## Table PR-19 Identified Needs and Transmission Lines Requiring New Right-of-Way

| Identified Need   | Potential Solutions  | Approx. line<br>mileage |            | System<br>Need | Projected<br>In- | Planning |
|---|--|-------------------------|------------|----------------|------------------|----------|
|   |  | Total                   | New<br>ROW | Year           | service<br>Year  | Zone     |
| T-D interconnection request   | Construct 115-kV line from new Woodmin<br>Substation to the Clear Lake Substation      | 7.5                     | 7.5        | 2012           | 2012             | 1        |
| relieve overloads or low voltages<br>under contingency (B2, C5)                               | Construct 345-kV line from Rockdale to<br>Cardinal                                     | 32.4                    | 32.4       | 2013           | 2013             | 3        |
| relieve overloads or low voltages<br>under contingency (69B3),<br>economics                   | Construct 18th Road-Chandler double circuit 138-kV lines and operate at 138/69         | 4                       | 4          | 2014           | 2014             | 2        |
| economics   | Construct Pleasant Prairie-Zion Energy<br>Center 345-kV line                           | 7                       | 7          | 2014           | 2014             | 5        |
| T-D interconnection request   | Construct 138-kV lines to serve<br>Milwaukee County T-D interconnection<br>request     | 2                       | 2          | 2015           | 2015             | 5        |
| economics, relieve overloads or low voltages under contingency (69B2)                         | Construct Fairwater-Mackford Prairie 69-<br>kV line                                    | 4                       | 4          | >2026          | 2017             | 1        |
| policy benefits   | Construct Badger Coulee 345-kV line  | 118                     | 118        | 2018           | 2018             | 3        |
| accommodate new generation  | Construct a new Barnhart - Plymouth -<br>Howards Grove - Erdman 138-kV circuit         | 18                      | 18         | 2018           | 2018             | 4        |
| relieve overloads or low voltages<br>under contingency (69B2), T-D<br>interconnection request | Construct new 138-kV line from North<br>Lake Geneva to South Lake Geneva<br>Substation | 3.4                     | 3.4        | >2026          | 2018             | 3        |
| T-D interconnection request, relieve<br>overloads or low voltages under<br>contingency (69B2) | Construct Spring Valley-Twin Lakes-<br>South Lake Geneva 138-kV line                   | 24                      | 15         | 2019           | 2019             | 3 & 5    |
| policy benefits   | Construct Dubuque-Spring Green-<br>Cardinal 345-kV line                                | 80                      | 80         | 2020           | 2020             | 3        |
| relieve overloads or low voltages<br>under contingency (B2)                                   | Construct a Lake Delton-Birchwood 138-<br>kV line                                      | 5                       | 5          | >2026          | 2020             | 3        |
| relieve overloads or low voltages<br>under contingency (69B2)                                 | Construct second Dunn Road-Egg<br>Harbor 69-kV line                                    | 12.66                   | 12.66      | >2026          | 2021             | 4        |
| relieve overloads or low voltages<br>under contingency (69B2, 69B3)                           | Construct Shoto to Custer 138-kV line  | 6.9                     | 6.9        | >2026          | 2022             | 4        |
| relieve overloads or low voltages<br>under contingency (B2)                                   | Construct a Hubbard-East Beaver Dam<br>138-kV line                                     | 10                      | 10         | >2026          | 2022             | 3        |