434	127
Wholesale	\$0.3	9.983	3
Trucking	\$0.1	12.220	2
Total	\$24.3		306

Source: BEA (2017) and Econsult Solutions, Inc. (2017)
Totals may not sum due to rounding

Table 4.17: Estimated Total Direct and Indirect/Induced Employment Impacts Resulting from Spending on Underground Cable Replacements in 2018

Category	Total Jobs	Direct Effect Employment Multiplier	Estimated Direct Jobs	Estimated Total Indirect and Induced Jobs
Project Management	42	2.217	19	23
Engineering and Design	47	2.753	17	30
Underground Electrical Construction	85	2.217	38	47
Civil Construction	127	2.217	57	70
Wholesale	3	2.557	1	2
Trucking	2	2.444	1	1
Total	306		133	173

Source: BEA (2017) and Econsult Solutions, Inc. (2017)
Totals may not sum due to rounding

Spending related to underground cable replacements in 2018 is estimated to generate 306 total model-derived jobs in 2018, including 133 model-derived direct jobs and 173 model-derived indirect and induced jobs.

Table 4.18: Estimated Total Employment Impacts Resulting from Spending on Underground Cable Replacements in 2019

Category	Direct Expenditures	Total Effect Employment Multipliers	Estimated Total Jobs
Project Management	\$3.1	12.434	38
Engineering and Design	\$3.1	13.705	42
Underground Electrical Construction	\$6.2	12.434	76
Civil Construction	\$9.2	12.434	115
Wholesale	\$0.3	9.983	3
Trucking	\$0.1	12.220	1
Total	\$22.0		275

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

Table 4.19: Estimated Total Direct and Indirect/Induced Employment Impacts Resulting from Spending on Underground Cable Replacements in 2019

Category	Total Jobs	Direct Effect Employment Multiplier	Estimated Direct Jobs	Estimated Total Indirect and Induced Jobs
Project Management	38	2.217	17	21
Engineering and Design	42	2.753	15	27
Underground Electrical Construction	76	2.217	35	41
Civil Construction	115	2.217	52	63
Wholesale	3	2.557	1	2
Trucking	1	2.444	1	0
Total	275		121	154

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

Spending related to underground cable replacements in 2019 is estimated to generate 275 total model-derived jobs in 2019, including 121 model-derived direct jobs and 154 model-derived indirect and induced jobs.

Table 4.20: Estimated Total Employment Impacts Resulting from Spending on Underground Cable Replacements in 2020

Category	Direct Expenditures	Total Effect Employment Multipliers	Estimated Total Jobs
Project Management	\$2.9	12.434	36
Engineering and Design	\$2.9	13.705	40
Underground Electrical Construction	\$5.7	12.434	71
Civil Construction	\$8.6	12.434	107
Wholesale	\$0.3	9.983	3
Trucking	\$0.1	12.220	1
Total	\$20.4		258

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

Table 4.21: Estimated Total Direct and Indirect/Induced Employment Impacts from Spending on Underground Cable Replacements in 2020

Category	Total Jobs	Direct Effect Employment Multiplier	Estimated Direct Jobs	Estimated Total Indirect and Induced Jobs
Project Management	36	2.217	16	20
Engineering and Design	40	2.753	14	26
Underground Electrical Construction	71	2.217	32	39
Civil Construction	107	2.217	48	59
Wholesale	3	2.557	1	2
Trucking	1	2.444	1	0
Total	258		112	146

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

Spending related to underground cable replacements in 2020 is estimated to generate 258 total model-derived jobs in 2020, including 112 model-derived direct and 146 model-derived indirect and induced jobs.

Because only the hard-cost expenditures in the construction industry is expected to occur over the remaining 44-month construction period of the Project, the model-derived direct

jobs included in the EB-5 calculations are derived solely from spending on project management, underground electrical construction, and civil construction. For all other spending categories, ESI has included only the model-derived indirect and induced jobs as being eligible for EB-5 purposes. Table 4.22 summarizes the total model-derived direct employment impacts and Table 4.23 summarizes the total model-derived EB-5 eligible employment impacts.

Table 4.22: Summary of Total Model-derived Direct Jobs Resulting from Spending on Underground Cable Replacements Between 2017-2020

Category	2017	2018	2019	2020	Total
Project Management	14	19	17	16	66
Engineering and Design	12	17	15	14	58
Underground Electrical Construction	21	38	35	32	126
Civil Construction	34	57	52	48	191
Wholesale	1	1	1	1	4
Trucking	0	1	1	1	3
Total	82	133	121	112	448

Source: Econsult Solutions, Inc. (2017)
Totals may not sum due to rounding

Table 4.23: Summary of Total Model-derived EB-5 Eligible Direct Jobs Resulting from Underground Cable Replacements Between 2017-2020

Category	2017	2018	2019	2020	Estimated Total Direct Jobs
Project Management	14	19	17	16	66
Engineering and Design	N/A	N/A	N/A	N/A	N/A
Underground Electrical Construction	21	38	35	32	126
Civil Construction	34	57	52	48	191
Wholesale	N/A	N/A	N/A	N/A	N/A
Trucking	N/A	N/A	N/A	N/A	N/A
Total	69	114	104	96	383

Source: Econsult Solutions, Inc. (2017)
Totals may not sum due to rounding

Table 4.24: Summary of Total Model-derived EB-5 Eligible Indirect and Induced Jobs Resulting from Spending on Underground Cable Replacements between 2017-2020

Category	2017	2018	2019	2020	Estimated Total EB-5 Eligible Indirect/Induced Jobs
Project Management	17	23	21	20	81
Engineering and Design	22	30	27	26	105
Underground Electrical Construction	26	47	41	39	153
Civil Construction	42	70	63	59	234
Wholesale	1	2	2	2	7
Trucking	1	1	0	0	2
Total	109	173	154	146	582

Source: Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

All told, the implementation of the underground cable replacements is estimated to generate **686 model-derived EB-5 eligible jobs** (Table 4.25). To remain conservative, ESI has included this total the lower number of the direct jobs that are expected to be generated during the next full two-year period of the Project (104 EB-5 eligible direct jobs in 2019) for EB-5 job creation purposes.

Table 4.25: Estimated Total Model-Derived EB-5 Eligible Jobs Resulting from Spending on Underground Cable Replacements between 2017-2020

	Total Jobs	EB-5 Eligible Jobs
Direct Jobs	449	104
Indirect and Induced Jobs	582	582
Total Impact	1,031	686

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

Building Substation Retirement

The following tables present the model-derived EB-5 eligible employment impacts related to qualifying spending on Building Substation Retirement during 2019-2020.¹⁹ These include spending in the project management, construction, engineering, and wholesale and trucking sectors. The wholesale and trucking impacts result from the spending on specialized materials and equipment. We consider the employment impacts resulting from the material and equipment spending separately (see pages 49-57 of the Job Study).

Table 4.26: Estimated Total Employment Impacts Resulting from Spending on Building Substation Retirement in 2019

Category	Direct Expenditures	Total Effect Employment Multipliers	Estimated Total Jobs
Project Management	\$0.0	12.434	1
Engineering and Design	\$0.2	13.705	3
Substation Construction	\$0.0	12.434	1
Aerial Electrical Construction	\$0.1	12.434	1
Underground Electrical Construction	\$0.1	12.434	1
Civil Construction	\$0.1	12.434	1
Wholesale	\$0.0	9.983	0
Trucking	\$0.0	12.220	0
Total	\$0.6		8

Source: BEA (2017) and Econsult Solutions, Inc. (2017)
 Totals may not sum due to rounding

¹⁹ Because spending on building substation retirement is not expected to start until 2019, there are no employment impacts generated in 2017 and 2018.

Table 4.27: Estimated Total Direct and Indirect/Induced Employment Impacts Resulting from Spending on Building Substation Retirement in 2019

Category	Total Jobs	Direct Effect Employment Multiplier	Estimated Direct Jobs	Estimated Total Indirect and Induced Jobs
Project Management	1	2.217	0	1
Engineering and Design	3	2.753	1	2
Substation Construction	1	2.217	0	1
Aerial Electrical Construction	1	2.217	0	1
Underground Electrical Construction	1	2.217	0	1
Civil Construction	1	2.217	0	1
Wholesale	0	2.557	0	0
Trucking	0	2.444	0	0
Total	8		1	7

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

Spending related to building substation retirement in 2019 is estimated to generate 8 total model-derived jobs in 2019, including 1 model-derived direct job and 7 model-derived indirect and induced jobs.

Table 4.28: Estimated Total Employment Impacts Resulting from Spending on Building Substation Retirement in 2020

Category	Direct Expenditures	Total Effect Employment Multipliers	Estimated Total Jobs
Project Management	\$0.6	12.434	7
Engineering and Design	\$0.6	13.705	8
Substation Construction	\$1.7	12.434	21
Aerial Electrical Construction	\$2.3	12.434	28
Underground Electrical Construction	\$2.3	12.434	28
Civil Construction	\$1.1	12.434	14
Wholesale	\$0.1	9.983	1
Trucking	\$0.0	12.220	0
Total	\$8.7		107

Source: BEA (2017) and Econsult Solutions, Inc. (2017)
Totals may not sum due to rounding

Table 4.29: Estimated Total Direct and Indirect/Induced Employment Resulting from Spending on Building Substation Retirement in 2020

	Total Jobs	Direct Effect Employment Multiplier	Estimated Direct Jobs	Estimated Total Indirect and Induced Jobs
Project Management	7	2.217	3	4
Engineering and Design	8	2.753	3	5
Substation Construction	21	2.217	9	12
Aerial Electrical Construction	28	2.217	13	15
Underground Electrical Construction	28	2.217	13	15
Civil Construction	14	2.217	6	8
Wholesale	1	2.557	0	1
Trucking	0	2.444	0	0
Total	107		47	60

Source: BEA (2017) and Econsult Solutions, Inc. (2017)
Totals may not sum due to rounding

Spending related to building substation retirement in 2020 is estimated to generate 107 total model-derived jobs in 2020, including 47 model-derived direct jobs and 60 model-derived indirect and induced jobs.

Table 4.30: Summary of Total Model-derived Direct Jobs Resulting from Spending on Building Substation Retirement between 2019-2020

Category	2017	2018	2019	2020	Total
Project Management	N/A	N/A	0	3	3
Engineering and Design	N/A	N/A	1	3	4
Substation Construction	N/A	N/A	0	9	9
Aerial Electrical Construction	N/A	N/A	0	13	13
Underground Electrical Construction	N/A	N/A	0	13	13
Civil Construction	N/A	N/A	0	6	6
Wholesale	N/A	N/A	0	0	0
Trucking	N/A	N/A	0	0	0
Total	N/A	N/A	1	47	48

Source: Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

Table 4.31 Estimated Total Model-derived EB-5 Eligible Indirect and Induced Jobs Resulting from Spending on Building Substation Retirement between 2019-2020

Category	2017	2018	2019	2020	Total
Project Management	N/A	N/A	1	4	5
Engineering and Design	N/A	N/A	2	5	7
Substation Construction	N/A	N/A	1	12	13
Aerial Electrical Construction	N/A	N/A	1	15	16
Underground Electrical Construction	N/A	N/A	1	15	16
Civil Construction	N/A	N/A	1	8	9
Wholesale	N/A	N/A	0	1	1
Trucking	N/A	N/A	0	0	0
Total	N/A	N/A	7	60	67

Source: Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

All told, the implementation of the building substation retirement is estimated to generate **67 model-derived EB-5 eligible jobs** (Table 4.32).

Table 4.32: Estimated Total Model-Derived EB-5 Eligible Jobs Resulting from Spending on Building Substation Retirement between 2019-2020

	Total Jobs	EB-5 Eligible Jobs
Direct Jobs	48	0
Indirect and Induced Jobs	67	67
Total Impact	115	67

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

Construction Summary

Table 4.33 summarizes the total model-derived direct employment impacts and Table 4.34 summarizes the total EB-5 eligible model-derived direct employment impacts. The EB-5 eligible model-derived direct employment impacts range from 138 in 2017 to 253 in 2018. For the purposes of estimating the EB-5 eligible model-derived employment impacts, ESI used the minimum value over the 2018-2020 period. Accordingly, ESI

excluded employment impacts from the remainder of the spending in 2017 due to the fact that spending does not cover the entire year.

Table 4.33: Total Estimated Model-derived Direct Jobs Resulting from Expenditures Anticipated to be incurred by the PECO LTIP Project

PECO LTIP Project Work Streams	2017	2018	2019	2020	Total
Storm Hardening and Resiliency	75	150	147	147	519
Underground Cable Replacement	82	133	121	112	448
Building Substation Retirement	0	0	1	47	48
Total	157	283	269	306	1,015

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

Table 4.34: Total Estimated Model-Derived EB-5 Eligible Direct Jobs Resulting from Expenditures Anticipated to be incurred by the PECO LTIP Project

PECO LTIP Project Work Streams	2017	2018	2019	2020	Total
Storm Hardening and Resiliency	67	134	131	131	463
Underground Cable Replacement	69	114	104	96	383
Building Substation Retirement	0	0	0	0	0
Total	136	248	235	227	846

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

Because the remaining 44-month construction period of the PECO LTIP Project exceeds the 24-month threshold for the inclusion of model-derived direct jobs in accordance with USCIS policy, ***the model-derived direct and indirect and induced employment impacts associated with the spending in the construction industry are eligible for EB-5 purposes.***

Furthermore, because only the hard-cost spending in the construction industry is expected to occur over the remaining 44-month construction period, the Job Study

conservatively includes only the minimum number of EB-5 eligible model-derived direct jobs that will be generated during the next two full years of the project (2018-2019), as this represents the likely number of model-derived direct jobs that will exist during a full 24-month period of the Project. This results in **235 EB-5 eligible model-derived direct jobs** resulting from the construction of the Project.

For all other Project spending, ESI only includes the model-derived indirect and induced jobs as being eligible for EB-5 purposes. In this regard, Table 4.35 reflects that the construction of the Project is estimated to generate a total of **1,129 EB-5 eligible model-derived indirect and induced jobs**.

Table 4.35: Total Estimated Model-Derived EB-5 Eligible Indirect and Induced Jobs Resulting from Expenditures Anticipated to be Incurred by the PECO LTIP Project

	2017	2018	2019	2020	Total
Storm Hardening and Resiliency	71	137	137	135	480
Underground Cable Replacement	109	173	154	146	582
Building Substation Retirement	0	0	7	60	67
Total	180	310	298	341	1,129

Source: BEA (2017) and Econsult Solutions, Inc. (2017)
 Totals may not sum due to rounding

Overall, the construction and design/engineering of the Project is estimated to generate a total of 2,145 model-derived jobs, of which **1,365 model-derived jobs are eligible for EB-5 purposes**. This includes 236 model-derived direct jobs and 1,129 model-derived indirect and induced jobs.

Table 4.36: Total Estimated Model-Derived EB-5 Eligible Jobs Resulting from the Construction of the PECO LTIP Project

	Total Jobs	EB-5 Eligible Jobs
Direct Jobs	1,015	236
Indirect and Induced Jobs	1,129	1,129
Total Impact	2,144	1,365

Source: BEA (2017) and Econsult Solutions, Inc. (2017)
 Totals may not sum due to rounding

MATERIALS SPENDING

In addition to construction-related spending, the Project will also include spending on materials and equipment. This includes spending on electrical wire, precast concrete manhole and electrical ducts, electrical conduit, transformers, switchgear, and other electrical devices and wooden telephone poles. Please see Appendix G for a breakdown of the materials and equipment spending by work stream, spending category, and year.

The procurement of materials and equipment associated with the Project is estimated to have a significant one-time economic impact within the Study Area and the remainder of the United States. The economic impacts were calculated using the RIMS II input/output model specific to this region. The spending on materials and equipment is estimated to generate approximately \$95.5 million in total economic output within the Study Area, including \$42.8 million in direct and \$52.7 million in indirect and induced outputs. The economic activity will further support 353 total model-derived jobs, including 111 direct jobs and 242 indirect and induced model-derived jobs, as well as approximately \$13.4 million in total earnings, including \$4.2 million in direct impacts and \$9.2 million in indirect and induced earnings (see Table 4.37).

Table 4.37: Material and Equipment Procurement Economic Impacts

	Materials and Equipment
Output	
Direct	\$42.8
Indirect and Induced	\$52.7
Total	\$95.5
Employment	
Direct	111
Indirect and Induced	242
Total	353
Wages	
Direct	\$4.2
Indirect and Induced	\$9.2
Total	\$13.4

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

Some of these components may be manufactured outside of the Study Area, but nevertheless within the United States. In such instances, the USCIS has agreed to count the jobs indirectly created outside of the geographical boundaries of the Regional

Center.²⁰ **For the purpose of this analysis, only the indirect/induced jobs were counted towards the EB-5 eligible jobs.**

EB-5 Eligible Employment Impacts of Spending on Materials and Equipment

The procurement of materials and equipment associated with the Project is estimated to have a significant one-time economic impact within the Study Area and the remainder of the United States. As illustrated in Table 4.37 above, the manufacturing of the materials and equipment is estimated to generate a total of 353 jobs, of which only a certain portion is eligible for EB-5 purposes. The following tables detail the calculations of the EB-5 eligible portion of the 353 total jobs.

Table 4.38: Estimated Total Employment Impacts Resulting from Procurement of Materials and Equipment in 2017 (After April 30th)

Category ²¹	Direct Expenditures	Total Effect Employment Multipliers	Estimated Total Jobs
Electrical Wire and Cable	\$5.0	8.439	42
Ducts/Manholes			
Manholes and Electrical Ducts	\$0.2	9.009	2
Electrical Conduits	\$0.5	8.798	4
Electrical Equipment			
Transformers	\$0.4	8.028	3
Switchgear	\$0.6	7.116	4
Wiring Device	\$0.8	7.927	6
Electrical Poles	\$0.3	7.563	2
Total	\$7.8		63

Source: BEA (2017) and Econsult Solutions, Inc. (2017)
 Totals may not sum due to rounding

²⁰ The justification for counting the indirect and induced jobs associated with manufacturing of the materials and equipment used in the Project is as follows: "The regulation at 8 CFR 204.6.(m) provides that ...each regional center wishing to participate in the Immigrant Investor Pilot program shall submit a proposal which...contains a detailed prediction regarding the manner in which the regional center will have a positive impact on the regional or *national economy* in general as reflected by such factors as increased household earnings, greater demand for business services, utilities, maintenance and repair, and construction *both within and without the regional center*" (emphasis added).

²¹ Please see Appendix I for the corresponding RIMS Industry and associated NAICS code for each spending category

Table 4.39: Estimated Total Direct and Indirect/Induced Employment Impacts Resulting from Procurement of Materials and Equipment in 2017 (After April 30th)

	Total Jobs	Direct Effect Employment Multiplier	Estimated Direct Jobs	Estimated Total Indirect and Induced Jobs
Electrical Wire and Cable	42	3.545	12	30
Ducts/Manholes				
Manholes and Electrical Ducts	2	2.420	1	1
Electrical Conduits	4	2.770	1	3
Electrical Equipment				
Transformers	3	2.753	1	2
Switchgear	4	3.194	1	3
Wiring Device	6	2.505	2	4
Electrical Poles	2	2.131	1	1
Total	63		19	44

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

The materials and equipment spending in 2017 is estimated to generate 63 total model-derived jobs in 2017, including 19 model-derived direct jobs and 44 model-derived indirect and induced jobs.

Table 4.40: Estimated Total Employment Impacts Resulting from Procurement of Materials and Equipment in 2018

Category	Direct Expenditures	Total Effect Employment Multipliers	Estimated Total Jobs
Electrical Wire and Cable	\$7.5	8.439	63
Ducts/Manholes			
Manholes and Electrical Ducts	\$0.3	9.009	3
Electrical Conduits	\$0.7	8.798	6
Electrical Equipment			
Transformers	\$0.6	8.028	5
Switchgear	\$0.8	7.116	6
Wiring Device	\$1.2	7.927	10
Electrical Poles	\$0.5	7.563	4
Total	\$11.6		97

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

Table 4.41: Estimated Total Direct and Indirect/Induced Employment Impacts Resulting from Procurement of Materials and Equipment in 2018

Category	Total Jobs	Direct Effect Employment Multiplier	Estimated Direct Jobs	Estimated Total Indirect and Induced Jobs
Electrical Wire and Cable	63	3.545	18	45
Ducts/Manholes				
Manholes and Electrical Ducts	3	2.420	1	2
Electrical Conduits	6	2.770	2	4
Electrical Equipment				
Transformers	5	2.753	2	3
Switchgear	6	3.194	2	4
Wiring Device	10	2.505	4	6
Electrical Poles	4	2.131	2	2
Total	97		31	66

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

The materials and equipment spending in 2018 is estimated to generate 97 total model-derived jobs in 2018, including 31 model-derived direct jobs and 66 model-derived indirect and induced jobs.

Table 4.42: Estimated Total Employment Impacts Resulting from Procurement of Materials and Equipment in 2019

Category	Direct Expenditures	Total Effect Employment Multipliers	Estimated Total Jobs
Electrical Wire and Cable	\$7.2	8.439	61
Ducts/Manholes			
Manholes and Electrical Ducts	\$0.3	9.009	3
Electrical Conduits	\$0.6	8.798	5
Electrical Equipment			
Transformers	\$0.6	8.028	5
Switchgear	\$0.8	7.116	6
Wiring Device	\$1.2	7.927	9
Electrical Poles	\$0.5	7.563	4
Total	\$11.2		93

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

Table 4.43: Estimated Total Direct and Indirect/Induced Employment Impacts Resulting from Procurement of Materials and Equipment in 2019

Category	Total Jobs	Direct Effect Employment Multiplier	Estimated Direct Jobs	Estimated Indirect and Induced Jobs
Electrical Wire and Cable	61	3.545	17	44
Ducts/Manholes				
Manholes and Electrical Ducts	3	2.420	1	2
Electrical Conduits	5	2.770	2	3
Electrical Equipment				
Transformers	5	2.753	2	3
Switchgear	6	3.194	2	4
Wiring Device	9	2.505	4	5
Electrical Poles	4	2.131	2	2
Total	93		30	63

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

The materials and equipment spending in 2019 is estimated to generate 93 total model-derived jobs in 2019, including 30 model-derived direct jobs and 63 model-derived indirect and induced jobs.

Table 4.44: Estimated Total Employment Impacts Resulting from Procurement of Materials and Equipment in 2020

Category	Direct Expenditures	Total Effect Employment Multipliers	Estimated Total Jobs
Electrical Wire and Cable	\$7.9	8,439	67
Ducts/Manholes			
Manholes and Electrical Ducts	\$0.3	9,009	2
Electrical Conduits	\$0.6	8,798	5
Electrical Equipment			
Transformers	\$0.6	8,028	5
Switchgear	\$1.0	7,116	7
Wiring Device	\$1.4	7,927	11
Electrical Poles	\$0.5	7,563	4
Total	\$12.2		101

Source: BEA (2017) and Econsult Solutions, Inc. (2017)
Totals may not sum due to rounding

Table 4.45: Estimated Total Direct and Indirect/Induced Employment Impacts Resulting from Procurement of Materials and Equipment in 2020

	Total Jobs	Direct Effect Employment Multiplier	Estimated Direct Jobs	Estimated Indirect and Induced Jobs
Electrical Wire and Cable	67	3.545	19	48
Ducts/Manholes				
Manholes and Electrical Ducts	2	2.420	1	1
Electrical Conduits	5	2.770	2	3
Electrical Equipment				
Transformers	5	2.753	2	3
Switchgear	7	3.194	2	5
Wiring Device	11	2.505	4	7
Electrical Poles	4	2.131	2	2
Total	101		32	69

Source: BEA (2017) and Econsult Solutions, Inc. (2017)
Totals may not sum due to rounding

The material and equipment spending in 2020 is estimated to generate 101 total model-derived jobs in 2020, including 32 model-derived direct and 69 model-derived indirect and induced jobs.

Overall, the construction of the Project is estimated to generate a total of 316 model-derived jobs, of which **242 model-derived jobs are eligible for EB-5 purposes.**

Table 4.46: Summary of Total Model-Derived EB-5 Eligible Jobs Resulting from Procurement of Materials and Equipment

	Total Direct Jobs	EB-5 Eligible Direct Jobs	Indirect and Induced Jobs	Total EB-5 Eligible Jobs
2017	20	0	44	44
2018	30	0	66	66
2019	29	0	63	63
2020	32	0	69	69
Total	111	0	242	242

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Totals may not sum due to rounding

EB-5 ELIGIBLE EMPLOYMENT IMPACTS

In sum, it is estimated that the development of the PECO LTIIP Project will have positive and significant economic and job creation impacts. All told, the Project is estimated to generate **1,606 total model-derived EB-5 eligible jobs, including 235 model-derived direct jobs and 1,371 model-derived indirect and induced jobs**, which would qualify the Project for up to \$80.3 million in EB-5 financing (see Table 4.47 and Table 4.48).

Table 4.47: Total Model-Derived EB-5 Eligible Job Creation Impacts from All Commercial Activities Resulting from the Construction & Material and Equipment Procurement Associated with the PECO LITIP Project

	EB-5 Eligible Direct Jobs	EB-5 Eligible Indirect and Induced Jobs	Total EB-5 Eligible Jobs
Development Activities	235	1,129	1,364
Materials and Equipment Expenditures	0	242	242
Total	235	1,371	1,606

Source: Econsult Solutions, Inc. (2017)

Table 4.48: EB-5 Financing Available from Employment Impact from All Commercial Activities Resulting from the Construction & Material and Equipment Procurement Associated with the PECO LTIP Project

	Total EB-5 Eligible Jobs	EB-5 Financing Available per 10 Jobs	EB-5 Financing Available
Development Activities	1,364	\$500,000	\$68.2 million
Materials and Equipment Expenditures	242	\$500,000	\$21.1 million
Total	1,606		\$80.3 million

Source: Econsult Solutions, Inc. (2017)
 Totals may not sum due to rounding



5.0 DEMONSTRATION OF OPERATIONAL FEASIBILITY AND NET-NEW JOB CREATION

OVERVIEW

The purpose of this section is twofold. First, it is to demonstrate that the proposed commercial activities are feasible, which is to say that they will actually occur at the levels anticipated by the applicant. Second, it is to say that the total employment they support is net-new in nature, which is to say that it absorbs new demand and thus represents new job creation, and does not represent a shifting of existing demand and therefore of existing jobs. This is an important consideration for the USCIS, because if the proposed commercial activities do not actually come to pass or if they absorb demand simply by shifting it away from existing supply, then no net new jobs will have actually been created. Therefore, it is important to provide some demonstration of operational feasibility and net new job creation.

THE FEASIBILITY OF THE PROJECT

Typically, an EB-5 applicant is seeking financing in support of either a new real estate development or an infrastructure investment or some other expenditure that will increase the scale of an existing business. In these cases, demonstration of operational feasibility and net new job creation depend on marshaling evidence that there is sufficient demand in the marketplace to sustain the new development or the expanded business and therefore generate sufficient employment impact to support the EB-5 financing.

Since it is impossible to predict the future, there will always be uncertainty about operational feasibility and net new job creation. Even if one makes as defensible a case as possible with as much compelling evidence as is available, questions still linger: will the new development or investment attract sufficient demand, and is there sufficient demand such that the success of the new development or investment does not come at the expense of decreases in business activity from existing businesses?

PECO is Pennsylvania's largest electric and natural gas utility delivering power to more than 1.6 million electricity customers and more than 511,000 natural gas customers throughout a 2,100 square-mile authorized service territory in southeastern Pennsylvania. PECO is classified as a "public utility" subject to regulation and oversight by state and federal authorities. As a public utility PECO filed a petition for approval of their LTIIP with the Pennsylvania Public Utility Commission (PAPUC).

PECO also petitioned the PAPUC for approval of Distribution System Improvement Charge (DSIC) to provide the timely recovery of the reasonable and sensible costs associated with LTIIP. The DSIC provides PECO with a means to generate funds to pay

for the projects associated with the LTIP. Both the LTIP and DSIC were approved by the PAPUC in 2015.

Since the LTIP and the associated DSIC was approved by the PAPUC, PECO is required to complete all elements of the LTIP within the timeframe specified. The approval of the petition for the LTIP and DSIC by the PAPUC will help ensure that all of the projects are completed in the specified timeframe. This provides further assurance that the spending that is analyzed in this report, and the resulting jobs impacts, occur at the levels anticipated in this report.

HIGH PROBABILITY OF NET NEW JOB CREATION VIA ANALYSIS OF EMPLOYMENT LEVELS

While employment in the Study Area, the Philadelphia region, and Pennsylvania has recovered from the Great Recession, the unemployment rate is still above the low unemployment levels witnessed in 2000 and 2007. In addition, the unemployment rate may not be accurately capturing those individuals who are unemployed and have given up looking for work. This suggests that there is likely a sufficient labor supply to absorb the labor required by the construction of the project. When unemployment levels are low, it is more likely that new labor demand results in people who are currently gainfully employed shifting into the newly available jobs. Conversely, when unemployment levels are high, it is more likely that new labor demand results in people who are currently not gainfully employed taking on the newly available jobs. Furthermore, when unemployment levels are high, even when people who are currently employed shift to a new job, they then create an opening that can be filled by someone who is currently unemployed.

Unemployment levels are still relatively high in study area, Philadelphia Region, and Pennsylvania; in that there are still a relatively large number of people who are in the labor force but unemployed (see Table 5.1). In Study Area, there are currently 162,800 individuals that are in the labor force and looking for work. As illustrated in Figure 5.1, in the study area, the unemployment rate has decreased in recent years, but it is still above the low unemployment rates of the 2000 when the unemployment rate of the study area was 3.8%, 3.9% in the Philadelphia Region, and 4.1% in Pennsylvania, and 4.4% in the study area.

As illustrated in Figure 5.2, employment in the construction industry in both the study area and Pennsylvania is well below the peak levels over the 2002 to 2016 period. In the Study Area, current construction industry employment is equal to 96% of employment in the sector in 2002 and in Pennsylvania employment is 94% of the 2002 level. Within in the Study Area construction sector employment peaked in 2006 at 121,000; current

sector employment is 107,000, or 88% of the peak employment level. This suggests that there is sufficient capacity within the sector to absorb the direct construction industry employment that will be generated by the Project.

Therefore, it is likely that the vast majority of jobs demanded by PECO's LTIP Project will go to someone who is currently unemployed, and that the vast majority of the remainder that do not will in turn create a new opening that can be filled by someone who is currently unemployed. Thus, the net new jobs created by the Project will in fact lead to a net increase in the number of individuals employed within the Study Area and Pennsylvania.

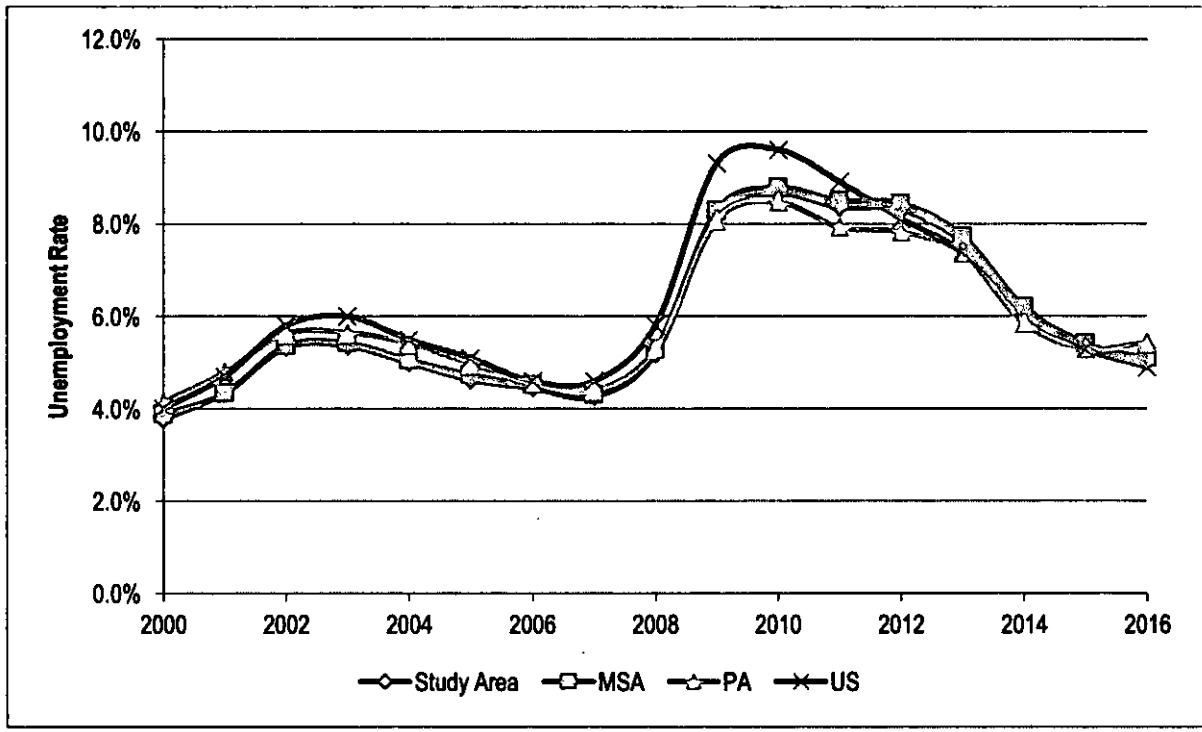
Table 5.1: Current Unemployment Levels within the Study Area, Philadelphia Region and Pennsylvania of the Project – 2016 Average

	# in Labor Force	# in Labor Force But Unemployed	Unemployment Rate
Study Area	3,228,890	162,803	5.0%
Philadelphia Region	3,091,548	157,425	5.1%
Pennsylvania	6,471,990	351,961	5.4%

Source: BLS (2017) and Econsult Solutions, Inc. (2017)

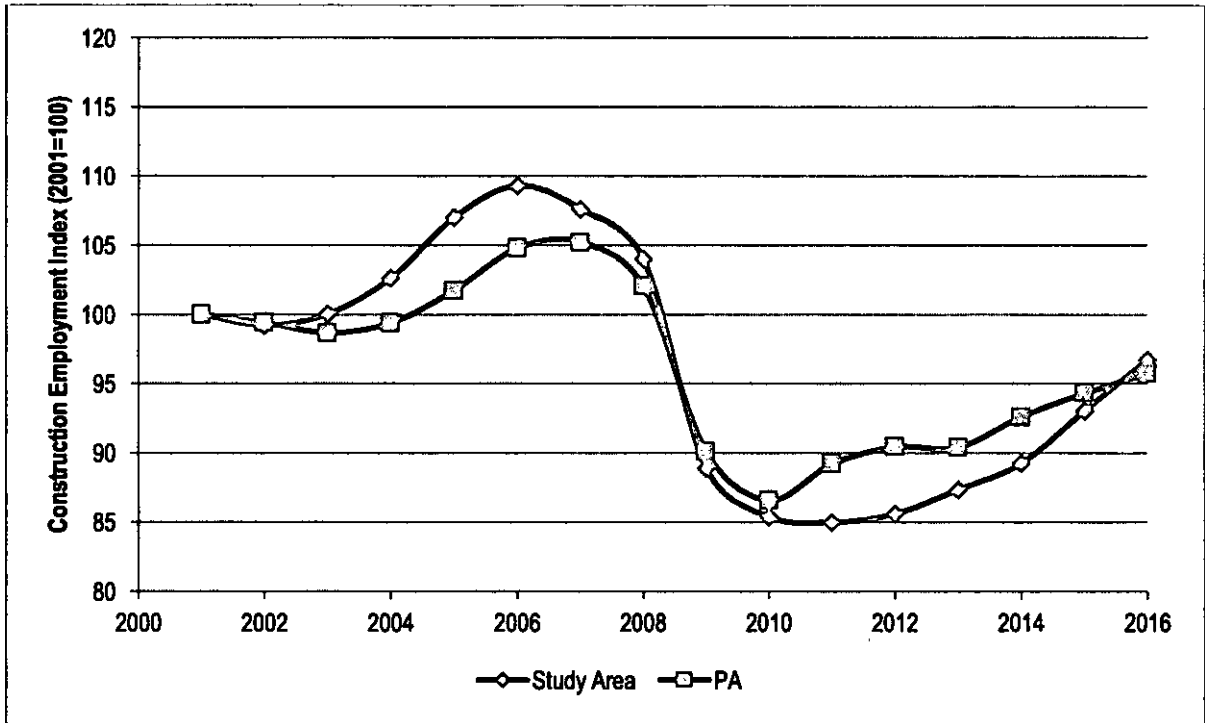


Figure 5.1: Study Area, Philadelphia Region, and Pennsylvania Unemployment Rate 2000-2016



Source: BLS (2017) and Econsult Solutions, Inc. (2017)

Figure 5.2: Study Area and Pennsylvania Construction Industry Employment 2000-2016



Source: BLS (2017) and Econsult Solutions, Inc. (2017)

CONCLUSIONS

Based on local economic conditions, it is clear that the vast majority of employment supported by the construction, and ongoing operations generated by the proposed project will indeed result in the creation of net-new jobs in the Study Area, the Philadelphia Region and Pennsylvania, and not simply a redistribution of existing employment activity.

APPENDIX A – ADDITIONAL DETAILS ON ECONSULT SOLUTIONS, INC.

ECONSULT SOLUTIONS, INC

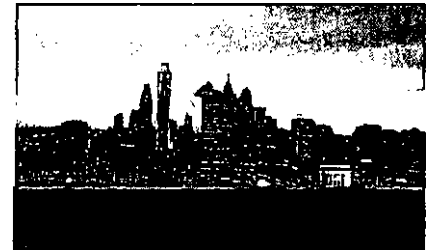
Economics, Policy, Strategy

Econsult Solutions, Inc. provides businesses and public policy makers with economic consulting services in urban economics, real estate economics, transportation, public infrastructure, development, public policy and finance, community and neighborhood development, planning, as well as litigation support.

Econsult Solutions has the capability to engage in projects of any size, from comprehensive long-term studies involving complicated economic arguments and extensive data analysis, to short-term advisory support. Whether working independently or on joint-venture projects, our flexibility and customized approach allow us to respond to a vast range of client needs.

Our scope is large, and our expertise specific. Econsult assists clients in the evaluation of economic and fiscal outcomes of programs and developments, offers city and regional planning insight and advice, provides GIS analytic services, yields financial projections and advises investors and governments on projects, developments, and policy outcomes, and has the economic skills and expertise to process, analyze and manage large and complex datasets.

Our Principals and Senior Advisors include nationally recognized experts in urban development, real estate, government and public policy, planning, transportation, non-profit management, business strategy and administration, as well as litigation and commercial damages. Staff members have outstanding credentials, including active positions at the university level, wide experience at the highest levels of the public policy process and extensive consulting experience.



Practice Areas:

- Public Policy and Finance
- Transportation
- Economic Development
- Real Estate

Technical Applications:

- Econometric and Statistical Analyses
- Economic and Fiscal Impact Analyses
- Expert Witness and Litigation Support
- Program and Project Evaluation
- Geospatial Analyses (GIS)
- Cost-Benefit Analyses
- Financial Analyses and Pro-Forma Modeling
- Statistical Analysis

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APPENDIX B – BIOGRAPHIES OF INDIVIDUALS RESPONSIBLE FOR THIS REPORT

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Daniel Miles, PhD
Vice President and Associate Principal

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Daniel Miles, PhD, is a Vice President and Associate Principal at Econsult Solutions, Inc. (ESI). At ESI, Dr. Miles leads economic analysis projects across a variety of sectors and industries. Prior to joining ESI, Dr. Miles was a Senior Economist in the New York office of Oxford Economics where he led a multinational team of economists based in New York, Belfast and London. His projects included estimating the economic impacts of laser fusion energy and the size and impacts of the Longevity Economy, analyzing the public/private partnership (PPP) policies of several Asian countries and developing a cigarette market and excise tax forecasting model of the Philippines. At Oxford Economics Daniel also worked closely with the Thought Leadership team where he was the lead economist on a wide range of projects, including estimating the economic impacts of mobility, data analytics and transformations in the manufacturing sector.

From 2008 to 2011, Daniel was an Associate at Econsult Corporation. During his time at the firm, Daniel contributed to a number of studies, including evaluating the financial feasibility and economic impact of using tolls to finance transportation infrastructure improvements, the preparation of an economic development plan for an older industrial city, estimating the economic value of permanently preserved open space, modeling the impact of changes in Philadelphia's business tax system, and estimating the economic impact of changes in stormwater billing methods of a major US city.

In 2011, Dr. Miles received his Ph.D. in Policy with a concentration in Economics from the University of Maryland, Baltimore County (UMBC) where his dissertation was focused in the area of land use economics. At UMBC, Daniel was supported by a prestigious National Science Foundation (NSF) IGERT Fellowship through the Center for Urban Environmental Research and Education (CUERE). Dr. Miles also received his Masters in Public Policy in Environmental Policy and a Certificate in Ecological Economics from the University of Maryland School Of Public Policy. Daniel earned his Bachelors in Political Science and Economics with honors from the University of Scranton.

EDUCATION

BS in Political Science and Economics, University of Scranton

Masters in Public Policy, University of Maryland

PhD in Public Policy, University of Maryland Baltimore County

AREAS OF EXPERTISE

Economics,
Economic Impact,
Real Estate Development
Economic Development,
Policy Analysis,
Spatial Analysis,
Statistics



APPENDIX C – ECONOMIC IMPACT MODEL THEORY

The methodology and input-output model used in this economic impact analysis are considered standard for estimating such expenditure impacts, and the results are typically recognized as reasonable and plausible effects based on the assumptions (including data) used to generate the impacts. In general, any economic activity can be described in terms of the total output generated from every dollar of direct expenditures. If an industry in a given region sells \$1 million of its goods, there is a direct infusion of \$1 million into the region. These are referred to as *direct expenditures*.

However, the economic impact on the region does not stop with that initial direct expenditure. Regional suppliers to that industry have also been called upon to increase their production to meet the needs of the industry to produce the \$1 million in goods sold. Further, suppliers of these same suppliers must also increase production to meet their increased needs as well. These are referred to as *indirect expenditures*. In addition, these direct and indirect expenditures require workers, and these workers must be paid for their labor. These wages and salaries will, in turn, be spent in part on goods and services produced locally, engendering another round of impacts. These are referred to as *induced expenditures*.

Direct expenditures are fed into a model constructed by Econsult Corporation and based on data provided by the US Department of Commerce's Bureau of Economic Analysis through its Regional Input-Output Modeling System (RIMS II). The model then produces a calculation of the total expenditure effect on the regional economy. This total effect includes the initial direct expenditure effect, as well as the ripple effects described, the indirect and induced expenditure effects.

Part of the total expenditure effect is actually the increase in total wages and salaries (usually referred to as earnings), which the model can separate from the expenditure estimates. Direct payroll estimates are fed into the "household" industry of the input-output model. Impacts of this industry are estimated using the personal consumption expenditure breakdown of the national input-output table and are adjusted to account for regional consumption spending and leakages from personal taxes and savings. The direct, indirect, and induced earnings represent a component of the total economic impact attributable to wages and salaries. Finally, the model calculates the total expenditures affecting the various

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industries and translates this estimate into an estimate of the total labor (or jobs) required to produce this output.²²

In short, the input-output model estimates the total economic activity in a region that can be attributed to the direct demand for the goods or services of various industries. This type of approach is used to estimate the total economic activity attributable to the expenditures associated with various types of spending in the region.

Box C.1: Glossary of Terms for Input-Output Models

Multiplier Effect – the notion that initial outlays have a ripple effect on a local economy, to the extent that direct output lead to indirect and induced output.

Economic Impacts – total expenditures, employment, and labor income generated.

Direct Output – initial outlays usually associated with the project or activity being modeled; examples: one-time upfront construction and related expenditures associated with a new or renovated facility, annual expenditures associated with ongoing facility maintenance and/or operating activity.

Direct Employment – the full time equivalent jobs associated with the direct output.

Direct Labor Income – the salaries and wages earned by employees, contractors, and proprietors as part of the direct output.

Indirect Output – indirect and induced outlays resulting from the direct output; examples: vendors increasing production to meet new demand associated with the direct output, workers spending direct labor income on various purchases within the local economy.

Indirect Employment – the full time equivalent jobs associated with the indirect output.

Indirect Labor Income – the salaries and wages earned by employees, contractors, and proprietors as part of the indirect output.

Total Output – the sum total of direct output and indirect output.

Total Employment – the sum total of direct employment and indirect employment.

Total Labor Income – the sum total of direct labor income and indirect labor income.

Source: Econsult Solutions, Inc. (2014)

²² In the input-output model, the estimate of increased employment will always be in terms of the employment required for a given level of production, usually referred to as *person-years* of employment. As such, these estimates cannot be interpreted as specifying *permanent jobs*.

APPENDIX D – TRADE AREA DATA

The US Census Bureau's Longitudinal Employer-Household Dynamics (LEHD) Origin-Destination Employment Statistics (LODES)²³ data allows for the determination of where people that work in an area live and can be useful in determining the appropriate trade area for a project. According to the LODES data for the trade area, nearly 2.8 million people were employed in study area, nearly 2.9 million people live within the trade area, and over 2.3 million both live and work within the trade area. This means that over 83.8 percent of the individuals that work in the trade area also live in trade area and 81.3 percent of the individuals living in the trade area also work within the trade area (see table D.1).

Table D.1: US Census LODES Data

	Count	Share
In-Area Employment Efficiency		
Employed in the Trade Area	2,795,543	100%
Employed in the Trade Area, but Living Outside of the Trade Area	453,650	16.2%
Employed and Living in the Trade Area	2,341,893	83.8%
In-Area Labor Force Efficiency		
Living in the Trade Area	2,868,704	100%
Living in the Trade Area, but Employed Outside of the Trade Area	526,811	18.4%
Living and Employed in the Trade Area	2,341,893	81.3%

Source: US Census (2017) and Econsult Solutions, Inc. (2017)

The high in-area labor force and employment efficiency supports the notion that the proposed trade area “hangs together” and is appropriate for estimating the EB-5 eligible job creation impacts of the project.

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²³ <http://lehd.ces.census.gov/data/>

APPENDIX E – RIMS II MULTIPLIERS

The following tables detail the RIMS II multipliers used in this analysis.

Table E.1: RIMS II Multipliers – Construction

NACIS # ²⁴	Industry	Final-demand Output (dollars)	Final-demand Earnings (dollars)	Final-demand Employment (number of jobs)	Final-demand Value-added (dollars)	Direct-effect Earnings (dollars)	Direct-effect Employment (number of jobs)
2334B0	Construction	2.118	0.633	12.434	1.141	1.889	2.217
420000	Wholesale	1.931	0.563	9.983	1.223	1.924	2.557
484000	Truck Transportation	2.236	0.611	12.220	1.104	2.219	2.444
541300	Architectural, Engineering, and Related Services	2.274	0.759	13.705	1.259	2.024	2.753
531000	Real estate	1.618	0.326	10.364	1.078	2.200	1.686
561700	Services to buildings and dwellings	1.977	0.589	18.847	1.179	1.849	1.489

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Table E.2: Implied RIMS II Employment Multipliers – Construction

NACIS #	Industry	Final-demand Employment (number of jobs)	Direct Employment (number of jobs)	Indirect and Induced Employment (number of jobs)
2334B0	Construction	12.434	5.609	6.826
420000	Wholesale	9.983	3.905	6.078
484000	Truck Transportation	12.220	5.000	7.220
541300	Architectural, Engineering, and Related Services	13.705	4.978	8.727
531000	Real estate	10.364	6.147	4.217
561700	Services to buildings and dwellings	18.847	12.657	6.190

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

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²⁴ <https://www.bea.gov/regional/rims/rimsii/download/406IndustryListA.pdf>

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Table E.3: RIMS II Multipliers – Materials and Equipment

NACIS #	Industry	Final-demand Output (dollars)	Final-demand Earnings (dollars)	Final-demand Employment (number of jobs)	Final-demand Value-added (dollars)	Direct-effect Earnings (dollars)	Direct-effect Employment (number of jobs)
327330	Concrete pipe, brick, and block manufacturing	1.948	0.434	9.009	0.974	2.389	2.420
335311	Power, distribution, and specialty transformer manufacturing	2.039	0.425	8.028	0.921	2.449	2.753
335313	Switchgear and switchboard apparatus manufacturing	1.948	0.400	7.116	0.905	2.564	3.194
335920	Communication and energy wire and cable manufacturing	2.380	0.444	8.439	0.821	3.224	3.545
335930	Wiring device manufacturing	1.904	0.419	7.927	0.987	2.242	2.505
321100	Sawmills and wood preservation	1.689	0.338	7.563	0.631	2.360	2.131
326120	Plastics pipe, and pipe fitting manufacturing	2.257	0.471	8.798	0.909	2.638	2.770

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

Table E.4: Implied RIMS II Employment Multipliers – Materials and Equipment

NACIS #	Industry	Final-demand Employment (number of jobs)	Direct Employment (number of jobs)	Indirect and Induced Employment (number of jobs)
327330	Concrete pipe, brick, and block manufacturing	9.009	3.723	5.286
335311	Power, distribution, and specialty transformer manufacturing	8.028	2.916	5.112
335313	Switchgear and switchboard apparatus manufacturing	7.116	2.228	4.888
335920	Communication and energy wire and cable manufacturing	8.439	2.381	6.059
335930	Wiring device manufacturing	7.927	3.165	4.763
321100	Sawmills and wood preservation	7.563	3.549	4.014
326120	Plastics pipe, and pipe fitting manufacturing	8.798	3.176	5.622

Source: BEA (2017) and Econsult Solutions, Inc. (2017)

APPENDIX F – DETAILED SPENDING BY YEAR

The following tables detail the project spending by year and work stream.

Table F.1: Total Project Spending by Year and Work Stream

Category	2016	2017 Budget	2018	2019	2020	Total
Storm Hardening and Resiliency Measures	\$ 9,686,481	\$ 23,946,112	\$ 28,551,296	\$ 28,551,296	\$ 28,551,296	\$119,286,481
Underground Cable Replacement	\$12,810,303	\$28,000,000	\$35,000,000	\$32,000,000	\$30,000,000	\$137,810,303
Building Substation Retirement	\$0	\$0	\$0	\$1,000,000	\$12,000,000	\$13,000,000
Total	\$22,496,784	\$51,946,112	\$63,551,296	\$61,551,296	\$70,551,296	\$270,096,784

Source: PECO (2017)

Table F.2: Storm Hardening and Resiliency Measures Project Spending by Year and Work Stream

Category	2016	2017 Budget	2018	2019	2020	Total
Project Management	\$399,465	\$2,389,637	\$2,855,130	\$2,855,130	\$2,855,130	\$11,354,491
Engineering and Design	\$526,192	\$2,396,881	\$2,855,130	\$2,855,130	\$2,855,130	\$11,488,462
Aerial Electrical Construction	\$2,500,837	\$7,224,446	\$8,565,389	\$8,565,389	\$8,565,389	\$35,421,449
Landscape Management	\$4,398,788	\$4,822,736	\$5,710,259	\$5,710,259	\$5,710,259	\$26,352,301
Materials	\$1,861,199	\$4,758,993	\$5,710,259	\$5,710,259	\$5,710,259	\$23,750,969
O&C Contingency	\$0	\$2,353,420	\$2,855,130	\$2,855,130	\$2,855,130	\$10,918,809
Total	\$9,686,481	\$23,946,112	\$28,551,296	\$28,551,296	\$28,551,296	\$119,286,481

Source: PECO (2017)

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Table F.3: Underground Cable Replacement Project Spending by Year and Category

Category	2016	2017 Budget	2018	2019	2020	Total
Project Management	\$754,016	\$2,800,000	\$3,500,000	\$3,200,000	\$3,000,000	\$13,254,016
Engineering and Design	\$872,381	\$2,800,000	\$3,500,000	\$3,200,000	\$3,000,000	\$13,372,381
Underground Electrical Construction	\$4,640,690	\$5,600,000	\$7,000,000	\$6,400,000	\$6,000,000	\$29,640,690
Civil Construction	\$4,253,323	\$8,400,000	\$10,500,000	\$9,600,000	\$9,000,000	\$41,753,323
Materials	\$2,289,893	\$5,600,000	\$7,000,000	\$6,400,000	\$6,000,000	\$27,289,893
Non O&C Contingency	\$0	\$1,400,000	\$1,750,000	\$1,600,000	\$1,500,000	\$6,250,000
O&C Contingency	\$0	\$1,400,000	\$1,750,000	\$1,600,000	\$1,500,000	\$6,250,000
Total	\$12,810,303	\$28,000,000	\$35,000,000	\$32,000,000	\$30,000,000	\$137,810,303

Source: PECO (2017)

Table F.4: Building Substation Retirement Project Spending by Year and Category

Category	2016	2017 Budget	2018	2019	2020	Total
Project Management	\$0	\$0	\$0	\$50,000	\$600,000	\$650,000
Engineering and Design	\$0	\$0	\$0	\$250,000	\$600,000	\$850,000
Substation Construction	\$0	\$0	\$0	\$50,000	\$1,800,000	\$1,850,000
Aerial Electrical Construction	\$0	\$0	\$0	\$100,000	\$2,400,000	\$2,500,000
Underground Electrical Construction	\$0	\$0	\$0	\$100,000	\$2,400,000	\$2,500,000
Civil Construction	\$0	\$0	\$0	\$100,000	\$1,200,000	\$1,300,000
Materials	\$0	\$0	\$0	\$250,000	\$1,800,000	\$2,050,000
Non O&C Contingency	\$0	\$0	\$0	\$50,000	\$600,000	\$650,000
O&C Contingency	\$0	\$0	\$0	\$50,000	\$600,000	\$650,000
Total	\$0	\$0	\$0	\$1,000,000	\$12,000,000	\$13,000,000

Source: PECO (2017)

APPENDIX G – MATERIAL AND EQUIPMENT SPENDING

The following tables detail the breakdown of the spending on materials and equipment into detailed categories. The breakdown is based on information from PECO and research by ESI.

Table G.1: Storm Hardening and Resiliency Measures Materials and Equipment Spending

Category	Spending
Electrical Wire and Cable	65%
Telephone poles	10%
Transformers	5%
Switchgear	10%
Wiring Devices	10%
Total	100%

Source: PECO (2017) and Econsult Solutions, Inc. (2017)

Table G.2: Underground Cable Replacement Materials and Equipment Spending

Category	Spending
Electrical Wire and Cable	65%
Manholes and Electrical Ducts	5%
Electrical Conduits	10%
Transformers	5%
Switchgear	5%
Wiring Devices	10%
Total	100%

Source: PECO (2017) and Econsult Solutions, Inc. (2017)

Table G.3: Building Substation Retirement Materials and Equipment Spending

Category	Spending
Electrical Wire and Cable	70%
Transformers	5%
Switchgear	10%
Wiring Devices	15%
Total	100%

Source: PECO (2017) and Econsult Solutions, Inc. (2017)

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Table G.4: Total Material and Equipment Spending by Year and Work Stream

	2017	2018	2019	2020	Total
Storm Hardening and Resiliency Measures	\$3,568,993	\$5,710,259	\$5,710,259	\$5,710,259	\$20,699,770
Underground Cable Replacement	\$4,950,000	\$7,000,000	\$6,400,000	\$6,000,000	\$24,350,000
Building Substation Retirement	\$0	\$0	\$250,000	\$1,800,000	\$2,050,000
Total	\$8,518,993	\$12,710,259	\$12,360,259	\$13,510,259	\$47,099,770

Source: PECO (2017) and Econsult Solutions, Inc. (2017)

Table G.5: Storm Hardening and Resiliency Measures Spending by Category and Year

Category	2017	2018	2019	2020	Total
Electrical Wire and Cable	\$2,319,800	\$3,711,700	\$3,711,700	\$3,711,700	\$13,454,900
Telephone poles	\$356,900	\$571,000	\$571,000	\$571,000	\$2,069,900
Transformers	\$178,400	\$285,500	\$285,500	\$285,500	\$1,034,900
Switchgear	\$356,900	\$571,000	\$571,000	\$571,000	\$2,069,900
Wiring Devices	\$356,900	\$571,000	\$571,000	\$571,000	\$2,069,900
Total	\$3,568,900	\$5,710,200	\$5,710,200	\$5,710,200	\$20,699,500

Source: PECO (2017) and Econsult Solutions, Inc. (2017)

Table G.6: Underground Cable Replacement Spending by Category and Year

Category	2017	2018	2019	2020	Total
Electrical Wire and Cable	\$3,217,500	\$4,550,000	\$4,160,000	\$3,900,000	\$15,827,500
Manholes and Electrical Ducts	\$247,500	\$350,000	\$320,000	\$300,000	\$1,217,500
Electrical Conduits	\$495,000	\$700,000	\$640,000	\$600,000	\$2,435,000
Transformers	\$247,500	\$350,000	\$320,000	\$300,000	\$1,217,500
Switchgear	\$247,500	\$350,000	\$320,000	\$300,000	\$1,217,500
Wiring Devices	\$495,000	\$700,000	\$640,000	\$600,000	\$2,435,000
Total	\$4,950,000	\$7,000,000	\$6,400,000	\$6,000,000	\$24,350,000

Source: PECO (2017) and Econsult Solutions, Inc. (2017)

Table G.7: Building Substation Retirement Spending by Category and Year

Category	2017	2018	2019	2020	Total
Electrical Wire and Cable	\$0	\$0	\$175,000	\$1,260,000	\$1,435,000
Transformers	\$0	\$0	\$12,500	\$90,000	\$102,500
Switchgear	\$0	\$0	\$25,000	\$180,000	\$205,000
Wiring Devices	\$0	\$0	\$37,500	\$270,000	\$307,500
Total	\$0	\$0	\$250,000	\$1,800,000	\$2,050,000

Source: PECO (2017) and Econsult Solutions, Inc. (2017)

Table G.8: Truck Transportation and Wholesale Margins by Category

	Truck Transportation Margin	Wholesale Margin
Electrical Wire and Cable	1.92%	5.95%
Manholes and Electrical Ducts	3.13%	2.78%
Electrical Conduits	1.89%	2.94%
Telephone poles	3.43%	8.63%
Transformers	1.34%	3.94%
Switchgear	1.08%	4.38%
Wiring Devices	0.91%	2.84%

Source: BLS (2017) and Econsult Solutions, Inc. (2017)



APPENDIX H – SPENDING DEFLATION FACTORS

The following tables include the deflation factors that were used to deflate the spending estimates into 2015 values before inputting the spending estimates into the input/output model. The deflation factors are based on region and industry specific data from IMPLAN.

Table H.1: Construction Spending

	2017	2018	2019	2020
Construction	0.981	0.972	0.962	0.953
Wholesale trade	0.992	0.988	0.984	0.979
Truck transportation	0.988	0.981	0.976	0.970
Architectural, engineering, and related services	0.984	0.977	0.969	0.962
Landscape and horticultural services	0.986	0.980	0.974	0.969

Source: IMPLAN (2017) and Econsult Solutions, Inc. (2017)

Table H.2: Materials and Equipment

	2017	2018	2019	2020
Concrete pipe, brick, and block manufacturing	0.983	0.975	0.966	0.958
Power, distribution, and specialty transformer manufacturing	0.983	0.976	0.967	0.960
Switchgear and switchboard apparatus manufacturing	0.983	0.976	0.967	0.960
Communication and energy wire and cable manufacturing	0.987	0.981	0.976	0.969
Wiring device manufacturing	0.987	0.981	0.976	0.969
Sawmills and wood preservation	0.992	0.988	0.984	0.980
Plastics pipe and pipe fitting manufacturing	0.987	0.980	0.975	0.968

Source: IMPLAN (2017) and Econsult Solutions, Inc. (2017)

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APPENDIX I – INDUSTRIES

Tables I.1 and I.2 assigns each of the construction and equipment spending categories to the industry that was used for economic impact modeling purposes

Table I.1: Storm Hardening and Resiliency Measures Industry Assignments

Category	NAICS #	Industry
Project Management	230000	Construction
Engineering and Design	541300	Architectural, Engineering, and Related Services
Aerial Electrical Construction	230000	Construction
Landscape Management	561700	Services to buildings and dwellings
Materials		See Table G.1 and I.4
O&C Contingency		N/A
Wholesale	420000	Wholesale trade
Truck Transport	484000	Truck transportation

Econsult Solutions, Inc. (2017)

Table I.2: Underground Cable Replacement Projects Industry Assignments

Category	NAICS #	Industry
Project Management	230000	Construction
Engineering and Design	541300	Architectural, Engineering, and Related Services
Underground Electrical Construction	230000	Construction
Civil Construction	230000	Construction
Materials		See Table G.2 and I.4
Non O&C Contingency		N/A
O&C Contingency		N/A
Wholesale	420000	Wholesale trade
Truck Transport	484000	Truck transportation

Econsult Solutions, Inc. (2017)

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Table I.3: Building Substation Retirement Projects Industry Assignments

Category	NAICS #	Industry
Project Management	230000	Construction
Engineering and Design	541300	Architectural, Engineering, and Related Services
Substation Construction	230000	Construction
Aerial Electrical Construction	230000	Construction
Underground Electrical Construction	230000	Construction
Civil Construction	230000	Construction
Materials		See Table G.3 and I.4
Non O&C Contingency		N/A
O&C Contingency		N/A
Wholesale	420000	Wholesale trade
Truck Transport	484000	Truck transportation

Econsult Solutions, Inc. (2017)

Table I.4: Material and Equipment Manufacturing Industry Assignments

Category	NAICS #	Industry
Electrical Wire and Cable	335920	Communication and energy wire and cable manufacturing
Manholes and Electrical Ducts	327330	Concrete pipe, brick, and block manufacturing
Pipe	326120	Plastics pipe, and pipe fitting manufacturing
Telephone poles	321100	Sawmills and wood preservation
Transformers	335311	Power, distribution, and specialty transformer manufacturing
Switchgear	335313	Switchgear and switchboard apparatus manufacturing
Wiring Devices	335930	Wiring device manufacturing

Econsult Solutions, Inc. (2017)

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EXHIBIT B

Form of Promissory Note

\$50,000,000 (or such lesser principal amount as shall have been actually advanced by Lender to Borrower and be outstanding from time to time under the Loan Agreement)

Philadelphia, PA
June 20, 2018

FOR VALUE RECEIVED, the undersigned ("Borrower") hereby promises to pay to CANAM NEW YORK REGIONAL CENTER, L.P. VI, as Lender, or its registered assigns ("Lender"), in accordance with the provisions of the Loan Agreement (as hereinafter defined), the principal amount of FIFTY MILLION DOLLARS (\$50,000,000) or such lesser principal amount as shall have been actually advanced by Lender to Borrower and be outstanding from time to time under that certain Loan Agreement, dated as of June 20, 2018 (as amended, restated, amended and restated, extended, supplemented or otherwise modified from time to time, the "Loan Agreement"; the terms defined therein being used herein as therein defined), by and between Borrower and Lender.

Borrower promises to pay interest on the unpaid principal amount of this Promissory Note from the date of applicable advance until such principal amount is paid in full, at such interest rates and at such times as provided in the Loan Agreement. All payments of principal and interest shall be made to Lender in Dollars in immediately available funds to an account designated by Lender from time to time.

This Promissory Note is the Note referred to in the Loan Agreement, is entitled to the benefits thereof and may be prepaid in whole or in part subject to the terms and conditions provided therein. Reference is hereby made to the Loan Agreement for a statement of all of the terms and conditions under which the Loan and all advances in respect thereof evidenced hereby are to be made and to be repaid.

Borrower, for itself, its successors and assigns, hereby waives diligence, presentment, protest and demand and notice of protest, demand, dishonor and non-payment of this Promissory Note.

THIS PROMISSORY NOTE SHALL BE CONSTRUED IN ACCORDANCE WITH AND GOVERNED BY THE LAWS OF THE COMMONWEALTH OF PENNSYLVANIA.

PECO ENERGY COMPANY

By: _____
Name: _____
Title: _____

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EXHIBIT C

Form of Borrowing Request

June 20, 2018

To: CANAM NEW YORK REGIONAL CENTER, L.P. VI
c/o CanAm Enterprises, LLC
Wall Street Plaza
88 Pine Street, Suite 2010
New York, New York 10005
Attention: Tom Rosenfeld
Email: trosenfeld@canamenterprises.com

Re: Loan Agreement dated as of June 20, 2018

Ladies and Gentlemen:

This Borrowing Request is delivered to you pursuant to Section 2.01 of that certain Loan Agreement, dated as of June 20, 2018 (as amended, modified, waived, supplemented or restated from time to time, the "Loan Agreement"), by and between PECO ENERGY COMPANY, as borrower (in such capacity, "Borrower") and CANAM NEW YORK REGIONAL CENTER, L.P. VI, as lender. Capitalized terms used but not defined herein shall have the meanings provided in the Loan Agreement.

Pursuant to Section 2.01(b) of the Loan Agreement:

1. Borrower hereby requests an advance in the principal amount of \$50,000,000.
2. Borrower hereby requests that such advance be made on the following date: June 20, 2018.
3. Borrower hereby requests that such advance be made to the following account:

Bank: []
 []
 []

ABA Number: []

For Credit To: []
Account No: []
Reference: []
Attn: []
 []
 []

4. Borrower hereby certifies that (i) Borrower is in compliance in all material respects with all of the terms and conditions of the Loan Agreement and the other Loan Documents, (ii) there has been no event that has occurred and is continuing which is reasonably likely to have a Material

Adverse Effect on the ability of Borrower to complete the Project in accordance with the terms of the Loan Agreement and (iii) no Unmatured Event of Default or Event of Default has occurred and is continuing.

Attached to this Borrowing Request as Exhibit A is evidence of Qualifying Expenditures made or a plan for Qualifying Expenditures anticipated to be made or reimbursed with the proceeds of such advance.

IN WITNESS WHEREOF, the undersigned has executed this Borrowing Request as of the date first written above.

PECO ENERGY COMPANY
as Borrower

By: _____
Name:
Title

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**Exhibit A to Borrowing Request
Evidence of Qualifying Expenditures**

Attach Expenditures Letter from PECO with the following attachments:

- 1. The most recent System 2020 Performance Report (i.e., the work streams report); and**
- 2. The most recent Vendor Spending Report.**

EXHIBIT D

FORM OF ANNUAL AND QUARTERLY COMPLIANCE CERTIFICATE

_____, 20__

Pursuant to the Loan Agreement, dated as of June 20, 2018, between PECO Energy Company ("Borrower") and CanAm PIDC Regional Center, LP XXXV (as amended, modified or supplemented from time to time, the "Loan Agreement"), the undersigned, being _____ of Borrower, hereby certifies on behalf of Borrower as follows:

1. [Delivered] [Posted concurrently]* herewith are the financial statements prepared pursuant to Section 5.01(b)[(ii)/(iii)] of the Loan Agreement for the fiscal _____ ended _____, 20__. All such financial statements comply with the applicable requirements of the Loan Agreement.

2. Schedule I hereto sets forth in reasonable detail the information and calculations necessary to establish Borrower's compliance with the provisions of Section 5.02(c) of the Loan Agreement as of the end of the fiscal period referred to in paragraph 1 above.

3. (Check one and only one:)

No Event of Default or Unmatured Event of Default has occurred and is continuing.

An Event of Default or Unmatured Event of Default has occurred and is continuing, and the document(s) attached hereto as Schedule II specify in detail the nature and period of existence of such Event of Default or Unmatured Event of Default as well as any and all actions with respect thereto taken or contemplated to be taken by Borrower.

4. The undersigned has personally reviewed the Loan Agreement, and this certificate was based on an examination made by or under the supervision of the undersigned sufficient to assure that this certificate is accurate.

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*Applicable language to be used based on method of delivery.

5. Capitalized terms used in this certificate and not otherwise defined shall have the meanings given in the Loan Agreement.

PECO ENERGY COMPANY

By _____
Name: _____
Title: _____