



ELECTRIC DEPARTMENT

2018

BUDGET PRESENTATION

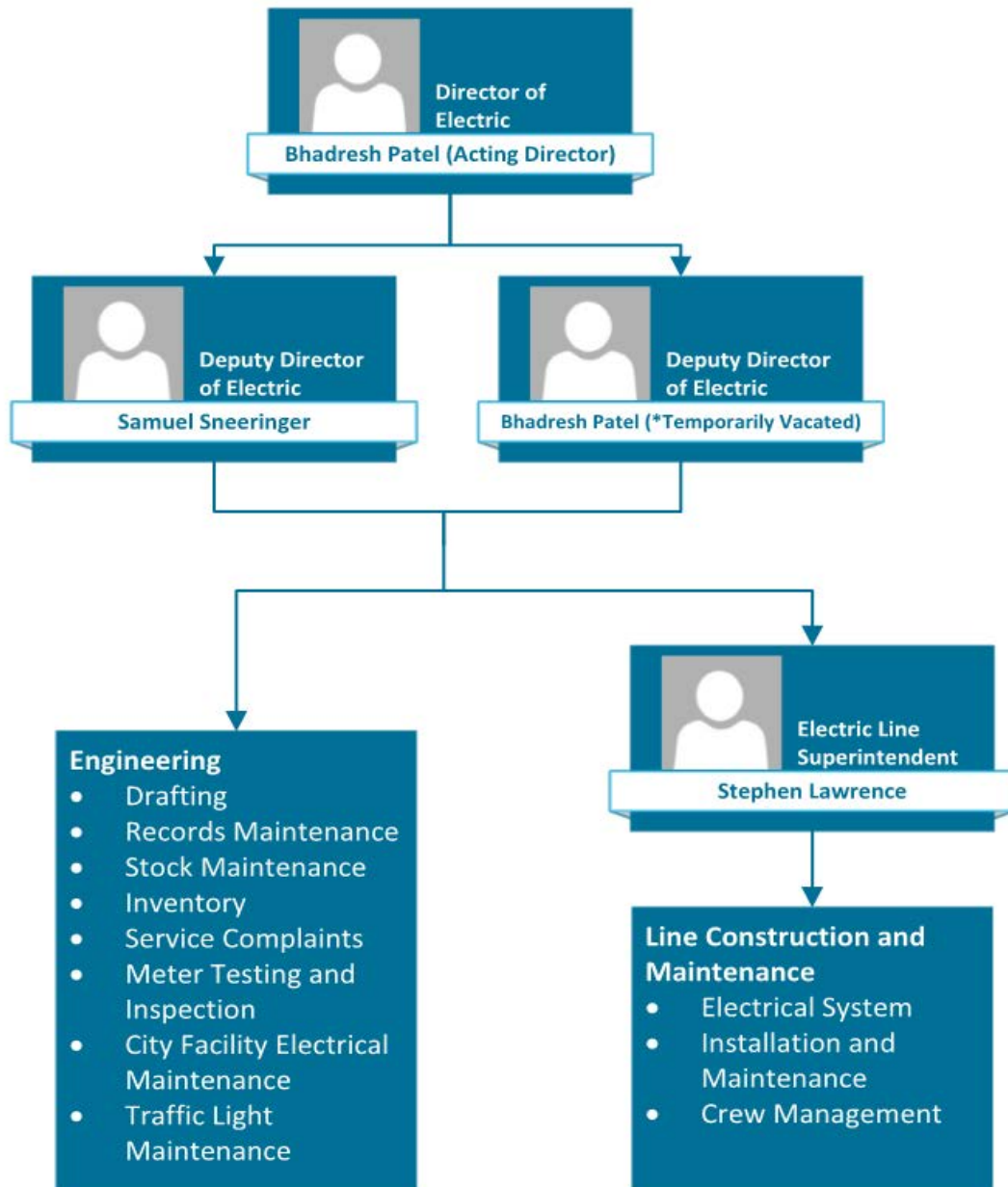
TO CITY COUNCIL

SEPTEMBER 11, 2017

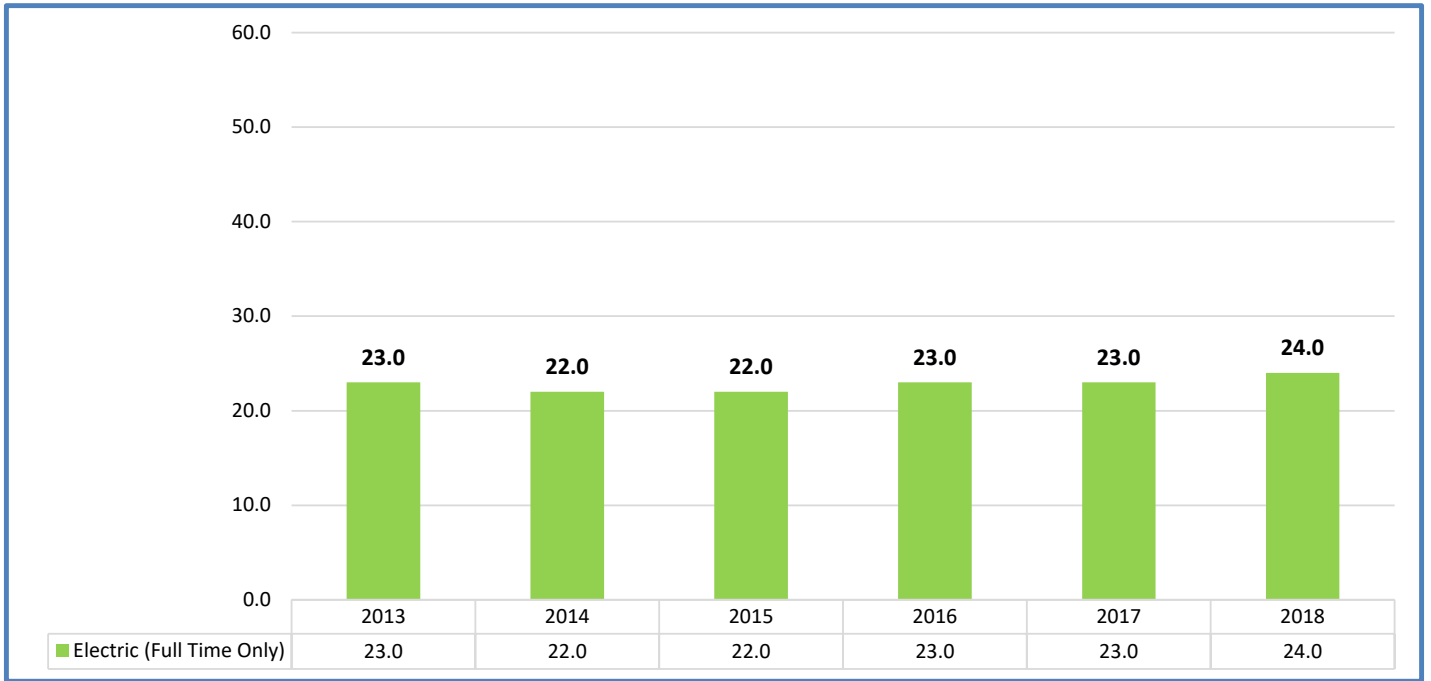
**ELECTRIC DEPARTMENT
DOCUMENT VERSION CONTROL**

Version	Date Submitted	Description of Change(s):
1	9/1/2017	Initial Submission (Version 1)

ELECTRIC DEPARTMENT
FY2017 ORGANIZATIONAL CHART



**ELECTRIC DEPARTMENT
Full Time History/Vacancies as of July 1, 2017**



FULL TIME VACANCIES (Included Above)

Division	Title	#	Reason for Vacancy (date)
Electric	None	0.0	
Total		0.0	

COMMENTS

Division	Title	Change (+/-)	Reason for Adjustment
Electric	Electrician	1.0	Transfer from Information Technology
	Junior Lineman	(2.0)	Attrition
	Electric Groundhand	2.0	Attrition
Total		1.0	

ELECTRIC DEPARTMENT PROGRAM NARRATIVE

The City of Newark operates its own electric utility to provide electric services to 12,800 meters, supporting commercial and residential customers within city limits. Power is purchased on the wholesale power market and delivered by the City. The electric department is responsible for maintaining 175 miles of electric lines and coordinates its services through several programs. They include:

Meter Relay and Electrical Maintenance Program:

Responsible for installing and maintaining electrical systems in city buildings, water wells, water and waste water pumping stations, traffic lights and control systems, meters and other facilities.

Electrical Line Construction and Maintenance Program:

Responsible for maintaining the City's electric lines, substation sites, substation units, circuit breakers, and transformers.

In addition to maintaining the City's electrical distribution system, new power lines, substations and underground electric utilities are constructed and installed to expand services to new customers. Additional departmental responsibilities include maintaining and installing street lights and traffic signals, trimming trees along electric right-of-way, and providing distribution and sub transmission switching and sectionalizing. Staff are also responsible for plans review, drawings and engineering analysis for construction work.

ELECTRIC DEPARTMENT PROGRAM NARRATIVE

Key accomplishments in 2017 include:

The installation of a new 10MVA substation transformer at the Chestnut Hill Road Substation. This transformer will provide additional capacity to the Star Camus and provide backup capacity to the southern end of the city. The project is in progress and we are on track to complete this project by end of this year.

A voltage upgrade from 4160 volts and 12470 volts was completed on Dallas Avenue, parts of Beverly Road, West Park Place, South Main Street and parts of Main Street. Larger aerial conductors were installed on Main Street from Chapel Street to South Main Street.

34.5kV and 12. kV aerial circuits needed to be relocated at the Newark Commuter Rail Station in order to allow the new station and tracks to be constructed. The project is in progress and we are on track to complete this project by end of this year.

The 34.5kV auto transfer system installation. This project will increase reliability and decrease the length of outages when they occur by isolating the faulted section of the circuit and transferring customers to an unfaulted circuit if certain system criteria are met. The project is in progress and we are on track to complete this project by end of this year.

ELECTRIC DEPARTMENT PROGRAM NARRATIVE

Goals for 2018 include:

In 2018, transformer 11 at South Chapel Street Substation will be replaced with a 10MVA substation transformer in order to increase capacity and ensure greater reliability in the southern section of the City.

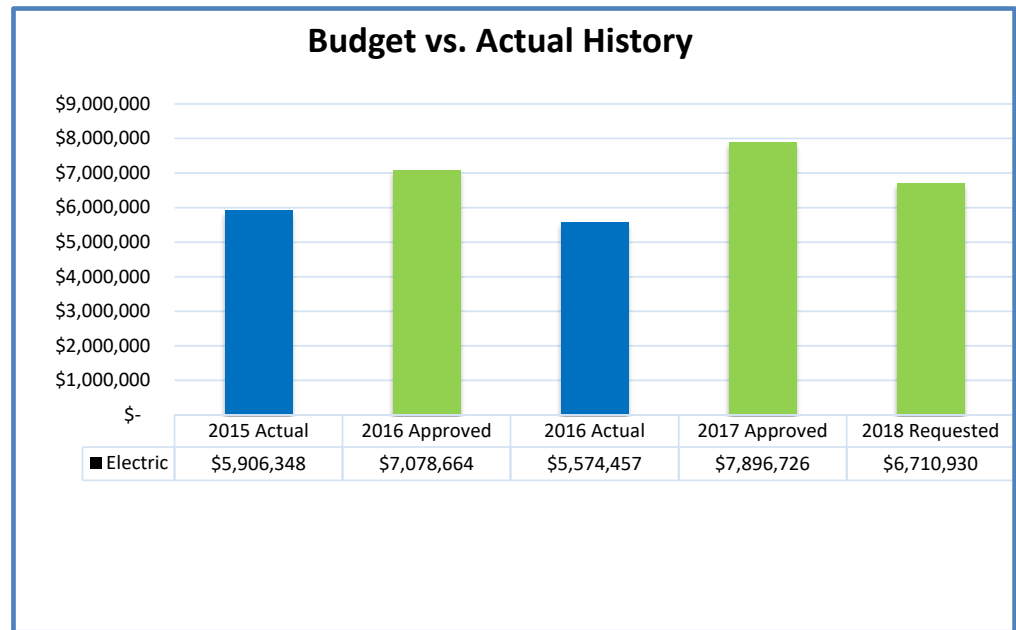
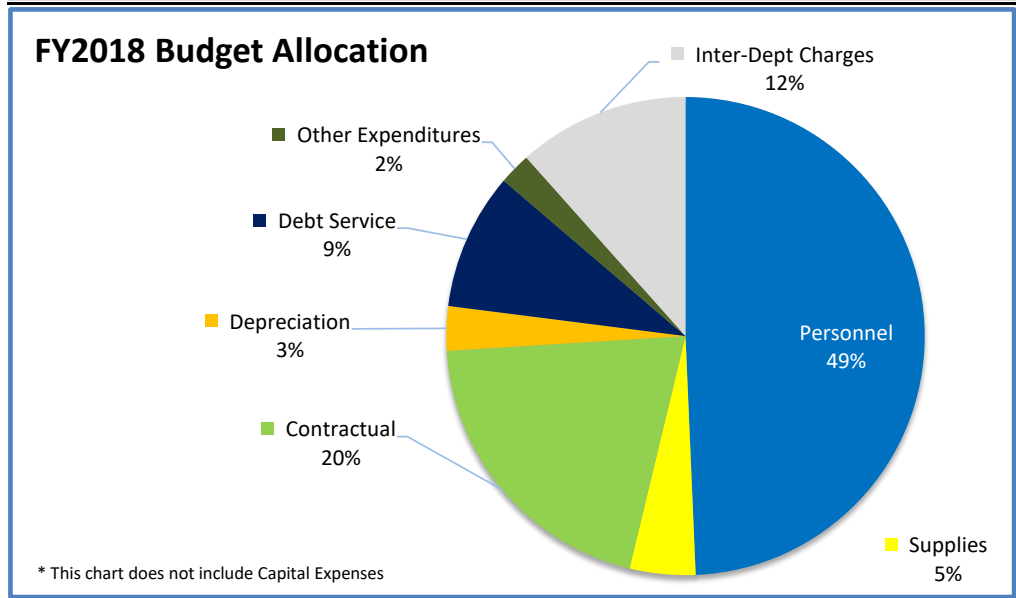
The existing aerial spacer cable along the railroad from Apple Road to Forest Lane will be replaced. Over time, the covering has cracked and the wires have burned down and caused outages during lightning storms.

Utilizing our existing Yukon Feeder Automation software, the 34.5kV auto transfer system will be expanded to the 12.47kV circuits that feed the Delaware Technology Park and Bellevue Road by installing 8 reclosers on utility poles on circuits feeding the 2 locations. Substation and circuit outages will be minimized increasing reliability.

In 2018, investigate feasibility of creating an impact fee for new electric customers and possibly an electric rate study.

**ELECTRIC DEPARTMENT
FY2018 BUDGET RECOMMENDATION**

Object Level	FY2017 Approved	FY2018 Recommended	FY2017 Approved vs. FY2018 Recomm'd	% Incr (Decr) over FY2017 Approved
Personnel Services	\$2,929,417	\$3,309,853	\$380,436	12.99%
Materials & Supplies	\$293,730	\$297,830	\$4,100	1.40%
Contractual Services	\$1,259,942	\$1,359,191	\$99,249	7.88%
Depreciation	\$163,082	\$201,500	\$38,418	23.56%
Debt Service	\$620,662	\$620,662	\$0	0.00%
Other Expenditures	\$127,910	\$144,250	\$16,340	12.77%
Inter-Dept Charges	\$779,983	\$777,644	(\$2,339)	-0.30%
Subtotal (Operational Expenses):	\$6,174,726	\$6,710,930	\$536,204	8.68%
Capital Expenses*	\$1,722,000	\$0	(\$1,722,000)	-100.00%
Total:	\$7,896,726	\$6,710,930	(\$1,185,796)	-15.02%

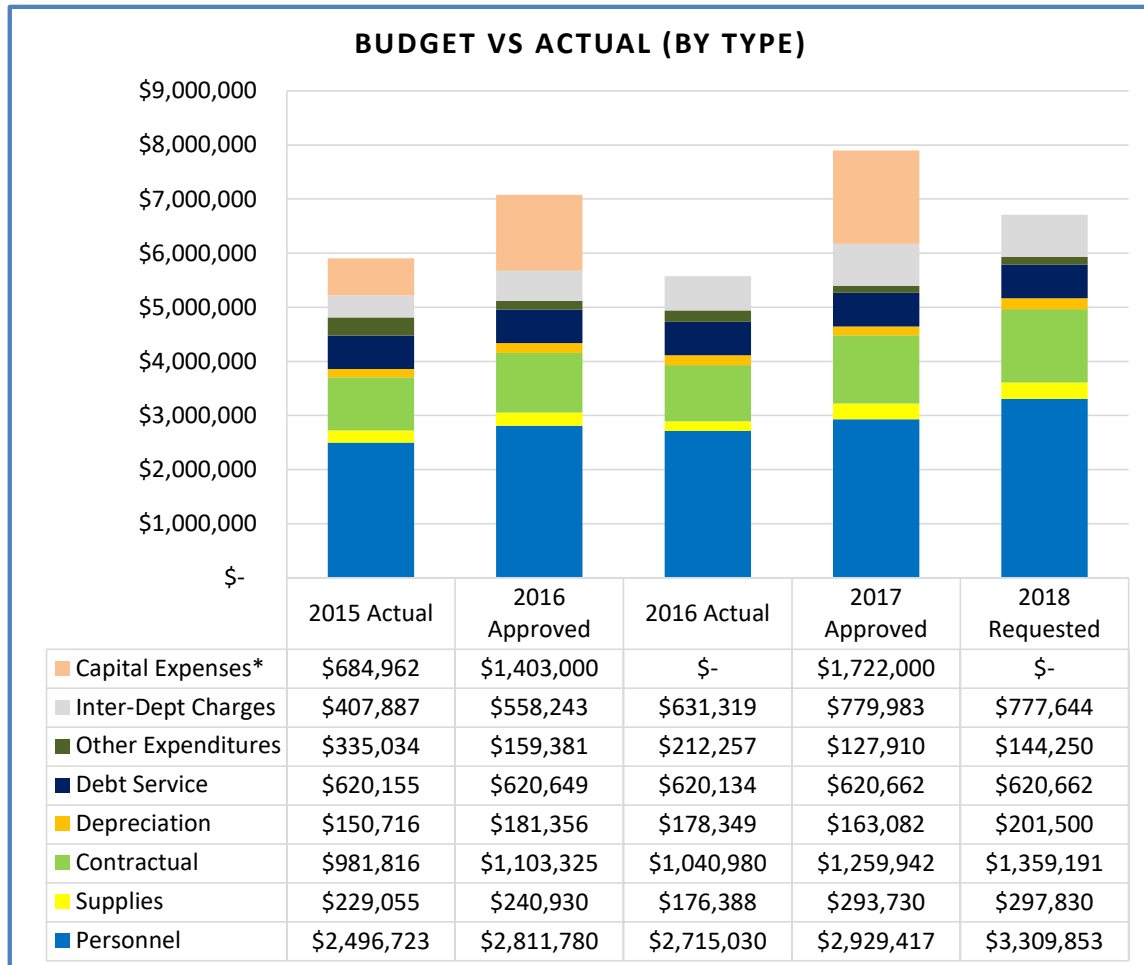


* The allocation of capital expenses between current resources and reserve funding will be determined based on revenue projections.

**ELECTRIC DEPARTMENT
FY2018 BUDGET RECOMMENDATION**

Object Level	2015 Actual	2016 Approved	2016 Actual	2017 Approved	2018 Requested
Personnel Services	\$ 2,496,723	\$ 2,811,780	\$ 2,715,030	\$ 2,929,417	\$ 3,309,853
Materials & Supplies	\$ 229,055	\$ 240,930	\$ 176,388	\$ 293,730	\$ 297,830
Contractual Services	\$ 981,816	\$ 1,103,325	\$ 1,040,980	\$ 1,259,942	\$ 1,359,191
Depreciation	\$ 150,716	\$ 181,356	\$ 178,349	\$ 163,082	\$ 201,500
Debt Service	\$ 620,155	\$ 620,649	\$ 620,134	\$ 620,662	\$ 620,662
Other Expenditures	\$ 335,034	\$ 159,381	\$ 212,257	\$ 127,910	\$ 144,250
Inter-Dept Charges	\$ 407,887	\$ 558,243	\$ 631,319	\$ 779,983	\$ 777,644
Subtotal (Operational Expenses):	\$ 5,221,386	\$ 5,675,664	\$ 5,574,457	\$ 6,174,726	\$ 6,710,930
Capital Expenses*	\$ 684,962	\$ 1,403,000	\$ -	\$ 1,722,000	\$ -
Total:	\$ 5,906,348	\$ 7,078,664	\$ 5,574,457	\$ 7,896,726	\$ 6,710,930

Object Level	2015 Actual	2016 Approved	2016 Actual	2017 Approved	2018 Requested
Personnel Services	42.3%	39.7%	48.7%	37.1%	49.3%
Materials & Supplies	3.9%	3.4%	3.2%	3.7%	4.4%
Contractual Services	16.6%	15.6%	18.7%	16.0%	20.3%
Depreciation	2.6%	2.6%	3.2%	2.1%	3.0%
Debt Service	10.5%	8.8%	11.1%	7.9%	9.2%
Other Expenditures	5.7%	2.3%	3.8%	1.6%	2.1%
Inter-Dept Charges	6.9%	7.9%	11.3%	9.9%	11.6%
Capital Expenses*	11.6%	19.8%	0.0%	21.8%	0.0%
Total:	100.0%	100.0%	100.0%	100.0%	100.0%



* The allocation of capital expenses between current resources and reserve funding will be determined based on revenue projections.

**ELECTRIC DEPARTMENT
FY2018 RECOMMENDED BUDGET
PERSONNEL SERVICES**

Object Level	FY2018 Recommended	\$ Change over FY2017	% Change
Personnel Services:	\$3,309,853	\$380,436	12.99%
Wages:	\$2,092,822	\$163,524	7.81%
Benefits:	\$1,217,031	\$216,912	17.82%
Health insurance assumes an increase of 8% for 2018, which is equal to the increase experienced by the City in 2017. Salary assumptions include anticipated step increases when due per contract, and cost of living adjustments of 1.5% for Management, CWA and FOP employees. Salary increase due partly of the transfer of one position (Electrician) from Information Technology.			

Personnel Services (Org: 5195102)

Object Line	2017	2018	\$ Difference	% Difference
6020 Supervisory	\$ 319,387	\$ 331,033	\$ 11,646	3.6%
6030 Engineering/Technical	\$ 295,343	\$ 297,943	\$ 2,600	0.9%
6040 Warehousing	\$ 55,949	\$ 58,451	\$ 2,502	4.5%
6080 Clerical	\$ 62,457	\$ 63,365	\$ 908	1.5%
6200 Line Maintenance	\$ 985,636	\$ 1,105,751	\$ 120,115	12.2%
6580 Service Award	\$ 43,037	\$ 48,635	\$ 5,598	13.0%
6590 Sick Pay	\$ 26,209	\$ 25,664	\$ (545)	-2.1%
6619 Standby Pay	\$ 36,000	\$ 36,000	\$ -	0.0%
6620 Overtime	\$ 100,000	\$ 115,000	\$ 15,000	15.0%
6880 Uniform Allowances	\$ 5,280	\$ 10,980	\$ 5,700	108.0%
6920 Unemployment Comp. Ins.	\$ 10,011	\$ 7,560	\$ (2,451)	-24.5%
6930 Social Security Taxes	\$ 147,335	\$ 155,222	\$ 7,887	5.4%
6940 City Pension Plan	\$ 340,641	\$ 420,132	\$ 79,491	23.3%
6941 Defined Contribution 401(a) Plan	\$ 14,426	\$ 23,623	\$ 9,197	63.8%
6950 Term Life Insurance	\$ 8,379	\$ 7,992	\$ (387)	-4.6%
6960 Group Hospitalization Ins.	\$ 391,253	\$ 458,632	\$ 67,379	17.2%
6961 Long-Term Disability Ins.	\$ 3,372	\$ 3,916	\$ 544	16.1%
6962 Dental Insurance	\$ 25,016	\$ 26,931	\$ 1,915	7.7%
6963 Flexible Spending Account	\$ 234	\$ 156	\$ (78)	-33.3%
6964 Health Savings Account	\$ 2,250	\$ -	\$ (2,250)	-100.0%
6965 Post-Employment Benefits	\$ 48,582	\$ 101,170	\$ 52,588	108.2%
6966 Retirement Health Savings Account	\$ 4,078	\$ 6,900	\$ 2,822	69.2%
6967 Emergency Room Reimbursements	\$ 3,335	\$ 3,480	\$ 145	4.3%
6968 Vision Insurance Premiums	\$ 1,207	\$ 1,317	\$ 110	9.1%
Personnel Services Total	\$ 2,929,417	\$ 3,309,853	\$ 380,436	13.0%

**ELECTRIC DEPARTMENT
FY2018 BUDGET RECOMMENDATION
POSITION DETAIL**

Title	Grade	2017 # of Positions	2017 Approved	2018 # of Positions	2018 Requested	Position Difference	\$ Difference	% Change
FULL TIME POSITIONS								
Director Of Electric	34	1.0	\$ 123,237	1.0	\$ 125,607	0.0	\$ 2,370	1.9%
Deputy Director Of Electric	31	2.0	\$ 196,150	2.0	\$ 205,426	0.0	\$ 9,276	4.7%
Electric Supervisor	22	1.0	\$ 84,649	1.0	\$ 84,650	0.0	\$ 1	0.0%
Engineering Tech	14	1.0	\$ 63,576	1.0	\$ 64,519	0.0	\$ 943	1.5%
Purchasing Asst	13	1.0	\$ 62,457	1.0	\$ 63,365	0.0	\$ 908	1.5%
Senior Lineman	19	1.0	\$ 81,327	1.0	\$ 85,537	0.0	\$ 4,210	5.2%
Electric Mtr. Tech.	17	1.0	\$ 78,139	1.0	\$ 81,110	0.0	\$ 2,971	3.8%
Electrician	17	2.0	\$ 153,628	3.0	\$ 230,644	1.0	\$ 77,016	50.1%
Lineman 1st Class	17	6.0	\$ 464,738	6.0	\$ 489,991	0.0	\$ 25,253	5.4%
Lineman 2nd Class	14	2.0	\$ 132,824	2.0	\$ 139,668	0.0	\$ 6,844	5.2%
Junior Lineman	10	4.0	\$ 222,098	2.0	\$ 119,251	(2.0)	\$ (102,847)	-46.3%
Electric Groundhand	5		\$ -	2.0	\$ 93,554	2.0	\$ 93,554	#DIV/0!
Storekeeper	8	1.0	\$ 55,949	1.0	\$ 58,451	0.0	\$ 2,502	4.5%
Total Full-Time Positions		23.0	\$ 1,718,772	24.0	\$ 1,841,773	1.0	\$ 123,001	7.2%
OTHER								
Standby Pay			\$ 36,000		\$ 36,000		\$ -	0.0%
Sick Pay			\$ 26,209		\$ 25,664		\$ (545)	-2.1%
Service Award			\$ 43,037		\$ 48,635		\$ 5,598	13.0%
Overtime			\$ 100,000		\$ 115,000		\$ 15,000	15.0%
Transitional Wages			\$ -		\$ 14,770		\$ 14,770	#DIV/0!
Uniform Allowance			\$ 5,280		\$ 10,980		\$ 5,700	108.0%
Total Other			\$ 210,526		\$ 251,049		\$ 40,523	19.2%
Total All		23.0	\$ 1,929,298	24.0	\$ 2,092,822	1.0	\$ 163,524	8%

**ELECTRIC DEPARTMENT
FY2018 RECOMMENDED BUDGET
MATERIALS AND SUPPLIES**

Object Level	FY2018 Recommended	\$ Change over FY2017	% Change
Materials/Supplies:	\$297,830	\$4,100	1.40%
Funding for office supplies, safety equipment, tools, streetlights, meter replacements and parts needed to repair or replace existing equipment on the distribution system or in substations.			

Materials/Supplies (Org: 5195103)

Object Line	2017	2018	\$ Difference	% Difference
7110 Safety Shoes and Supplies	\$ 4,200	\$ 6,300	\$ 2,100	50.0%
7130 Tools, Field Sup., & Small Eq.	\$ 39,650	\$ 39,650	\$ -	0.0%
7131 Information Technology Supplies	\$ 50,000	\$ 30,000	\$ (20,000)	-40.0%
7140 Uniforms	\$ 20,800	\$ 20,800	\$ -	0.0%
7150 Office Supplies	\$ 3,500	\$ 3,500	\$ -	0.0%
7160 Books, Periodicals, Etc	\$ 680	\$ 680	\$ -	0.0%
7260 Line Maintenance	\$ 100,000	\$ 110,000	\$ 10,000	10.0%
7270 Station Maintenance	\$ 45,200	\$ 45,200	\$ -	0.0%
7300 Machinery & Equip. Maintenance	\$ 500	\$ 500	\$ -	0.0%
7330 Meter Testing & Repairs	\$ 2,000	\$ 2,000	\$ -	0.0%
7350 Traffic Signal Maintenance	\$ 950	\$ 950	\$ -	0.0%
7370 Street Light Maintenance	\$ 13,000	\$ 13,000	\$ -	0.0%
7430 House Service Maintenance	\$ 11,500	\$ 23,500	\$ 12,000	104.3%
7480 Communication Equip. Maint.	\$ 500	\$ 500	\$ -	0.0%
7550 Miscellaneous Supplies	\$ 1,250	\$ 1,250	\$ -	0.0%
Materials/Supplies Total	\$ 293,730	\$ 297,830	\$ 4,100	1.4%

**ELECTRIC DEPARTMENT
FY2018 RECOMMENDED BUDGET
MATERIALS AND SUPPLIES DETAIL**

Object Code - Description	Amount Requested	Use of Funds (Description)
7110 Safety Shoes and Supplies	\$ 6,300	Safety shoes, glasses, vests, hardhats
7130 Tools, Field Sup., & Small Eq.	\$ 39,650	New and replacement tools, lineman sleeves, gloves and misc items
7131 Information Technology Supplies	\$ 30,000	Proactive maintenance on smart meter wifi-network as well as batteries for 17 gatekeepers
7140 Uniforms	\$ 20,800	OSHA required flame retardent clothing
7150 Office Supplies	\$ 3,500	Paper, pads, plotter paper, pens, pencils etc
7160 Books, Periodicals, Etc	\$ 680	Safety code books and technical books
7260 Line Maintenance	\$ 110,000	Replacement equipment for failed equipment on the distribution system
7270 Station Maintenance	\$ 45,200	Replacement equipment for substation equipment
7300 Machinery & Equip. Maintenance	\$ 500	Parts for tool repairs
7330 Meter Testing & Repairs	\$ 2,000	Material needed for small meter box repairs - lugs, nuts, bolts, latches, replacement cover
7350 Traffic Signal Maintenance	\$ 950	Signal heads, lenses, bulbs, flashers
7370 Street Light Maintenance	\$ 13,000	Replacement heads, bulbs, photocells
7430 House Service Maintenance	\$ 23,500	Replacement meters for failed ones
7480 Communication Equip. Maint.	\$ 500	Antennas, microphones, batteries for radios
7550 Miscellaneous Supplies	\$ 1,250	Miss Utility markout charges
Total	\$ 297,830	

**ELECTRIC DEPARTMENT
FY2018 RECOMMENDED BUDGET
CONTRACTUAL SERVICES**

Object Level	FY2018 Recommended	\$ Change over FY2017	% Change
Contractual Services:	\$1,359,191	\$99,249	7.88%
Funding for outside businesses or contractors to provide insurance, phone service, outside engineering, tree trimming, and maintenance to the distribution system and substation equipment			

Contractual Services (Org: 5195104)

Object Line	2017	2018	\$ Difference	% Difference
8010 Freight	\$ 950	\$ 950	\$ -	0.0%
8020 Advertising	\$ 800	\$ 800	\$ -	0.0%
8030 Casualty Insurance	\$ 20,457	\$ 20,662	\$ 205	1.0%
8031 Insurance - Property	\$ 39,053	\$ 39,444	\$ 391	1.0%
8032 Insurance - Auto	\$ 24,742	\$ 24,990	\$ 248	1.0%
8033 Insurance - Broker	\$ 7,848	\$ 7,927	\$ 79	1.0%
8040 Merchant Fees and Discounts	\$ 460,000	\$ 530,000	\$ 70,000	15.2%
8050 Phone/Communications	\$ 13,400	\$ 12,000	\$ (1,400)	-10.4%
8120 Outside Engineering	\$ 81,000	\$ 81,000	\$ -	0.0%
8130 Building & Equipment Rental	\$ 14,000	\$ 14,000	\$ -	0.0%
8131 Information Technology Cont'l	\$ 186,467	\$ 211,954	\$ 25,487	13.7%
8190 Refuse Disposal	\$ 2,400	\$ 2,400	\$ -	0.0%
8260 Line Maintenance	\$ 53,200	\$ 53,200	\$ -	0.0%
8270 Station Maintenance	\$ 103,750	\$ 103,750	\$ -	0.0%
8300 Machinery & Equip. Maintenance	\$ 8,120	\$ 8,120	\$ -	0.0%
8350 Traffic Signal Maintenance	\$ 1,995	\$ -	\$ (1,995)	-100.0%
8420 Tree Removal	\$ 220,000	\$ 225,000	\$ 5,000	2.3%
8480 Communication Equip. Maint.	\$ 1,060	\$ 1,060	\$ -	0.0%
8550 Misc. Contracted Services	\$ 5,000	\$ 5,000	\$ -	0.0%
8570 Public Relations	\$ 14,000	\$ 14,000	\$ -	0.0%
8899 Facilities Mowing	\$ 1,700	\$ 2,934	\$ 1,234	72.6%
Contractual Services Total	\$ 1,259,942	\$ 1,359,191	\$ 99,249	7.9%

**ELECTRIC DEPARTMENT
FY2018 RECOMMENDED BUDGET
CONTRACTUAL SERVICES DETAIL**

Object Code - Description	Amount Requested	Use of Funds (Description)
8010 Freight	\$ 950	Freight charges for delivered and returned items
8020 Advertising	\$ 800	Contract and open position advertising
8030 Casualty Insurance	\$ 20,662	Allocation provided by Finance
8031 Insurance - Property	\$ 39,444	Allocation provided by Finance
8032 Insurance - Auto	\$ 24,990	Allocation provided by Finance
8033 Insurance - Broker	\$ 7,927	Allocation provided by Finance
8040 Merchant Fees and Discounts	\$ 530,000	Credit card fees
8050 Phone/Communications	\$ 12,000	Landline, Cell Phone Stipend and Fax Services
8120 Outside Engineering	\$ 81,000	Catholic charities, Wireless facilities attorneys, Arc flash study, Engineering assistance with rates and distribution system issues
8130 Building & Equipment Rental	\$ 14,000	Leases for crossing railroad property with power lines
8131 Information Technology Cont'l	\$ 211,954	Department's share of IT costs, please see Appendix A
8190 Refuse Disposal	\$ 2,400	Disposal of wood debris (utility poles and cross arms)
8260 Line Maintenance	\$ 53,200	Infrared scans of the distribution system, bores needed for underground cable failures, flaggers needed for traffic control while tree trimming or during line maintenance operations
8270 Station Maintenance	\$ 103,750	Yearly electrical testing and oil testing of substation equipment, repairs and maintenance of circuit breakers, yearly substation weed control, Scada repairs, transformer bushing replacements
8300 Machinery & Equip. Maintenance	\$ 8,120	Yearly electrical testing of bucket and line trucks and tool repairs
8420 Tree Removal	\$ 225,000	Tree trimming by Asplundth
8480 Communication Equip. Maint.	\$ 1,060	Repairs for electric department radios
8550 Misc. Contracted Services	\$ 5,000	For unanticipated issues
8570 Public Relations	\$ 14,000	Department's share of PR costs
8899 Facilities Mowing	\$ 2,934	Mowing at Mckees solar park
Total	\$ 1,359,191	

**ELECTRIC DEPARTMENT
FY2018 RECOMMENDED BUDGET
DEPRECIATION**

Object Level	FY2018 Recommended	\$ Change over FY2017	% Change
Depreciation Expense:	\$201,500	\$38,418	23.56%
Depreciation expense is calculated annually by the Department of Finance and is based upon the equipment utilized by each department. This amount will fluctuate depending on asset additions and retirements, cost of assets and useful life of the assets.			

Other Charges (Org: 5195105) - *Depreciation Expense Only

Object Line	2017	2018	\$ Difference	% Difference
9060 Depreciation Expense	\$ 163,082	\$ 201,500	\$ 38,418	23.6%
Other Charges Total *	\$ 163,082	\$ 201,500	\$ 38,418	23.6%

**ELECTRIC DEPARTMENT
FY2018 RECOMMENDED BUDGET
DEBT SERVICE**

Object Level	FY2018 Recommended	\$ Change over FY2017	% Change
Debt Service:	\$620,662	\$0	0.00%
Costs associated with loans for the smart meter system.			

Other Charges (Org: 5195105) - *Debt Service Only

Object Line	2017	2018	\$ Difference	% Difference
9056 Debt Service Principal-Smart Meters	\$ 522,120	\$ 533,006	\$ 10,886	2.1%
9057 Debt Service Interest-Smart Meters	\$ 98,542	\$ 87,656	\$ (10,886)	-11.0%
Other Charges Total *	\$ 620,662	\$ 620,662	\$ -	0.0%

**ELECTRIC DEPARTMENT
FY2018 RECOMMENDED BUDGET
OTHER CHARGES**

Object Level	FY2018 Recommended	\$ Change over FY2017	% Change
Other Charges:	\$144,250	\$16,340	12.77%
Funding for bad debts, training, contingencies.			

Other Charges (Org: 5195105) - *Excluding Depreciation Expense and Debt Service (Principal/Interest)

Object Line	2017	2018	\$ Difference	% Difference
9010 Bad Debt Expense	\$ 72,470	\$ 93,010	\$ 20,540	28.3%
9020 Mileage & Small Bus. Expense	\$ 140	\$ 140	\$ -	0.0%
9070 Training	\$ 17,100	\$ 15,100	\$ (2,000)	-11.7%
9091 Solar Rebate	\$ 1,200	\$ -	\$ (1,200)	-100.0%
9092 Notional Solar Cost	\$ 27,000	\$ 26,000	\$ (1,000)	-3.7%
9099 Contingencies	\$ 10,000	\$ 10,000	\$ -	0.0%
Other Charges Total *	\$ 127,910	\$ 144,250	\$ 16,340	12.8%

OTHER CHARGES DETAIL

Object Code - Description	Amount Requested	Use of Funds (Description)
9010 Bad Debt Expense	\$ 93,010	Unpaid electric account balances (after 5 years)
9020 Mileage & Small Bus. Expense	\$ 140	Local travel charges
9070 Training	\$ 15,100	Lineman training, code class, PDH's for PE license, CPR, etc
9092 Notional Solar Cost	\$ 26,000	Mckees Solar Park Revenue
9099 Contingencies	\$ 10,000	Unexpected costs
Total	\$ 144,250	

**ELECTRIC DEPARTMENT
FY2018 RECOMMENDED BUDGET
INTER-DEPT. CHARGES**

Object Level	FY2018 Recommended	\$ Change over FY2017	% Change
Inter-Dept. Charges:	\$777,644	(\$2,339)	-0.30%
Administrative Overhead: Allocations of personnel expense from Finance, Planning, Administration, and Legislative for time spent on utility related issues.			
Billings and Accounting: Various costs of the Finance Department are allocated based on pertinent ratios; for example, the payroll function is allocated based on the percentage of equivalent personnel head count (including temporary part-time), accounts payable function is allocated by the percentage of total budget dollars, and the accounting function is allocated by an average of the two previous ratios.			
Buildings and Grounds: Costs of the Facilities Maintenance Division are allocated to other operating divisions by the square footage of the department offices and other buildings compared to the total city facility buildings square footage.			
Electricity: Electricity consumption allocated to the department based on square footage of the department offices compared to the total City Hall building. Meter readings are obtained by the Electric Department at the end of each year. Cost is based on budget DEMEC rate.			
Information Technology: Costs are allocated based on percentage of equivalent personnel head count (including temporary part-time) with the exception of items identified specifically for utility fund items such as support for Harris billing system and smart meter network.			
Other Indirect Charges: Includes charges for work done by other divisions to benefit the receiving division offset by credits for work done by this division for other division. Example: For Parks, the Electric, Street, and Refuse crews performing work for Community Day.			
Printing and Reproduction: The costs of supplies for copiers is allocated based on previously observed percentage of use by each department.			
Lights & Traffic Signals: Cost of electricity plus maintenance costs for these devices incurred by the Electric Department charged at 110%.			
Vehicles and Equipment: Includes direct charges of vehicle maintenance and repair performed by the Fleet Maintenance crew and an allocation of indirect Fleet Maintenance costs allocated to each division by the percentage of direct costs for the individual division to the direct costs for all divisions.			
Warehousing: Operating costs of the warehouse function allocated to those divisions that store inventory items.			

Inter-Dept. Charges

Object Line	2017	2018	\$ Difference	% Difference
Administrative Overhead	\$ 613,808	\$ 535,217	\$ (78,591)	-12.8%
Billings & Accounting	\$ 439,500	\$ 379,874	\$ (59,626)	-13.6%
Buildings and Grounds	\$ 59,413	\$ 90,147	\$ 30,734	51.7%
Electricity	\$ (397,087)	\$ (400,892)	\$ (3,805)	1.0%
Information Technology	\$ 178,208	\$ 251,854	\$ 73,646	41.3%
Other Indirect Charges	\$ (18,801)	\$ (17,550)	\$ 1,251	-6.7%
Printing and Reproduction	\$ 182	\$ 156	\$ (26)	-14.3%
Lights & Traffic Signals	\$ (177,835)	\$ (176,473)	\$ 1,362	-0.8%
Vehicles and Equipment	\$ 99,401	\$ 136,146	\$ 36,745	37.0%
Warehousing	\$ (16,806)	\$ (20,835)	\$ (4,029)	24.0%
Inter-Dept. Charges Total	\$ 779,983	\$ 777,644	\$ (2,339)	-0.3%

CAPITAL IMPROVEMENT PROJECTS

**ELECTRIC DEPARTMENT
FY2018 BUDGET RECOMMENDATION
CIP**

Project #	Dept Priority	Description	2017 Budget	Balance as of 6/30/2017	CAPITAL IMPROVEMENTS PROGRAM REQUESTED FUNDING					Total CIP Request
					2018	2019	2020	2021	2022	
E0503	2	SCADA and Automatic Switching	\$1,300,042	\$483,560	\$300,000	\$413,000			\$455,000	\$1,168,000
E0903	2	12kV Changeover	\$173,000	\$30,147						\$0
E1105	2	Upgrade Substation Transformers and Circuit Breakers	\$2,799,000	\$675,458	\$700,000					\$700,000
E1203	4	CAD Software	\$115,500	\$115,500						\$0
E1502	3	Star Campus Underground		\$0	\$120,000	\$120,000	\$120,000			\$360,000
E1602	3	Circuit Breaker Replacement		\$0		\$65,000				\$65,000
E1702	3	Reconductor Main Street	\$85,000	\$5,233						\$0
E1801	1	New Lines and Services		\$0	\$125,000	\$125,000	\$125,000	\$125,000	\$125,000	\$625,000
E1804	2	Spacer Cable Replacement		\$0	\$81,000					\$81,000
E1805	4	Line Extension - UD Farm		\$0		\$170,000				\$170,000
E1806	4	Christianstead Cable Addition		\$0		\$50,000				\$50,000
E1807	5	Relay Replacements - Kershaw Substation		\$0		\$40,000				\$40,000
E1808	5	Voltage Upgrade - North College Avenue		\$0			\$50,000			\$50,000
E1809	5	12.47kV Line Extension		\$0		\$100,000				\$100,000
E1810	5	Lightning Arrestor Replacement		\$0				\$235,000		\$235,000
EEQSF	1	Equipment Replacement Program	\$43,500	\$5,808	\$340,000	\$400,500	\$302,000			\$1,042,500
Total			\$4,516,042	\$1,315,706	\$1,666,000	\$1,383,500	\$697,000	\$360,000	\$580,000	\$4,686,500

**CITY OF NEWARK, DELAWARE
CAPITAL BUDGET - PROJECT DETAIL**

DEPARTMENT: ELECTRIC		DIVISION:	
PROJECT NO: E0503	PROJECT TITLE: SCADA AND AUTOMATIC SWITCHING		PROJECT LOCATION: VARIOUS
PROJECT STATUS (SELECT FROM DROP DOWN):		In Prior Program	
PRIORITY: 2 - High Priority Level	Critical need to remediate failing service, prevent failure, or generate savings		
COMPREHENSIVE DEVELOPMENT PLANNING VISION ELEMENT:		Sustainable Community	

The auto transfer system will allow intelligent transfer of substations on the 34.5kV subtransmission system using reclosers to isolate a faulted circuit and switch a substation to a different circuit if all logic conditions are met. Large outages will be reduced to about a minute and a notification of a transfer will be sent to on call personnel to investigate.

Also includes (previous CIP E1802) - 15KV Automatic Switching:

This project will add 8 - 15kV reclosers to the existing automation software in 2018 to improve reliability to customers at the Delaware Technology Park and customers on Bellevue Road. The reclosers will automatically isolate a faulted circuit and switch the customers to a different circuit if the alternate circuit is available. In 2019, 11 reclosers will be installed to improve reliability to the UD Center Campus and North Campus. In 2022, 10 reclosers will be installed on South College and the Christina Parkway to improve reliability to the UD South Campus and the Star Campus.

§ 806.1(3) SUMMARY OF PROJECT DATA		PROJECT COST BY CATEGORY		
First Year in Program	2005	CLASSIFICATION	ACCOUNT NUMBERS	AMOUNT
Est. Completion Date	2018	Labor	5195106.9860	\$ 266,500
Est. Useful Life (in years)	20 YRS	Materials	5195106.9760	\$ 847,500
Est. Total Cost	2,468,042	Other Contracts	5195106.9960	\$ 54,000
Est. Spend @ 12/31 (if underway) ¹	1,300,042	Total Project Cost		\$ 1,168,000
Balance to be funded ¹	1,168,000	¹ For ongoing projects, we must estimate total spent since inception through current year to derive the balance to be funded thereafter.		
% Complete (if underway)				

PROJECT FINANCING BY PLAN YEAR							
§ 806.1(3) SOURCE OF FUNDS	PRIOR ²	2018	2019	2020	2021	2022	TOTAL
CURRENT RESOURCES	-	300,000	413,000	-	-	455,000	1,168,000
CAPITAL RESERVES							-
EQUIPMENT REPLACEMENT							-
BOND ISSUES							-
GRANTS (Specify)							-
OTHER (Specify)							-
OTHER (Specify)							-
TOTAL	-	300,000	413,000	-	-	455,000	1,168,000

²"Prior" refers to that portion of project funding that was authorized in a prior year but which is not expected to be spent through 12/31 of the current year. Accordingly, Council is not required to authorize budget year funding for that portion, but that portion of the project will indeed represent a cash outflow in the budget year and/or "out years."

§ 806.1(4) ESTIMATED ANNUAL COST OF OPERATING / MAINTAINING PROJECT OR ASSET							
OPERATING IMPACT	2018	2019	2020	2021	2022	TOTAL	
INCREMENTAL COSTS (NET SAVINGS)	25,000	30,000	30,000	30,000	35,000	150,000	

**CITY OF NEWARK, DELAWARE
CAPITAL BUDGET - PROJECT DETAIL**

DEPARTMENT: ELECTRIC		DIVISION:	
PROJECT NO: E0903	PROJECT TITLE: 12KV CHANGEOVER	PROJECT LOCATION: VARIOUS	
PROJECT STATUS (SELECT FROM DROP DOWN):		In Progress	
PRIORITY: 2 - High Priority Level	Critical need to remediate failing service, prevent failure, or generate savings		
COMPREHENSIVE DEVELOPMENT PLANNING VISION ELEMENT:		Sustainable Community	

Upgrade several areas to 12.47kV from 4.16kV by upgrading voltage, future purchase of 4.16kV transformers will be avoided and losses will be reduced. 2016 - Nottingham Green, Country Club and The First Presbyterian Church. 2017 - replace existing 4kV transformers on Main Street, Academy Street, West Park Place, Dallas Avenue and Ritter Lane to prepare for future voltage upgrades.

§ 806.1(3) SUMMARY OF PROJECT DATA		PROJECT COST BY CATEGORY		
First Year in Program	2009	CLASSIFICATION	ACCOUNT NUMBERS	AMOUNT
Est. Completion Date	2017	Labor	5195106.9860	
Est. Useful Life (in years)	30 YRS.	Materials	5195106.9760	
Est. Total Cost	173,000	Other Contracts		
Est. Spend @ 12/31 (if underway) ¹	173,000	Total Project Cost		
Balance to be funded ¹		¹ For ongoing projects, we must estimate total spent since inception through current year to derive the balance to be funded thereafter.		
% Complete (if underway)	100%			

PROJECT FINANCING BY PLAN YEAR							
§ 806.1(3) SOURCE OF FUNDS	PRIOR ²	2018	2019	2020	2021	2022	TOTAL
CURRENT RESOURCES							-
CAPITAL RESERVES							-
EQUIPMENT REPLACEMENT							-
BOND ISSUES							-
GRANTS (Specify)							-
OTHER (Specify)							-
OTHER (Specify)							-
TOTAL	-	-	-	-	-	-	-

²"Prior" refers to that portion of project funding that was authorized in a prior year but which is not expected to be spent through 12/31 of the current year. Accordingly, Council is not required to authorize budget year funding for that portion, but that portion of the project will indeed represent a cash outflow in the budget year and/or "out years."

§ 806.1(4) ESTIMATED ANNUAL COST OF OPERATING / MAINTAINING PROJECT OR ASSET							
OPERATING IMPACT	2018	2019	2020	2021	2022	TOTAL	
INCREMENTAL COSTS (NET SAVINGS)							

**CITY OF NEWARK, DELAWARE
CAPITAL BUDGET - PROJECT DETAIL**

DEPARTMENT: ELECTRIC		DIVISION:	
PROJECT NO: E1105	PROJECT TITLE: UPGRADE SUBSTATION TRANSFORMERS AND CIRCUIT BREAKERS	PROJECT LOCATION: PHILLIPS, EAST MAIN, WEST MAIN AND CHESTNUT HILL RD SUBSTATIONS	
PROJECT STATUS (SELECT FROM DROP DOWN):		In Progress	
PRIORITY: 2 - High Priority Level		Critical need to remediate failing service, prevent failure, or generate savings	
COMPREHENSIVE DEVELOPMENT PLANNING VISION ELEMENT:		Sustainable Community	

Due to the load increase on Cleveland Avenue, which consumed most of the city's back-up capacity between West Main Street substation transformer 76 and East Main Street substation transformer 80, a new substation transformer is required at the West Main Street substation. This will allow the load to be split on circuit 80-1 which feeds Cleveland Avenue at Paper Mill Road. Approximately 1000kW of 4kV load will be upgraded to 12.47kV on West Main Street and in Nottingham Green.

In order to meet upcoming load increases on the Star Campus and reinforce the distribution system by providing back-up power, a new substation transformer is required at the Chestnut Hill Road substation. A new line extension from the substation to South College Avenue will also be built. The new transformer will back-up Chestnut Hill Road feeders 74-1 and 74-2, Phillips 7 and Phillips 86-2.

Also includes (previous CIP E1803) - South Chapel Transformer Replacement:

Transformer 11 at South Chapel Street Substation is a 2500/3500kVA transformer installed in 1969. Recent electrical tests and oil testing has shown the transformer is at its end of life. The unit is a back-up to South Chapel 13 (5000kva) which has a 3100kVA load on it. Unit 11 is close to not being able to back-up 13 in an emergency. It is proposed to replace unit 11 with a 10,000kVA transformer. This new transformer will back-up transformer 13 at South Chapel Substation, unit 74 at Chestnut Hill Road substation and unit 82 at Wyoming Road substation. Unit 11 is a sister unit of West Main unit 41 which has failed 3 times in its lifetime.

§ 806.1(3) SUMMARY OF PROJECT DATA		PROJECT COST BY CATEGORY		
		CLASSIFICATION	ACCOUNT NUMBERS	AMOUNT
First Year in Program	2011	Labor	5195106.9830	\$ 128,000
Est. Completion Date	2017	Materials	5195106.9730	\$ 539,500
Est. Useful Life (in years)	30 YRS.	Other Contracts	5195106.9730	\$ 32,500
Est. Total Cost	3,499,000	Total Project Cost		\$ 700,000
Est. Spend @ 12/31 (if underway) ¹	2,799,000	¹ For ongoing projects, we must estimate total spent since inception through current year to derive the balance to be funded thereafter.		
Balance to be funded ¹	700,000			
% Complete (if underway)				

PROJECT FINANCING BY PLAN YEAR

§ 806.1(3) SOURCE OF FUNDS	PRIOR ²	2018	2019	2020	2021	2022	TOTAL
CURRENT RESOURCES		700,000					700,000
CAPITAL RESERVES							-
EQUIPMENT REPLACEMENT							-
BOND ISSUES							-
GRANTS (Specify)							-
OTHER (Specify)							-
OTHER (Specify)							-
TOTAL		700,000	-	-	-	-	700,000

²"Prior" refers to that portion of project funding that was authorized in a prior year but which is not expected to be spent through 12/31 of the current year. Accordingly, Council is not required to authorize budget year funding for that portion, but that portion of the project will indeed represent a cash outflow in the budget year and/or "out years."

§ 806.1(4) ESTIMATED ANNUAL COST OF OPERATING / MAINTAINING PROJECT OR ASSET

OPERATING IMPACT	2018	2019	2020	2021	2022	TOTAL
INCREMENTAL COSTS (NET SAVINGS)						

**CITY OF NEWARK, DELAWARE
CAPITAL BUDGET - PROJECT DETAIL**

DEPARTMENT: ELECTRIC		DIVISION:	
PROJECT NO: E1203	PROJECT TITLE: CAD SOFTWARE		PROJECT LOCATION: N/A
PROJECT STATUS (SELECT FROM DROP DOWN):			In Prior Program
PRIORITY: 4 - Medium	This project is a NEED and not a WANT, but no significant risk in the deferral of this item		
COMPREHENSIVE DEVELOPMENT PLANNING VISION ELEMENT:			Sustainable Community

This software is needed to model the city's electric distribution system. This software has engineering modules to assist in fault calculations, voltage drop calculations, coordination studies and feeder optimization. Software - \$70,000, Database Conversion - \$65,000, Total + \$135,000.

§ 806.1(3) SUMMARY OF PROJECT DATA		PROJECT COST BY CATEGORY		
First Year in Program	2012	CLASSIFICATION	ACCOUNT NUMBERS	AMOUNT
Est. Completion Date	2017	Labor		
Est. Useful Life (in years)	15 YRS.	Materials	5195106.9622	
Est. Total Cost	115,500	Other Contracts		
Est. Spend @ 12/31 (if underway) ¹	75,000	Total Project Cost		
Balance to be funded ¹		¹ For ongoing projects, we must estimate total spent since inception through current year to derive the balance to be funded thereafter.		
% Complete (if underway)	100%			

PROJECT FINANCING BY PLAN YEAR							
§ 806.1(3) SOURCE OF FUNDS	PRIOR ²	2018	2019	2020	2021	2022	TOTAL
CURRENT RESOURCES	40,500						
CAPITAL RESERVES							
EQUIPMENT REPLACEMENT							-
BOND ISSUES							-
GRANTS (Specify)							-
OTHER (Specify)							-
OTHER (Specify)							-
TOTAL	40,500	-	-	-	-	-	-

²"Prior" refers to that portion of project funding that was authorized in a prior year but which is not expected to be spent through 12/31 of the current year. Accordingly, Council is not required to authorize budget year funding for that portion, but that portion of the project will indeed represent a cash outflow in the budget year and/or "out years."

§ 806.1(4) ESTIMATED ANNUAL COST OF OPERATING / MAINTAINING PROJECT OR ASSET							
OPERATING IMPACT	2018	2019	2020	2021	2022	TOTAL	
INCREMENTAL COSTS (NET SAVINGS)							

**CITY OF NEWARK, DELAWARE
CAPITAL BUDGET - PROJECT DETAIL**

DEPARTMENT: ELECTRIC		DIVISION:	
PROJECT NO: E1502	PROJECT TITLE: STAR CAMPUS UNDERGROUND	PROJECT LOCATION: UD STAR CAMPUS	
PROJECT STATUS (SELECT FROM DROP DOWN):		In Prior Program	
PRIORITY: 3 - Medium-High	The City would be taking a calculated risk in the deferral of this item		
COMPREHENSIVE DEVELOPMENT PLANNING VISION ELEMENT:		Sustainable Community	

Underground electrical distribution equipment needed for the Star Campus. Expenditures to be reimbursed by the Developer or Customer.

§ 806.1(3) SUMMARY OF PROJECT DATA		PROJECT COST BY CATEGORY		
First Year in Program	2015	CLASSIFICATION	ACCOUNT NUMBERS	AMOUNT
Est. Completion Date	2020	Labor	5195106.9860	TBD
Est. Useful Life (in years)	30 YRS.	Materials	5195106.9760	TBD
Est. Total Cost	360,000	Other Contracts		
Est. Spend @ 12/31 (if underway) ¹		Total Project Cost		
Balance to be funded ¹	360,000	¹ For ongoing projects, we must estimate total spent since inception through current year to derive the balance to be funded thereafter.		
% Complete (if underway)				

PROJECT FINANCING BY PLAN YEAR							
§ 806.1(3) SOURCE OF FUNDS	PRIOR ²	2018	2019	2020	2021	2022	TOTAL
CURRENT RESOURCES							
CAPITAL RESERVES							-
EQUIPMENT REPLACEMENT							-
BOND ISSUES							-
GRANTS (Specify)							-
OTHER (Specify)		120,000	120,000	120,000			360,000
OTHER (Specify)							-
TOTAL	-	120,000	120,000	120,000	-	-	360,000

²"Prior" refers to that portion of project funding that was authorized in a prior year but which is not expected to be spent through 12/31 of the current year. Accordingly, Council is not required to authorize budget year funding for that portion, but that portion of the project will indeed represent a cash outflow in the budget year and/or "out years."

§ 806.1(4) ESTIMATED ANNUAL COST OF OPERATING / MAINTAINING PROJECT OR ASSET							
OPERATING IMPACT	2018	2019	2020	2021	2022	TOTAL	
INCREMENTAL COSTS (NET SAVINGS)							

**CITY OF NEWARK, DELAWARE
CAPITAL BUDGET - PROJECT DETAIL**

DEPARTMENT: ELECTRIC		DIVISION:	
PROJECT NO: E1602	PROJECT TITLE: CIRCUIT BREAKER REPLACEMENT	PROJECT LOCATION: FREMONT ROAD SUBSTATION	
PROJECT STATUS (SELECT FROM DROP DOWN):		In Prior Program	
PRIORITY: 3 - Medium-High	The City would be taking a calculated risk in the deferral of this item		
COMPREHENSIVE DEVELOPMENT PLANNING VISION ELEMENT:		Sustainable Community	

The 35kV oil circuit breaker installed in 1975 feeding transformer 47 at the Fremont Road Substation does not always open and close properly. Due to this problem at its age, it is recommended it be replaced with a vacuum type breaker.

§ 806.1(3) SUMMARY OF PROJECT DATA		PROJECT COST BY CATEGORY		
First Year in Program	2016	CLASSIFICATION	ACCOUNT NUMBERS	AMOUNT
Est. Completion Date	2019	Labor	5195106.9830	\$ 10,000
Est. Useful Life (in years)	30 YRS.	Materials	5195106.9730	\$ 40,000
Est. Total Cost	65,000	Other Contracts	5195106.9730	\$ 15,000
Est. Spend @ 12/31 (if underway) ¹		Total Project Cost		\$ 65,000
Balance to be funded ¹	65,000	¹ For ongoing projects, we must estimate total spent since inception through current year to derive the balance to be funded thereafter.		
% Complete (if underway)				

PROJECT FINANCING BY PLAN YEAR							
§ 806.1(3) SOURCE OF FUNDS	PRIOR ²	2018	2019	2020	2021	2022	TOTAL
CURRENT RESOURCES			65,000				65,000
CAPITAL RESERVES							-
EQUIPMENT REPLACEMENT							-
BOND ISSUES							-
GRANTS (Specify)							-
OTHER (Specify)							-
OTHER (Specify)							-
TOTAL	-	-	65,000	-	-	-	65,000

²"Prior" refers to that portion of project funding that was authorized in a prior year but which is not expected to be spent through 12/31 of the current year. Accordingly, Council is not required to authorize budget year funding for that portion, but that portion of the project will indeed represent a cash outflow in the budget year and/or "out years."

§ 806.1(4) ESTIMATED ANNUAL COST OF OPERATING / MAINTAINING PROJECT OR ASSET							
OPERATING IMPACT	2018	2019	2020	2021	2022	TOTAL	
INCREMENTAL COSTS (NET SAVINGS)							

**CITY OF NEWARK, DELAWARE
CAPITAL BUDGET - PROJECT DETAIL**

DEPARTMENT: ELECTRIC		DIVISION:	
PROJECT NO: E1702	PROJECT TITLE: RECONDUCTOR MAIN STREET	PROJECT LOCATION: MAIN STREET	
PROJECT STATUS (SELECT FROM DROP DOWN):		In Progress	
PRIORITY: 3 - Medium-High	The City would be taking a calculated risk in the deferral of this item		
COMPREHENSIVE DEVELOPMENT PLANNING VISION ELEMENT:		Sustainable Community	

Once the existing 4.16kV voltage upgrade on Main Street and Academy Street is completed, the existing 4.16kV aerial feeder on Main Street can be upgraded to a 12.47kV express feeder which will create a new tie between the Phillips Avenue, East Main Street and West Main Street substations. Conductor and insulator upgrades are needed on Main Street. This new circuit will provide emergency backup capacity for the following circuits. East Main 90, East Main 82, Wyoming Road 82-1, West Main 41, West Main 45, West Main 76-2, Sandy Brae 78-2, Phillips 88 and Phillips 86-1.

§ 806.1(3) SUMMARY OF PROJECT DATA		PROJECT COST BY CATEGORY		
First Year in Program	2017	CLASSIFICATION	ACCOUNT NUMBERS	AMOUNT
Est. Completion Date	2017	Labor		
Est. Useful Life (in years)	30 YRS.	Materials	5195106.9730	
Est. Total Cost	85,000	Other Contracts	5195106.9730	
Est. Spend @ 12/31 (if underway) ¹	85,000	Total Project Cost		
Balance to be funded ¹	-	¹ For ongoing projects, we must estimate total spent since inception through current year to derive the balance to be funded thereafter.		
% Complete (if underway)	100%			

PROJECT FINANCING BY PLAN YEAR							
§ 806.1(3) SOURCE OF FUNDS	PRIOR ²	2018	2019	2020	2021	2022	TOTAL
CURRENT RESOURCES							
CAPITAL RESERVES							-
EQUIPMENT REPLACEMENT							-
BOND ISSUES							-
GRANTS (Specify)							-
OTHER (Specify)							-
OTHER (Specify)							-
TOTAL	-	-	-	-	-	-	-

²"Prior" refers to that portion of project funding that was authorized in a prior year but which is not expected to be spent through 12/31 of the current year. Accordingly, Council is not required to authorize budget year funding for that portion, but that portion of the project will indeed represent a cash outflow in the budget year and/or "out years."

§ 806.1(4) ESTIMATED ANNUAL COST OF OPERATING / MAINTAINING PROJECT OR ASSET							
OPERATING IMPACT	2018	2019	2020	2021	2022	TOTAL	
INCREMENTAL COSTS (NET SAVINGS)							

**CITY OF NEWARK, DELAWARE
CAPITAL BUDGET - PROJECT DETAIL**

DEPARTMENT: ELECTRIC		DIVISION:	
PROJECT NO: E1801	PROJECT TITLE: NEW LINES AND SERVICES		PROJECT LOCATION: VARIOUS LOCATIONS IN THE CITY
PROJECT STATUS (SELECT FROM DROP DOWN):			In Prior Program
PRIORITY: 1 - Highest Priority Level	Project underway and must be completed		
COMPREHENSIVE DEVELOPMENT PLANNING VISION ELEMENT:			Sustainable Community

Installation of electric distribution lines in new developments. This includes both overhead and underground primary and secondary service lines. This project is required based on the obligation to serve new customers in the City.

§ 806.1(3) SUMMARY OF PROJECT DATA		PROJECT COST BY CATEGORY		
First Year in Program	ONGOING	CLASSIFICATION	ACCOUNT NUMBERS	AMOUNT
Est. Completion Date	ONGOING	Labor	5195106.9860	\$ 287,500
Est. Useful Life (in years)	30 YRS.	Materials	5195106.9760	\$ 337,500
Est. Total Cost	625,000	Other Contracts	3063006.9622	
Est. Spend @ 12/31 (if underway) ¹		Total Project Cost		\$ 625,000
Balance to be funded ¹	625,000	¹ For ongoing projects, we must estimate total spent since inception through current year to derive the balance to be funded thereafter.		
% Complete (if underway)				

PROJECT FINANCING BY PLAN YEAR							
§ 806.1(3) SOURCE OF FUNDS	PRIOR ²	2018	2019	2020	2021	2022	TOTAL
CURRENT RESOURCES		125,000	125,000	125,000	125,000	125,000	625,000
CAPITAL RESERVES							-
EQUIPMENT REPLACEMENT							-
BOND ISSUES							-
GRANTS (Specify)							-
OTHER (Specify)							-
OTHER (Specify)							-
TOTAL	-	125,000	125,000	125,000	125,000	125,000	625,000

²"Prior" refers to that portion of project funding that was authorized in a prior year but which is not expected to be spent through 12/31 of the current year. Accordingly, Council is not required to authorize budget year funding for that portion, but that portion of the project will indeed represent a cash outflow in the budget year and/or "out years."

§ 806.1(4) ESTIMATED ANNUAL COST OF OPERATING / MAINTAINING PROJECT OR ASSET							
OPERATING IMPACT	2018	2019	2020	2021	2022	TOTAL	
INCREMENTAL COSTS (NET SAVINGS)							

**CITY OF NEWARK, DELAWARE
CAPITAL BUDGET - PROJECT DETAIL**

DEPARTMENT: ELECTRIC		DIVISION:	
PROJECT NO: E1804	PROJECT TITLE: SPACER CABLE REPLACEMENT	PROJECT LOCATION: ALONG RAILROAD TRACKS FROM APPLE ROAD TO FOREST LANE	
PROJECT STATUS (SELECT FROM DROP DOWN):		New Project	
PRIORITY: 2 - High Priority Level	Critical need to remediate failing service, prevent failure, or generate savings		
COMPREHENSIVE DEVELOPMENT PLANNING VISION ELEMENT:		Sustainable Community	

This project will replace the 12,470 volt aerial circuit along the railroad from Apple Road to Forest Lane. The aerial cable is a bundled type of spacer cable which means the wires are installed in close proximity to each other. This cable has many cracks in it and has burned down several times. It is proposed to replace the existing spacer cable with flat crossarm construction.

§ 806.1(3) SUMMARY OF PROJECT DATA		PROJECT COST BY CATEGORY		
First Year in Program	2018	CLASSIFICATION	ACCOUNT NUMBERS	AMOUNT
Est. Completion Date	2018	Labor		\$ 60,800
Est. Useful Life (in years)	30 YRS.	Materials		\$ 20,200
Est. Total Cost	81,000	Other Contracts		
Est. Spend @ 12/31 (if underway) ¹		Total Project Cost		\$ 81,000
Balance to be funded ¹	81,000	¹ For ongoing projects, we must estimate total spent since inception through current year to derive the balance to be funded thereafter.		
% Complete (if underway)				

PROJECT FINANCING BY PLAN YEAR							
§ 806.1(3) SOURCE OF FUNDS	PRIOR ²	2018	2019	2020	2021	2022	TOTAL
CURRENT RESOURCES		81,000					81,000
CAPITAL RESERVES							-
EQUIPMENT REPLACEMENT							-
BOND ISSUES							-
GRANTS (Specify)							-
OTHER (Specify)							-
OTHER (Specify)							-
TOTAL	-	81,000	-	-	-	-	81,000

²"Prior" refers to that portion of project funding that was authorized in a prior year but which is not expected to be spent through 12/31 of the current year. Accordingly, Council is not required to authorize budget year funding for that portion, but that portion of the project will indeed represent a cash outflow in the budget year and/or "out years."

§ 806.1(4) ESTIMATED ANNUAL COST OF OPERATING / MAINTAINING PROJECT OR ASSET							
OPERATING IMPACT	2018	2019	2020	2021	2022	TOTAL	
INCREMENTAL COSTS (NET SAVINGS)							

**CITY OF NEWARK, DELAWARE
CAPITAL BUDGET - PROJECT DETAIL**

DEPARTMENT: ELECTRIC		DIVISION:	
PROJECT NO: E1805	PROJECT TITLE: LINE EXTENSION - UD FARM		PROJECT LOCATION: UNIVERSITY OF DELAWARE FARM
PROJECT STATUS (SELECT FROM DROP DOWN):			New Project
PRIORITY: 4 - Medium	This project is a NEED and not a WANT, but no significant risk in the deferral of this item		
COMPREHENSIVE DEVELOPMENT PLANNING VISION ELEMENT:			Sustainable Community

To ensure capacity and reliable back-up capacity to the Star Campus, the University of Delaware South Campus and City customers on South College Avenue, it is proposed to install a new 12,470 volt circuit from Old South Chapel Street to South College Avenue through the University of Delaware Farm. This project is based on approval from the University of Delaware.

§ 806.1(3) SUMMARY OF PROJECT DATA		PROJECT COST BY CATEGORY		
First Year in Program	2018	CLASSIFICATION	ACCOUNT NUMBERS	AMOUNT
Est. Completion Date	2019	Labor		\$ 80,000
Est. Useful Life (in years)	30 YRS.	Materials		\$ 65,000
Est. Total Cost	170,000	Other Contracts		\$ 25,000
Est. Spend @ 12/31 (if underway) ¹		Total Project Cost		\$ 170,000
Balance to be funded ¹	170,000	¹ For ongoing projects, we must estimate total spent since inception through current year to derive the balance to be funded thereafter.		
% Complete (if underway)				

PROJECT FINANCING BY PLAN YEAR							
§ 806.1(3) SOURCE OF FUNDS	PRIOR ²	2018	2019	2020	2021	2022	TOTAL
CURRENT RESOURCES			170,000				170,000
CAPITAL RESERVES							-
EQUIPMENT REPLACEMENT							-
BOND ISSUES							-
GRANTS (Specify)							-
OTHER (Specify)							-
OTHER (Specify)							-
TOTAL	-	-	170,000	-	-	-	170,000

²"Prior" refers to that portion of project funding that was authorized in a prior year but which is not expected to be spent through 12/31 of the current year. Accordingly, Council is not required to authorize budget year funding for that portion, but that portion of the project will indeed represent a cash outflow in the budget year and/or "out years."

§ 806.1(4) ESTIMATED ANNUAL COST OF OPERATING / MAINTAINING PROJECT OR ASSET							
OPERATING IMPACT	2018	2019	2020	2021	2022	TOTAL	
INCREMENTAL COSTS (NET SAVINGS)							

**CITY OF NEWARK, DELAWARE
CAPITAL BUDGET - PROJECT DETAIL**

DEPARTMENT: ELECTRIC		DIVISION:	
PROJECT NO: E1806	PROJECT TITLE: CHRISTIANSTEAD CABLE ADDITION		PROJECT LOCATION: CHRISTIANSTEAD
PROJECT STATUS (SELECT FROM DROP DOWN):			New Project
PRIORITY: 4 - Medium	This project is a NEED and not a WANT, but no significant risk in the deferral of this item		
COMPREHENSIVE DEVELOPMENT PLANNING VISION ELEMENT:			Sustainable Community

An additional underground high voltage cable is needed in Christianstead to balance load during emergency condition when an existing high voltage cable fails. When we experience a cable failure, the remaining cable can not be fused properly to coordinate with upstream fuses.

§ 806.1(3) SUMMARY OF PROJECT DATA		PROJECT COST BY CATEGORY		
		CLASSIFICATION	ACCOUNT NUMBERS	AMOUNT
First Year in Program	2018	Labor		\$ 8,000
Est. Completion Date	2019	Materials		\$ 22,000
Est. Useful Life (in years)	30 YRS.	Other Contracts		\$ 20,000
Est. Total Cost	50,000	Total Project Cost		\$ 50,000
Est. Spend @ 12/31 (if underway) ¹		¹ For ongoing projects, we must estimate total spent since inception through current year to derive the balance to be funded thereafter.		
Balance to be funded ¹	50,000			
% Complete (if underway)				

PROJECT FINANCING BY PLAN YEAR							
§ 806.1(3) SOURCE OF FUNDS	PRIOR ²	2018	2019	2020	2021	2022	TOTAL
CURRENT RESOURCES			50,000				50,000
CAPITAL RESERVES							-
EQUIPMENT REPLACEMENT							-
BOND ISSUES							-
GRANTS (Specify)							-
OTHER (Specify)							-
OTHER (Specify)							-
TOTAL	-	-	50,000	-	-	-	50,000

²"Prior" refers to that portion of project funding that was authorized in a prior year but which is not expected to be spent through 12/31 of the current year. Accordingly, Council is not required to authorize budget year funding for that portion, but that portion of the project will indeed represent a cash outflow in the budget year and/or "out years."

§ 806.1(4) ESTIMATED ANNUAL COST OF OPERATING / MAINTAINING PROJECT OR ASSET							
OPERATING IMPACT	2018	2019	2020	2021	2022	TOTAL	
INCREMENTAL COSTS (NET SAVINGS)							

**CITY OF NEWARK, DELAWARE
CAPITAL BUDGET - PROJECT DETAIL**

DEPARTMENT: ELECTRIC		DIVISION:	
PROJECT NO: E1807	PROJECT TITLE: RELAY REPLACEMENTS - KERSHAW SUBSTATION	PROJECT LOCATION: KERSHAW SUBSTATION	
PROJECT STATUS (SELECT FROM DROP DOWN):		New Project	
PRIORITY: 5 - Low	This project is a NEED and not a WANT, but it can start in year two of this CIP or later		
COMPREHENSIVE DEVELOPMENT PLANNING VISION ELEMENT:		Sustainable Community	

This project will replace electro mechanical relays on circuit breakers 7, 8 and 9 at Kershaw Substation and connect them to the SCADA system. This will allow us to see breaker status and also have remote control.

§ 806.1(3) SUMMARY OF PROJECT DATA		PROJECT COST BY CATEGORY		
		CLASSIFICATION	ACCOUNT NUMBERS	AMOUNT
First Year in Program	2018	Labor		\$ 14,000
Est. Completion Date	2019	Materials		\$ 13,000
Est. Useful Life (in years)	20 YRS.	Other Contracts		\$ 13,000
Est. Total Cost	40,000	Total Project Cost		\$ 40,000
Est. Spend @ 12/31 (if underway) ¹				
Balance to be funded ¹	40,000	¹ For ongoing projects, we must estimate total spent since inception through current year to derive the balance to be funded thereafter.		
% Complete (if underway)				

PROJECT FINANCING BY PLAN YEAR							
§ 806.1(3) SOURCE OF FUNDS	PRIOR ²	2018	2019	2020	2021	2022	TOTAL
CURRENT RESOURCES			40,000				40,000
CAPITAL RESERVES							-
EQUIPMENT REPLACEMENT							-
BOND ISSUES							-
GRANTS (Specify)							-
OTHER (Specify)							-
OTHER (Specify)							-
TOTAL	-	-	40,000	-	-	-	40,000

²"Prior" refers to that portion of project funding that was authorized in a prior year but which is not expected to be spent through 12/31 of the current year. Accordingly, Council is not required to authorize budget year funding for that portion, but that portion of the project will indeed represent a cash outflow in the budget year and/or "out years."

§ 806.1(4) ESTIMATED ANNUAL COST OF OPERATING / MAINTAINING PROJECT OR ASSET							
OPERATING IMPACT	2018	2019	2020	2021	2022	TOTAL	
INCREMENTAL COSTS (NET SAVINGS)							

**CITY OF NEWARK, DELAWARE
CAPITAL BUDGET - PROJECT DETAIL**

DEPARTMENT: ELECTRIC		DIVISION:	
PROJECT NO: E1808	PROJECT TITLE: VOLTAGE UPGRADE - NORTH COLLEGE AVENUE		PROJECT LOCATION: NORTH COLLEGE AVENUE
PROJECT STATUS (SELECT FROM DROP DOWN):			New Project
PRIORITY: 5 - Low	This project is a NEED and not a WANT, but it can start in year two of this CIP or later		
COMPREHENSIVE DEVELOPMENT PLANNING VISION ELEMENT:			Sustainable Community

Replace poles on North College Avenue and install a primary metering pole in preparation for a 4160 volt to 12470 volt upgrade of University buildings on North College Avenue.

§ 806.1(3) SUMMARY OF PROJECT DATA		PROJECT COST BY CATEGORY		
		CLASSIFICATION	ACCOUNT NUMBERS	AMOUNT
First Year in Program	2018	Labor		\$ 23,800
Est. Completion Date	2020	Materials		\$ 26,200
Est. Useful Life (in years)	30 YRS.	Other Contracts		
Est. Total Cost	50,000	Total Project Cost		
Est. Spend @ 12/31 (if underway) ¹		\$ 50,000		
Balance to be funded ¹	50,000	¹ For ongoing projects, we must estimate total spent since inception through current year to derive the balance to be funded thereafter.		
% Complete (if underway)				

PROJECT FINANCING BY PLAN YEAR							
§ 806.1(3) SOURCE OF FUNDS	PRIOR ²	2018	2019	2020	2021	2022	TOTAL
CURRENT RESOURCES				50,000			50,000
CAPITAL RESERVES							-
EQUIPMENT REPLACEMENT							-
BOND ISSUES							-
GRANTS (Specify)							-
OTHER (Specify)							-
OTHER (Specify)							-
TOTAL	-	-	-	50,000	-	-	50,000

²"Prior" refers to that portion of project funding that was authorized in a prior year but which is not expected to be spent through 12/31 of the current year. Accordingly, Council is not required to authorize budget year funding for that portion, but that portion of the project will indeed represent a cash outflow in the budget year and/or "out years."

§ 806.1(4) ESTIMATED ANNUAL COST OF OPERATING / MAINTAINING PROJECT OR ASSET							
OPERATING IMPACT	2018	2019	2020	2021	2022	TOTAL	
INCREMENTAL COSTS (NET SAVINGS)							

**CITY OF NEWARK, DELAWARE
CAPITAL BUDGET - PROJECT DETAIL**

DEPARTMENT: ELECTRIC		DIVISION:	
PROJECT NO: E1809	PROJECT TITLE: 12.47KV LINE EXTENSION	PROJECT LOCATION: CHRISTINA PARKWAY	
PROJECT STATUS (SELECT FROM DROP DOWN):		New Project	
PRIORITY: 5 - Low	This project is a NEED and not a WANT, but it can start in year two of this CIP or later		
COMPREHENSIVE DEVELOPMENT PLANNING VISION ELEMENT:		Sustainable Community	

A new 12.47kV line extension is needed for additional capacity and back-up capacity for the Star Campus. This extension will also tie Sandy Brae substation transformer 64 to Chestnut Hill Road transformers 64 and 94 to provide back-up capacity.

§ 806.1(3) SUMMARY OF PROJECT DATA		PROJECT COST BY CATEGORY		
	2018	CLASSIFICATION	ACCOUNT NUMBERS	AMOUNT
First Year in Program	2018	Labor		\$ 61,000
Est. Completion Date	2020	Materials		\$ 39,000
Est. Useful Life (in years)	30 YRS.	Other Contracts		
Est. Total Cost	100,000	Total Project Cost \$ 100,000		
Est. Spend @ 12/31 (if underway) ¹		¹ For ongoing projects, we must estimate total spent since inception through current year to derive the balance to be funded thereafter.		
Balance to be funded ¹	100,000			
% Complete (if underway)				

PROJECT FINANCING BY PLAN YEAR							
§ 806.1(3) SOURCE OF FUNDS	PRIOR ²	2018	2019	2020	2021	2022	TOTAL
CURRENT RESOURCES				100,000			100,000
CAPITAL RESERVES							-
EQUIPMENT REPLACEMENT							-
BOND ISSUES							-
GRANTS (Specify)							-
OTHER (Specify)							-
OTHER (Specify)							-
TOTAL	-	-	-	100,000	-	-	100,000

²"Prior" refers to that portion of project funding that was authorized in a prior year but which is not expected to be spent through 12/31 of the current year. Accordingly, Council is not required to authorize budget year funding for that portion, but that portion of the project will indeed represent a cash outflow in the budget year and/or "out years."

§ 806.1(4) ESTIMATED ANNUAL COST OF OPERATING / MAINTAINING PROJECT OR ASSET							
OPERATING IMPACT	2018	2019	2020	2021	2022	TOTAL	
INCREMENTAL COSTS (NET SAVINGS)							

**CITY OF NEWARK, DELAWARE
CAPITAL BUDGET - PROJECT DETAIL**

DEPARTMENT: ELECTRIC		DIVISION:	
PROJECT NO: E1810	PROJECT TITLE: LIGHTNING ARRESTOR REPLACEMENT	PROJECT LOCATION: VARIOUS	
PROJECT STATUS (SELECT FROM DROP DOWN):		New Project	
PRIORITY: 5 - Low	This project is a NEED and not a WANT, but it can start in year two of this CIP or later		
COMPREHENSIVE DEVELOPMENT PLANNING VISION ELEMENT:		Sustainable Community	

Replace older lightning arrestors on the 12.47kV system. This will prevent power outages and improve lightning protection on the distribution system.

§ 806.1(3) SUMMARY OF PROJECT DATA		PROJECT COST BY CATEGORY		
		CLASSIFICATION	ACCOUNT NUMBERS	AMOUNT
First Year in Program	2018	Labor		\$ 180,000
Est. Completion Date	2021	Materials		\$ 55,000
Est. Useful Life (in years)	30 YRS.	Other Contracts		
Est. Total Cost	235,000	Total Project Cost \$ 235,000		
Est. Spend @ 12/31 (if underway) ¹		¹ For ongoing projects, we must estimate total spent since inception through current year to derive the balance to be funded thereafter.		
Balance to be funded ¹	235,000			
% Complete (if underway)				

PROJECT FINANCING BY PLAN YEAR							
§ 806.1(3) SOURCE OF FUNDS	PRIOR ²	2018	2019	2020	2021	2022	TOTAL
CURRENT RESOURCES					235,000		235,000
CAPITAL RESERVES							-
EQUIPMENT REPLACEMENT							-
BOND ISSUES							-
GRANTS (Specify)							-
OTHER (Specify)							-
OTHER (Specify)							-
TOTAL	-	-	-	-	235,000	-	235,000

²"Prior" refers to that portion of project funding that was authorized in a prior year but which is not expected to be spent through 12/31 of the current year. Accordingly, Council is not required to authorize budget year funding for that portion, but that portion of the project will indeed represent a cash outflow in the budget year and/or "out years."

§ 806.1(4) ESTIMATED ANNUAL COST OF OPERATING / MAINTAINING PROJECT OR ASSET							
OPERATING IMPACT	2018	2019	2020	2021	2022	TOTAL	
INCREMENTAL COSTS (NET SAVINGS)							

**CITY OF NEWARK, DELAWARE
CAPITAL BUDGET - PROJECT DETAIL**

DEPARTMENT: ELECTRIC		DIVISION:
PROJECT NO: EEQSF	PROJECT TITLE: EQUIPMENT REPLACEMENT PROGRAM	PROJECT LOCATION:

PROJECT STATUS (SELECT FROM DROP DOWN):	
PRIORITY: 1 - Highest Priority Level	Project underway and must be completed
COMPREHENSIVE DEVELOPMENT PLANNING VISION ELEMENT: Sustainable Community	

Charter § 806.1(2) DESCRIPTION & JUSTIFICATION:
 Planning advance funding accumulated through depreciation to replace essential equipment when necessary.

Vehicles scheduled to be replaced:

Vehicle #103:
 Mid-size 4x4 SUV, possible change to a 4x4 pick up truck. We tried to go with an electric drive unit, but not available yet. Budget \$40,000

Vehicle #105:
 Large diesel digger/pole truck. Budget number \$260,000

Vehicle #126:
 Heavy duty 4x4 pick up truck for; mark out crew, mat transport, arrowboard transport, crash cart transport. GVWR must be over 9600 lbs. to remain legal to pull crash cart. Budget number \$40,000.

§ 806.1(3) SUMMARY OF PROJECT DATA		PROJECT COST BY CATEGORY		
First Year in Program	ONGOING	CLASSIFICATION	ACCOUNT NUMBERS	AMOUNT
Est. Completion Date	ONGOING	Labor		
Est. Useful Life (in years)	VARIOUS	Materials	5195106.9622	\$ 1,042,500
Est. Total Cost	1,042,500	Other Contracts		
Est. Spend @ 12/31 (if underway) ¹		Total Project Cost		\$ 1,042,500
Balance to be funded ¹	1,042,500	¹ For ongoing projects, we must estimate total spent since inception through current year to derive the balance to be funded thereafter.		
% Complete (if underway)				

PROJECT FINANCING BY PLAN YEAR							
§ 806.1(3) SOURCE OF FUNDS	PRIOR ²	2018	2019	2020	2021	2022	TOTAL
CURRENT RESOURCES							-
CAPITAL RESERVES							-
EQUIPMENT REPLACEMENT		340,000	400,500	302,000	-	-	1,042,500
BOND ISSUES							-
GRANTS (Specify)							-
OTHER (Specify)							-
OTHER (Specify)							-
TOTAL	-	340,000	400,500	302,000	-	-	1,042,500

²"Prior" refers to that portion of project funding that was authorized in a prior year but which is not expected to be spent through 12/31 of the current year. Accordingly, Council is not required to authorize budget year funding for that portion, but that portion of the project will indeed represent a cash outflow in the budget year and/or "out years."

§ 806.1(4) ESTIMATED ANNUAL COST OF OPERATING / MAINTAINING PROJECT OR ASSET							
OPERATING IMPACT	2018	2019	2020	2021	2022	TOTAL	
INCREMENTAL COSTS (NET SAVINGS)						-	

APPENDICES

**ELECTRIC DEPARTMENT
FY2018 BUDGET RECOMMENDATION
APPENDIX A - BUDGET CODE 8131**

8131 - Information Technology Contractual	Charge Back	Description
CYME Software Annual Maintenance (Eaton)	\$ 10,200	Electric Outage Simulation Software
Digitalogic - Scada System Licensing - Maintenance	\$ 53,450	Electric SCADA HMI and Device Licenses
EATON Auto Restoration System Software Maintenance	\$ 15,160	Electric Service Auto Restoration Software
Elster License Fee (SLA) Tropos Software Maintenance - Allocated	\$ 35,000	Smart-Meter System (Wireless Infrastructure)
Elster Software Maintenance - EAMS Allocated	\$ 13,000	Smart-Meter System (Radio Infrastructure)
Esri Small Government ELA - Allocated	\$ 5,000	GIS Server, Client, Cloud Licensing
Harris - Smartworks - Oracle Database Tuning - Allocated	\$ 7,500	Smart Meter System - Proactive Oracle Database Maintenance
Harris - Smartworks Software Maintenance - Allocated	\$ 12,500	Smart-Meter System (Middleware)
Harris - NorthStar Annual Maintenance - Allocated	\$ 35,000	Utility Billing Software (including Smart-Meter System)
Oracle Software Subscription Renewal (Not Harris) - Allocated	\$ 2,500	Smart Meter - Oracle Database Software License
PowerLine Technology SagLine Software	\$ 1,000	Electrical Engineering Utility Weight and Span Software
Tyler Technologies Munis Annual Maintenance - Allocated	\$ 7,614	Tyler Technologies Munis - Finance and Accounting, Taxes, Permitting, Licenses, Work Order Management
Verizon - Cellular/Data - Allocated	\$ 10,500	Computer Mobile Internet Connectivity
VOIP Networks - Cloud9 VOIP Subscription - Allocated	\$ 3,530	VOIP Phone System
Total	\$ 211,954	