City of Naperville DPU - Electric OUTAGE SUMMARIES June 2018

| Total Customers this Month        | 59,623        | Days of Month |
|-----------------------------------|---------------|---------------|
| Total Customer Minutes this Month | 2,575,713,600 | 30            |

| Outage Totals                            |                              |            |                         |  |
|--|------------------------------|------------|-------------------------|--|
|  |                              | This Month | This Month<br>Last Year |  |
| Unsche                                   | duled Outages                |            |                         |  |
| Long                                     | # Outages                    | 14         | 24                      |  |
|  | # Customers Out              | 964        | 3743                    |  |
|  | # Minutes Out                | 1,311      | 4115                    |  |
|  | # Customer Minutes Out       | 49,767     | 148885                  |  |
|  | # Within City System         | 14         | 24                      |  |
|  | # Supply to City Minutes     | 0          | 0                       |  |
| Short                                    | # Outages (Blinks)           | 0          | 0                       |  |
|  | # Customers Affected         | 0          | 0                       |  |
|  | # Within City System         | 0          | 0                       |  |
|  | # Supply to City Minutes     | 0          | 0                       |  |
| Schedul                                  | led Outages                  |            |                         |  |
| Long                                     | # Outages                    | 0          | 0                       |  |
|  | # Customers Out              | 0          | 0                       |  |
|  | # Minutes Out                | 0          | 0                       |  |
|  | # Customer Minutes Out       | 0          | 0                       |  |
|  | # Within City System         | 0          | 0                       |  |
|  | # Supply to City Minutes     | 0          | 0                       |  |
| Short                                    | # Outages (Blinks)           | 0          | 0                       |  |
|  | # Customers Affected         | 0          | 0                       |  |
|  | # Within City System         | 0          | 0                       |  |
|  | # Supply to City Minutes     | 0          | 0                       |  |
| Totals                                   |                              |            |                         |  |
| Total Lo                                 | ng Outages                   | 14         | 24                      |  |
| Total Sh                                 | Total Short Outages (Blinks) |            | 0                       |  |
| Total Cu                                 | Total Customers Out (Long)   |            | 3743                    |  |
| Total Customers Affected (Short- Blinks) |                              | 0          | 0                       |  |
| Total Customer Minutes Out               |                              | 49,767     | 148885                  |  |
| Total Outages Within City System         |                              | 14         | 24                      |  |
| Total Ou                                 | tages in Supply to City      | 0          | 0                       |  |

|       | Number of Outages (by Cause)  |                   |            |         |  |  |  |
|-------|-------------------------------|-------------------|------------|---------|--|--|--|
|       |                               |                   |            |         |  |  |  |
| Cause | Description                   | <b>Total This</b> | This Month | Rolling |  |  |  |
| #     |                               | Month             | Last Year  | AT      |  |  |  |
| 0     | Supply to City                | 0                 | 0          | 0       |  |  |  |
| 1     | Overhead Equipment Failure    | 1                 | 4          | 4       |  |  |  |
| 2     | Underground Equipment Failure | 6                 | 11         | 76      |  |  |  |
| 3     | Weather                       | 0                 | 0          | 4       |  |  |  |
| 4     | Birds, Animals, Snakes, etc.  | 5                 | 3          | 23      |  |  |  |
| 5     | Trees                         | 0                 | 1          | 6       |  |  |  |
| 6     | Foreign Interference          | 0                 | 0          | 0       |  |  |  |
| 7     | Human                         | 1                 | 1          | 5       |  |  |  |
| 8     | Other                         | 0                 | 1          | 2       |  |  |  |
| 9     | Unknown                       | 1                 | 3          | 10      |  |  |  |
| 10    | Vehicle                       | 0                 | 0          | 8       |  |  |  |
|       | Total                         | 14                | 24         | 138     |  |  |  |

| 12 Month Outage Statistics    |                        |                                  |  |  |  |
|-------------------------------|------------------------|----------------------------------|--|--|--|
| Index                         | As of<br>This<br>Month | As of<br>This Month<br>Last Year |  |  |  |
| ASAI (%)                      | 99.9972                | 99.9955                          |  |  |  |
| CAIDI (Long) (min)            | 47.11                  | 53.93                            |  |  |  |
| SAIDI (Long) (min)            | 14.65                  | 23.77                            |  |  |  |
| SAIFI (Long) (ints/tot cust)  | 0.31                   | 0.44                             |  |  |  |
| SAIFI (Short) (ints/tot cust) | 0.00                   | 0.00                             |  |  |  |

ASAI - Average Service Availability Index

(customer minutes available/total customer minutes, as a %)

CAIDI - Customer Average Interruption Duration Index (average minutes interrupted per interrupted customer)

SAIDI - System Average Interruption Duration Index

(average minutes interrupted per customer for all customers)

SAIFI (Long) - System Average Interruption Frequency Index

(# of long interruptions per customer for all customers)

SAIFI (Short) - System Average Interruption Frequency Index (# of short interruptions per customer for all customers)

Long - >1 min; Short - <1 min Cause # - see table on page 3