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M-2016-2522508

July 28, 2017

**Via Certified Mail**  
**70160910000016597103**

Ms. Rosemary Chiavetta, Secretary  
Pennsylvania Public Utility Commission  
Commonwealth Keystone Bldg  
2<sup>nd</sup> Floor, Room-N201  
400 North Street  
Harrisburg, PA 17120

RECEIVED

JUL 28 2017

PA PUBLIC UTILITY COMMISSION  
SECRETARY'S BUREAU

Re: **Duquesne Light Company**  
**Quarterly Electric Reliability Report – 2<sup>nd</sup> Quarter 2017**

Dear Secretary Chiavetta:

Enclosed please find Duquesne Light Company's Quarterly Electric Reliability Report for the Second Quarter of 2017.

The report is submitted in two versions, proprietary and non-proprietary. The proprietary version in the enclosed sealed envelope contains all the information required by 52 Pa. Code § 57.195 and is marked as "Confidential." Duquesne Light Company respectfully requests that the proprietary version of the Quarterly Electric Reliability Report **not** be made available to the public.

If you have any questions regarding the information contained in this filing, please contact the undersigned or Audrey Waldock at 412-393-6334 or [awaldock@duqlight.com](mailto:awaldock@duqlight.com).

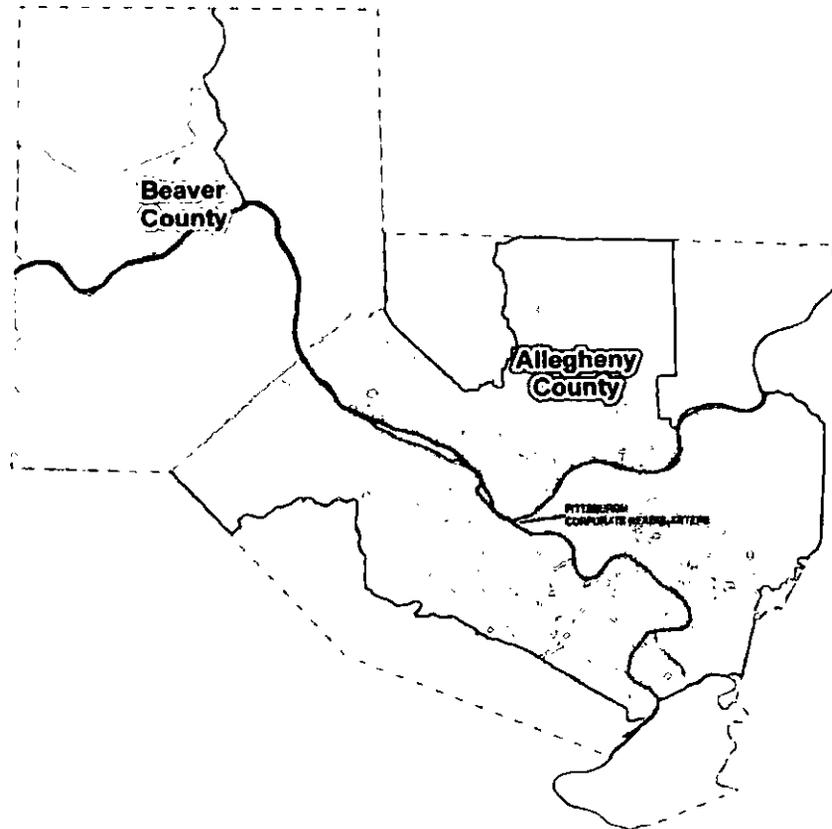
Sincerely,

Shelby A. Linton-Keddie  
Manager, State Regulatory Strategy  
And Senior Legal Counsel

Enclosure

cc (w/ redacted version):

Bureau of Technical Utility Services ([dgill@pa.gov](mailto:dgill@pa.gov), [dsearfoorc@pa.gov](mailto:dsearfoorc@pa.gov), [dawashko@pa.gov](mailto:dawashko@pa.gov))  
Office of Consumer Advocate ([TMcCloskey@paoca.org](mailto:TMcCloskey@paoca.org))  
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***Duquesne Light Company  
Second Quarter 2017***

***Electric Reliability Report***

***to the***

***Pennsylvania Public Utility Commission***

***July 28, 2017***

**57.195 Reporting Requirements**

(e)(1) *A description of each major event that occurred during the preceding quarter, including the time and duration of the event, the number of customers affected, the cause of the event and any modified procedures adopted in order to avoid or minimize the impact of similar events in the future.*

**No major events occurred during the second quarter of 2017.**

(e)(2) *Rolling 12-month reliability index values (SAIFI, CAIDI, SAIDI, and if available, MAIFI) for the electric distribution company's service territory for the preceding quarter. The report shall include the data used in calculating the indices, namely the average number of customers served, the number of sustained customer interruptions, the number of customers affected, and the customer minutes of interruption. If MAIFI values are provided, the report shall also include the number of customer momentary interruptions.*

**Reliability Benchmarks and Standards  
 System Performance Measures with Major Events Excluded**

	SAIDI	SAIFI	CAIDI	MAIFI <sup>1</sup>
<b>Benchmark</b>	126	1.17	108	
<b>12 Month Standard</b>	182	1.40	130	
<b>2017 2Q (Rolling 12 mo.)</b>	117	1.04	113	

Formulas used in calculating the indices:

$$\text{SAIFI} = \frac{(\text{Total KVA interrupted}) - (\text{KVA impact of major events})}{\text{System Connected KVA}}$$

$$\text{SAIDI} = \frac{(\text{Total KVA-minutes interrupted}) - (\text{KVA-minute impact of major events})}{\text{System Connected KVA}}$$

$$\text{CAIDI} = \text{SAIDI/SAIFI}$$

**Data used in calculating the indices**

Total KVA Interrupted for the Period	7,509,262 KVA
Total KVA-Minutes Interrupted:	841,551,686 KVA-Minutes
System Connected Load as of 6/30/17:	7,211,534 KVA

<sup>1</sup> Sufficient information to calculate MAIFI is unavailable.

**(e)(3)** *Rolling 12-month reliability index values (SAIFI, CAIDI, SAIDI, and if available, MAIFI) and other pertinent information such as customers served, number of interruptions, customer minutes interrupted, number of lockouts, and so forth, for the worst performing 5% of the circuits in the system. An explanation of how the electric distribution company defines its worst performing circuits shall be included.*

Circuits are evaluated based on a rolling twelve-month count of lockouts of protective devices (circuit breakers, reclosers, sectionalizers and line fuses) and on total accumulated KVA-Minutes of customer outage time. Circuits that experience multiple lockouts for a device in combination with high total accumulated KVA-Minutes of customer outage time in each quarterly rolling twelve-month period are identified and the top 5% are reported as Worst-Performing Circuits.

The list of Worst-Performing Circuits is ranked first by the number of device lockouts from highest to lowest and then by the number of KVA-Minutes of outage experienced by customers on these circuits (highest to lowest). This places a higher priority on circuits with repeat outages affecting customers (SAIFI) while also focusing on outage duration for customers on these circuits (SAIFI and SAIDI). Prior Worst Performing Circuits that have not seen recent outages fall to a lower priority within the group, but can remain on the list for monitoring until other circuits replace them.

While repairs are made as quickly as possible following every customer outage, circuits that appear on the worst performing circuits list are targeted for more extensive remediation based on a detailed review of historical outage records looking at root cause problems, field evaluations and engineering analysis. Project scopes developed as a result of this analysis are incorporated into the Company's Work Plan for engineering, design and construction. Since the focus is on reducing future customer outage duration and not just outage frequency, special attention is given to establishing/optimizing sectionalizing switch locations and alternate feeds to problem-prone areas of circuits and where possible replacing or eliminating equipment that has historically required lengthy repair times as well as a high failure rates.

At the end of each quarter all previously identified circuits are reviewed to verify that past remediation efforts are working and to look for new reliability issues that may be developing. Serious new reliability problems are addressed immediately without waiting additional periods to collect information. This analysis method provides for timely review of circuit performance by in-house staff and it adapts to the dynamic nature of Duquesne's distribution system.

**Special Note:** *Because of sophisticated protection and remote automation technologies that the Company uses on its distribution circuits, not all customers on a circuit identified as a worst performing circuit actually experience significant reliability issues. Circuit problems are generally isolated to one load block of a circuit in less than five minutes with downstream customers only experiencing short momentary operations. Customers upstream of a circuit problem may not even experience a momentary outage. Therefore, many customers on a circuit identified as a poor performer have actually had good reliability.*

See Attachment A for a list of worst-performing circuits showing feeder device lockouts and reliability index values associated with each circuit.

**(e)(4) Specific remedial efforts taken and planned for the worst performing 5% of the circuits as identified in paragraph (3).**

**Second Quarter 2017 Rolling 12 Month Circuit Data**

Rank, Circuit Name, Device	Outages	Remedial Actions Planned or Taken
<p>1 Midland-Cooks Ferry 22869 Fuse-65K</p>	<p>Seven Total Outages: Second Quarter 2017 Outages:</p> <ul style="list-style-type: none"> <li>• No outages.</li> </ul> <p>Previous Outages:</p> <ul style="list-style-type: none"> <li>• One outage was due to cutout failure.</li> <li>• One outage was due to insulator failure.</li> <li>• The cause of five outages were unknown.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• Routine vegetation maintenance was last performed in 2012 and is scheduled for 2017.</li> <li>• The Company will continue to monitor this circuit for reliability issues.</li> </ul>
<p>2 Evergreen 23953 ER703</p>	<p>Five Total Outages: Second Quarter 2017 Outages:</p> <ul style="list-style-type: none"> <li>• One outage was due to high current overload.</li> <li>• One outage was due to tree fall-in.</li> </ul> <p>Previous Outages:</p> <ul style="list-style-type: none"> <li>• Two outages were due to tree fall-in.</li> <li>• One outage was due to vehicle accident.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• Routine vegetation maintenance was last performed in 2016 and is proposed for 2020.</li> <li>• The Company will continue to monitor this circuit for reliability issues.</li> </ul>

Duquesne Light Company  
 Second Quarter 2017 Electric Reliability Report

Rank, Circuit Name, Device	Outages	Remedial Actions Planned or Taken
<p>3</p> <p>Dravosburg 23750</p> <p>ER14</p>	<p>Five Total Outages:</p> <p>Second Quarter 2017 Outages:</p> <ul style="list-style-type: none"> <li>• One outage was due to transformer failure.</li> <li>• One outage was due to tree fall-in during a storm.</li> </ul> <p>Previous Outages:</p> <ul style="list-style-type: none"> <li>• One outage was due to a large steel roof of customer's contractor contacted during a storm.</li> <li>• One outage was due to a vehicle accident.</li> <li>• One outage was due to insulator failure.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• The Company will continue to monitor this circuit for reliability issues.</li> </ul>
<p>4</p> <p>Pine Creek 23714</p> <p>WA609</p>	<p>Five Total Outages:</p> <p>Second Quarter 2017 Outages:</p> <ul style="list-style-type: none"> <li>• One outage was due to tree fall-in.</li> </ul> <p>Previous Outages:</p> <ul style="list-style-type: none"> <li>• The cause of one outage was unknown during a storm.</li> <li>• Three outages were due to tree fall-ins, one was during a storm.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• The Company's Protection &amp; Control Department is going to convert this circuit to all pulse-reclosing operation, which will improve its protection and reduce future circuit damage during faults making restoration simpler and faster. The conversion will be completed at the end of the third quarter of 2017.</li> <li>• The Company's Asset Management Department is planning to replace a Viper with an IntelliRupter.</li> <li>• Routine Vegetation management was last performed 2013 and is proposed for 2018.</li> </ul>

Duquesne Light Company  
 Second Quarter 2017 Electric Reliability Report

Rank, Circuit Name, Device	Outages	Remedial Actions Planned or Taken
<p>5</p> <p>Traverse Run 23770</p> <p>Recloser-100</p>	<p>Five Total Outages:</p> <p>Second Quarter 2017 Outages:</p> <ul style="list-style-type: none"> <li>• Two outages were caused by tree fall-in, one during a storm.</li> </ul> <p>Previous Outages:</p> <ul style="list-style-type: none"> <li>• Two outages were caused by tree fall-in, one during a storm.</li> <li>• One outage was caused by a failed Crossarm during a storm.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• The Company will continue to monitor this circuit for reliability issues.</li> <li>• Vegetation Management to investigate.</li> </ul>
<p>6</p> <p>Pine Creek 23710</p> <p>Fuse-80E</p>	<p>Five Total Outages:</p> <p>Second Quarter Outages:</p> <ul style="list-style-type: none"> <li>• No outages.</li> </ul> <p>Previous Outages:</p> <ul style="list-style-type: none"> <li>• Cause of one outage was unknown.</li> <li>• One outage was due to icing.</li> <li>• Three outages were caused by tree fall-in.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• The Company will continue to monitor this circuit for reliability issues.</li> <li>• Routine Vegetation management was last performed 2012 and is scheduled for 2018.</li> </ul>
<p>7</p> <p>Sewickley 23631</p> <p>WR723</p>	<p>Five Total Outages:</p> <p>Second Quarter 2017 Outages:</p> <ul style="list-style-type: none"> <li>• No Outages.</li> </ul> <p>Previous Outages:</p> <ul style="list-style-type: none"> <li>• Four outages were due to tree fall-ins, one during a storm.</li> <li>• One outage was due to cutout failure.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• The Company's Asset Management Department recently replaced the last Scadamate sectionalizer with three IntelliRupter recloser, which will improve its protection and reduce future circuit damage during faults making restoration simpler and faster. Routine vegetation maintenance was last performed in 2013 and is scheduled for 2017.</li> </ul>

Duquesne Light Company  
 Second Quarter 2017 Electric Reliability Report

Rank, Circuit Name, Device	Outages	Remedial Actions Planned or Taken
<p>8</p> <p>Brentwood 23810</p> <p>Fuse-100K</p>	<p>Four Total Outages:</p> <p>Second Quarter 2017 Outages:</p> <ul style="list-style-type: none"> <li>• One outage due to lightning arrester failure.</li> <li>• The cause of one outage was unknown.</li> </ul> <p>Previous Outages:</p> <ul style="list-style-type: none"> <li>• One outage was due to tree fall-in.</li> <li>• The cause of one outage was unknown.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• The Company will continue to monitor this circuit for reliability issues.</li> </ul>
<p>9</p> <p>Montour 23670</p> <p>WA527</p>	<p>Four Total Outages:</p> <p>Second Quarter 2017 Outages:</p> <ul style="list-style-type: none"> <li>• One outage was due to vehicle accident.</li> </ul> <p>Previous Outages:</p> <ul style="list-style-type: none"> <li>• One outage was due to tree fall-in.</li> <li>• One outage was due to connector failure.</li> <li>• One outage was due to a vehicle accident.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• The Company's Protection &amp; Control Department is going to convert this circuit to all pulse-reclosing operation, which will improve its protection and reduce future circuit damage during faults making restoration simpler and faster. The conversion will be completed at the end of the third quarter of 2017.</li> </ul>
<p>10</p> <p>Midland 23640</p> <p>Breaker</p>	<p>Four Total Outages:</p> <p>Second Quarter 2017 Outages:</p> <ul style="list-style-type: none"> <li>• One outage due to lightning.</li> </ul> <p>Previous Quarters:</p> <ul style="list-style-type: none"> <li>• One outage due to lightning.</li> <li>• One outage due to insulator failure.</li> <li>• The cause of one outage was unknown.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• The Company will continue to monitor this circuit for reliability issues.</li> </ul>

Duquesne Light Company  
 Second Quarter 2017 Electric Reliability Report

Rank, Circuit Name, Device	Outages	Remedial Actions Planned or Taken
11  Mt. Nebo 23870  Recloser-100	Four Total Outages: Second Quarter 2017 Outages: <ul style="list-style-type: none"> <li>• No Outages.</li> </ul> Previous Outages: <ul style="list-style-type: none"> <li>• One outage was due to a broken pole during a storm.</li> <li>• Three outages were due to tree fall-ins, one was during a storm.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• The Company's Asset Management Department recently replaced three Scadamate sectionalizers with three IntelliRupter reclosers which will improve its protection and reduce future circuit damage during faults making restoration simpler and faster. Routine vegetation maintenance was last performed in 2013 and is scheduled for 2017.</li> </ul>
12  Crescent 23660  Fuse-80E	Four Total Outages: Second Quarter 2017 Outages: <ul style="list-style-type: none"> <li>• No Outages.</li> </ul> Previous Outages: <ul style="list-style-type: none"> <li>• Two outage was due to tree fall-in, one during a storm.</li> <li>• One outage was due to vehicle accident.</li> <li>• The cause of one outage was unknown.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• Routine vegetation maintenance was last performed in 2015 and is proposed for 2020.</li> <li>• The Company will continue to monitor this circuit for reliability issues.</li> </ul>
13  Valley 23781  WR535	Three Total Outages: Second Quarter 2017 Outages: <ul style="list-style-type: none"> <li>• The cause of two outages were unknown, during a storm.</li> </ul> Previous Outages: <ul style="list-style-type: none"> <li>• One outage was due to a tree fall-in during a storm.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• The Company will continue to monitor this circuit for reliability issues.</li> </ul>

Duquesne Light Company  
 Second Quarter 2017 Electric Reliability Report

Rank, Circuit Name, Device	Outages	Remedial Actions Planned or Taken
14  Wilmerding 23761  Fuse-65K	Three Total Outages: Second Quarter 2017 Outages: <ul style="list-style-type: none"> <li>• The cause of two outages were unknown.</li> </ul> Previous Outages: <ul style="list-style-type: none"> <li>• The cause of one outage was unknown.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• The Company will continue to monitor this circuit for reliability issues.</li> </ul>
15  Chess 23688  EA306	Three Total Outages: Second Quarter 2017 Outages: <ul style="list-style-type: none"> <li>• Two outage was due to a vehicle accident.</li> </ul> Previous Outages: <ul style="list-style-type: none"> <li>• One outage was due to tree fall-in.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• The Company will continue to monitor this circuit for reliability issues.</li> </ul>
16  Brunot Is. 23572  Breaker	Three Total Outages: Second Quarter 2017 Outages: <ul style="list-style-type: none"> <li>• One outage was due to a vehicle accident.</li> </ul> Previous Outages: <ul style="list-style-type: none"> <li>• Two outages were due to cable failure.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• The Company will continue to monitor this circuit for reliability issues.</li> </ul>
17  Wildwood 23869  WR975	Three Total Outages: Second Quarter 2017 Outages: <ul style="list-style-type: none"> <li>• No Outages.</li> </ul> Previous Outages: <ul style="list-style-type: none"> <li>• Two outages were due to tree fall-in, one during a storm.</li> <li>• The cause of one outage was unknown.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• The Company will continue to monitor this circuit for reliability issues.</li> </ul>

Duquesne Light Company  
 Second Quarter 2017 Electric Reliability Report

Rank, Circuit Name, Device	Outages	Remedial Actions Planned or Taken
<p>18</p> <p>California 23837</p> <p>Recloser-140</p>	<p>Three Total Outages:</p> <p>Second Quarter 2017 Outages:</p> <ul style="list-style-type: none"> <li>• No Outages.</li> </ul> <p>Previous Outages:</p> <ul style="list-style-type: none"> <li>• The cause of one outage was unknown, during a storm.</li> <li>• One outage was due to transformer failure.</li> <li>• One outage was due to tree fall-in.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• The Company will continue to monitor this circuit for reliability issues.</li> </ul>
<p>19</p> <p>Bryn Mawr 23769</p> <p>Fuse-80E</p>	<p>Two Total Outages:</p> <p>Second Quarter 2017 Outages:</p> <ul style="list-style-type: none"> <li>• One outage was due to tree fall-in, during a storm.</li> </ul> <p>Previous Outages:</p> <ul style="list-style-type: none"> <li>• One outage was due to tree fall-in.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• Routine vegetation maintenance was last performed in 2015 and is proposed for 2020.</li> <li>• The Company will continue to monitor this circuit for reliability issues.</li> </ul>
<p>20</p> <p>North 23707</p> <p>WR381</p>	<p>Two Total Outages:</p> <p>Second Quarter 2017 Outages:</p> <ul style="list-style-type: none"> <li>• One outage was due to tree fall-in.</li> </ul> <p>Previous Outages:</p> <ul style="list-style-type: none"> <li>• One outage was caused by icing on insulator.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• The Company will continue to monitor this circuit for reliability issues.</li> </ul>
<p>21</p> <p>Oakland 23745</p> <p>Fuse-80E</p>	<p>Two Total Outages:</p> <p>Second Quarter 2017 Outages:</p> <ul style="list-style-type: none"> <li>• The cause of one outage was unknown.</li> </ul> <p>Previous Outages:</p> <ul style="list-style-type: none"> <li>• The cause of one outage was unknown.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• The Company will continue to monitor this circuit for reliability issues.</li> </ul>

Duquesne Light Company  
 Second Quarter 2017 Electric Reliability Report

Rank, Circuit Name, Device	Outages	Remedial Actions Planned or Taken
22  Mt Nebo 23871  Fuse-20K	Two Total Outages: Second Quarter 2017 Outages: <ul style="list-style-type: none"> <li>• No Outages.</li> </ul> Previous Outages: <ul style="list-style-type: none"> <li>• Two outages were due to tree fall-ins.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• Routine vegetation maintenance was last performed in 2013 and is scheduled for 2017.</li> <li>• The Company will continue to monitor this circuit for reliability issues.</li> </ul>
23  Universal 23731  ER8	Two Total Outages: Second Quarter 2017 Outages: <ul style="list-style-type: none"> <li>• No Outages.</li> </ul> Previous Outages: <ul style="list-style-type: none"> <li>• One outage was due to crossarm failure.</li> <li>• One outage was due to tree fall-in during a storm.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• The Company will continue to monitor this circuit for reliability issues.</li> </ul>
24  Wilmerding 23764  Breaker	Two Total Outages: Second Quarter 2017 Outages: <ul style="list-style-type: none"> <li>• No Outages.</li> </ul> Previous Outages: <ul style="list-style-type: none"> <li>• Two outages were due to cable failure.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• The Company will continue to monitor this circuit for reliability issues.</li> </ul>
25  Pine Creek – West Deer 22540  ER784	Two Total Outage: Second Quarter 2017 Outages: <ul style="list-style-type: none"> <li>• One outage was due to tree fall-in.</li> <li>• The cause of one outage was unknown during a storm.</li> </ul> Previous Outages: <ul style="list-style-type: none"> <li>• No Outages.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• The Company will continue to monitor this circuit for reliability issues.</li> </ul>

Duquesne Light Company  
 Second Quarter 2017 Electric Reliability Report

Rank, Circuit Name, Device	Outages	Remedial Actions Planned or Taken
26  Wilson 23860  Breaker	Two Total Outages: Second Quarter 2017 Outages: <ul style="list-style-type: none"> <li>• One outage was due to tree fall-in during a storm.</li> <li>• One outage was due to insulator failure.</li> </ul> Previous Outages: <ul style="list-style-type: none"> <li>• No Outages.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• The Company will continue to monitor this circuit for reliability issues.</li> </ul>
27  Findlay 23610  Breaker	One Total Outage: Second Quarter 2017 Outages: <ul style="list-style-type: none"> <li>• No Outages.</li> </ul> Previous Outages: <ul style="list-style-type: none"> <li>• One outage was due to tree fall-in during a storm.</li> </ul>	<ul style="list-style-type: none"> <li>• Permanent repairs were made following each outage as necessary.</li> <li>• Routine vegetation maintenance was last performed in 2012 and is scheduled for 2017.</li> <li>• The Company will continue to monitor this circuit for reliability issues.</li> </ul>

**(e)(5)** *A rolling 12-month breakdown and analysis of outage causes during the preceding quarter, including the number and percentage of service outages, the number of customers interrupted, and customer interruption minutes categorized by outage cause such as equipment failure, animal contact, tree related, and so forth. Proposed solutions to identified service problems shall be reported.*

Proposed solutions to identified service problems are listed in Section (e)(4) above.

**July 1, 2016 through June 30, 2017– No PUC Major Event Exclusions**

<b>CAUSE</b>	<b>NO. OF OUTAGES</b>	<b>OUTAGE PERCENTAGE</b>	<b>KVA TOTAL</b>	<b>KVA PERCENTAGE</b>	<b>KVA-MINUTE TOTAL</b>	<b>KVA-MINUTE PERCENTAGE</b>
<b>Storms</b>	992	28%	2,284,919	30%	363,777,089	43%
<b>Trees (Contact)</b>	26	1%	6,065	1%	577,666	1%
<b>Trees (Falling)</b>	880	25%	1,530,262	20%	164,484,524	20%
<b>Equipment Failures</b>	749	21%	1,993,973	27%	162,406,796	19%
<b>Overloads</b>	54	2%	91,345	1%	5,228,138	1%
<b>Vehicles</b>	176	5%	581,800	8%	63,330,604	8%
<b>Other</b>	685	18%	1,020,898	13%	81,746,869	8%
<b>TOTALS</b>	<b>3,562</b>	<b>100%</b>	<b>7,509,262</b>	<b>100%</b>	<b>841,551,686</b>	<b>100%</b>

(e)(6) *Quarterly and year-to-date information on progress toward meeting transmission and distribution inspection and maintenance goals/ objectives.*

2017 Transmission and Distribution Goals and Objectives							
Program Project	Unit of Measurement	Target for 2017 2Q	Actual for 2017 2Q	Percent Complete	Targets for Year 2017	Actual YTD for 2017	Year End % Complete
<b>Communications Goals</b>							
Communication Battery Maintenance	Batteries	25	26	104%	100	51	51%
<b>Overhead Distribution Goals</b>							
Recloser Inspections	Circuits	34	27	79%	130	86	66%
Pole Inspections	Poles	6,735 <sup>2</sup>	30	0%	17,945	90	1%
OH Line Inspections	Circuits	34	27	79%	130	86	66%
OH Transformer Inspections	Circuits	34	27	79%	130	86	66%
Padmount & Below Grade Insp	Circuits	21	11	52%	81	81	100%
<b>Overhead Transmission Goals</b>							
Helicopter Inspections	Number of Structures	625	693	111%	625	693	111%
Ground Inspections	Number of Structures	206	0	0%	336	0	0%
<b>Substations Goals</b>							
Circuit Breaker Maintenance	Breakers	135	156	116%	501	380	76%
Station Transformer Maintenance	Transformers	45	31	69%	78	40	51%
Station Battery Maintenance	Batteries	234	245	105%	936	489	52%
Station Relay Maintenance	Relays	420	478	114%	1,580	1,001	63%
Station Inspections	Sites	510	512	100%	2,040	1,024	50%
<b>Underground Distribution Goals</b>							
Manhole Inspections	Manholes	250	302	121%	700	498	71%
Major Network Insp (Prot Relay)	Ntwk Protectors	40	28	70%	92	32	35%
Minor Network Visual Inspection (Transformer/Protector/Vault)	Ntwk Transformers	182	116	64%	562	336	60%

<sup>2</sup> Apart from DLC's normal inspection and maintenance schedule for pole inspections, the Company has engaged a third party contractor to inspect an additional 3,800 poles for quality assurance.

<b>2017 Transmission and Distribution Goals and Objectives</b>							
<b>Program Project</b>	<b>Unit of Measurement</b>	<b>Target for 2017 2Q</b>	<b>Actual for 2017 2Q</b>	<b>Percent Complete</b>	<b>Targets for Year 2017</b>	<b>Actual YTD for 2017</b>	<b>Year End % Complete</b>
<b>Underground Transmission Goals</b>							
Pressurization and Cathodic Protection Plant Inspection	Work Order	93	84	90%	371	160	43%
<b>Vegetation Management Goals</b>							
Overhead Line Clearance	Circuit Overhead Miles	310	407	131%	1,300	856	66%
<b>Total Units</b>		<b>9,933</b>	<b>3,200</b>	<b>32%</b>	<b>27,637</b>	<b>5,989</b>	<b>22%</b>

(e)(7) *Quarterly and year-to-date information on budgeted versus actual transmission and distribution operation and maintenance expenditures in total and detailed by the EDC's own functional account code or FERC account code as available.*

**Budget Variance Recap – O&M Expenses**  
 For the Three Months Ending June 30, 2017  
 Favorable/(Unfavorable)

	<b>Total Actual</b>	<b>Total Budget</b>	<b>Variance</b>
<b>Customer Service</b>	8,802,180	12,838,646	4,036,466
<b>Human Resources</b>	3,038,649	3,899,458	860,809
<b>Operations/Operation Services</b>	12,942,685	16,146,443	3,203,758
<b>Technology</b>	11,200,029	12,166,580	966,551
<b>General Corporate*</b>	11,879,600	13,951,187	2,071,587
<b>Total</b>	<b>47,863,143</b>	<b>59,002,313</b>	<b>11,139,170</b>

\*Includes Finance, Office of General Counsel, and Senior Management costs

**Budget Variance Recap – O&M Expenses**  
 For the Six Months Ending June 30, 2017  
 Favorable/(Unfavorable)

	<b>Total Actual</b>	<b>Total Budget</b>	<b>Variance</b>
<b>Customer Service</b>	20,445,135	27,098,519	6,653,385
<b>Human Resources</b>	6,577,894	8,106,144	1,528,250
<b>Operations/Operation Services</b>	30,004,943	33,522,701	3,517,758
<b>Technology</b>	24,907,430	24,290,536	(616,894)
<b>General Corporate*</b>	25,811,262	27,883,711	2,072,449
<b>Total</b>	<b>107,746,663</b>	<b>120,901,611</b>	<b>13,154,948</b>

\*Includes Finance, Office of General Counsel, and Senior Management costs

**(e)(8)** *Quarterly and year-to-date information on budgeted versus actual transmission and distribution capital expenditures in total and detailed by the EDC's own functional account code or FERC account code as available.*

**Budget Variance Recap -Capital**  
 For the Three Months Ending June 30, 2017  
 Favorable/(Unfavorable)

	<b>Total Actual</b>	<b>Total Budget</b>	<b>Variance</b>
<b>Customer Service</b>	1,914,745	2,048,353	133,608
<b>Human Resources</b>	2,994,847	2,627,085	(367,762)
<b>Operations/Operation Services</b>	39,795,458	42,037,933	2,242,475
<b>Technology</b>	19,202,112	20,857,796	1,655,684
<b>General Corporate*</b>	9,785,740	5,226,577	(4,559,163)
<b>Total</b>	<b>73,692,902</b>	<b>72,797,744</b>	<b>(895,158)</b>

\*Includes Finance, Office of General Counsel, and Senior Management costs

**Budget Variance Recap - Capital**  
 For the Six Months Ending June 30, 2017  
 Favorable/(Unfavorable)

	<b>Total Actual</b>	<b>Total Budget</b>	<b>Variance</b>
<b>Customer Service</b>	3,682,879	4,094,856	411,977
<b>Human Resources</b>	5,235,320	4,503,110	(732,210)
<b>Operations/Operation Services</b>	73,930,628	77,852,021	3,921,393
<b>Technology</b>	36,109,410	41,715,592	5,606,182
<b>General Corporate*</b>	18,203,792	11,285,064	(6,918,728)
<b>Total</b>	<b>137,162,029</b>	<b>139,450,643</b>	<b>2,288,614</b>

\*Includes Finance, Office of General Counsel, and Senior Management costs

(e)(9) *Dedicated staffing levels for transmission and distribution operation and maintenance at the end of the quarter, in total and by specific category (e.g. linemen, technician, and electrician).*

<b>Job Title</b>	<b>Number of Employees</b>
Telecom Splicer/Trouble Tech	5
Electronic Technician	15
Telecom Technician	4
<b>Total Telecom</b>	<b>24</b>
Electrical Equipment Technician	34
Protection & Control Technician	24
Yard Group Leader	3
Rigger	6
Laborer	2
<b>Total Substation</b>	<b>69</b>
UG Splicer	38
UG Cable Inspector	9
Cable Tester	1
Network Operator	10
Equipment Material Handler	1
<b>Total Underground</b>	<b>59</b>
Apprentice T&D	53
Equipment Attendant	1
Lineworker	134
Service Crew Leader	3
Equipment Material Handler	4
<b>Total Overhead</b>	<b>195</b>
<b>Total Street Light Changer</b>	<b>6</b>
Engineering Technician	37
GIS Technician	6
Right of Way Agent	4
Surveyor	4
T&D Mobile Worker	4
Test Technician, Mobile	5
<b>Total Engineering</b>	<b>60</b>
Senior Operator	22
Traveling Operator	3
Troubleshooter	18
<b>Total Traveling Operator/Troubleshooter</b>	<b>43</b>
<b>Total Switching Dispatcher</b>	<b>14</b>
<b>Total Employees</b>	<b>470</b>

**(e)(10)** *Quarterly and year-to-date information on contractor hours and dollars for transmission and distribution operation and maintenance.*

**CONFIDENTIAL INFORMATION**

**2nd Quarter 2017**

Contractor Dollars: \$REDACTED  
Contractor Hours: REDACTED

**YTD 2017**

Contractor Dollars: \$ REDACTED  
Contractor Hours: REDACTED

**(e)(11)** *Monthly call-out acceptance rate for transmission and distribution maintenance workers presented in terms of both the percentage of accepted call-outs and the amount of time it takes the EDC to obtain the necessary personnel. A brief description of the EDC's call-out procedure should be included when appropriate.*

**CONFIDENTIAL INFORMATION**

**Call-Out Acceptance Rate – 2nd Quarter 2017**

**REDACTED**

**Amount of Time it Takes to Obtain the Necessary Personnel – 2nd Quarter 2017**

**REDACTED**

Duquesne Light Company  
Second Quarter 2017 Electric Reliability Report

**(d)(2)** *The name, title, telephone number and e-mail address of the persons who have knowledge of the matters, and can respond to inquiries.*

Glenn E Smith Jr. – Sr. Manager, Operations Compliance & Regulatory Reporting  
(412) 393-8318, [gsmith@duqlight.com](mailto:gsmith@duqlight.com)

Jaime Bachota – Sr. Manager, Accounting & Financial Reporting  
(412) 393-1122, [jbachota@duqlight.com](mailto:jbachota@duqlight.com)

**ATTACHMENT A**

**(e)(3)** *Rolling 12-month reliability index values (SAIFI, CAIDI, SAIDI, and if available, MAIFI) and other pertinent information such as customers served, number of interruptions, customer minutes interrupted, number of lockouts, and so forth, for the worst performing 5% of the circuits in the system.*

Rank	Circuit No	Circuit Name	Feeder Device	Device Lockouts	Last Lockout	Circuit KVA	Total KVA Interrupted	Total KVA-Minutes	SAIDI	SAIFI	CAIDI
1	22869	Midland-Cooks Ferry	65K	7	11/11/2016	37666	16836213	114808	446.987	3.0481	146.65
2	23953	Evergreen	ER703	5	6/19/2017	31030	10367773	89494	334.121	2.8841	115.85
3	23750	Dravosburg	ER14	5	6/13/2017	34751	25231461	117703	726.064	3.387	214.37
4	23714	Pine Creek	WA609	5	5/29/2017	22575	25699167	138752	1138.39	6.1463	185.22
5	23770	Traverse Run	R100	5	5/2/2017	19469	14759745	113245	758.115	5.8167	130.33
6	23710	Pine Creek	80E	5	3/27/2017	32810	8619099	67952	262.697	2.0711	126.84
7	23631	Sewickley	WR723	5	3/1/2017	31956	11332950	73153	354.642	2.2892	154.92
8	23810	Brentwood	100K	4	6/3/2017	18622	14165787	129643	760.702	6.9618	109.27
9	23670	Montour	WA527	4	5/7/2017	34778	13016578	125887	374.276	3.6197	103.4
10	23640	Midland	BKR	4	4/16/2017	27835	9709120	108483	348.81	3.8974	89.499
11	23870	Mt. Nebo	R100	4	3/10/2017	26795	11967692	80432	446.639	3.0018	148.79
12	23660	Crescent	80E	4	12/17/2016	29122	9631493	50670	330.729	1.7399	190.08
13	23781	Valley	WR535	3	6/13/2017	18340	11933858	42062	650.701	2.2935	283.72
14	23761	Wilmerding	65K	3	6/10/2017	30684	8232942	24147	268.314	0.787	340.95
15	23688	Chess	EA306	3	6/9/2017	25797	7901554	65299	306.297	2.5313	121.01
16	23572	Brunot Is.	BKR	3	4/13/2017	20637	8057771	75219	390.453	3.6449	107.12
17	23869	Wildwood	WR975	3	3/8/2017	18745	10620024	53895	566.552	2.8752	197.05
18	23837	California	R140	3	3/7/2017	18878	9936465	171812	526.352	9.1012	57.833
19	23769	Bryn Mawr	80E	2	6/13/2017	19429	8240562	51568	424.137	2.6542	159.8
20	23707	North	WR381	2	6/4/2017	21142	9013775	25601	426.344	1.2109	352.09
21	23745	Oakland	80E	2	6/3/2017	28489	15112691	67077	530.475	2.3545	225.3
22	23871	Mt Nebo	20K	2	2/25/2017	17687	8622759	58155	487.52	3.288	148.27
23	23731	Universal	ER8	2	8/16/2016	12461	10329074	55762	828.912	4.4749	185.23
24	23764	Wilmerding	BKR	2	7/11/2016	25634	7897722	70931	308.096	2.7671	111.34
25	22540	Pine Creek-West Deer	BKR	2	6/15/2017	2000	8733144	12456	4366.57	6.228	701.12
26	23860	Wilson	ER784	2	5/5/2017	26570	9901527	126579	372.658	4.764	78.224
27	23610	Findlay	BKR	1	3/8/2017	25975	17630709	63241	678.757	2.4347	278.79

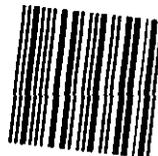
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State Regulatory Coordinator  
411 Seventh Avenue, 15-7  
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Ms. Rosemary Chiavetta, Secretary  
Pennsylvania Public Utility Commission  
Commonwealth Keystone Building  
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Harrisburg, PA 17120