



Unit Cost Guide for Distributed Energy Resource Interconnections

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Disclaimer:

The following cost estimates are not binding for actual facilities costs and are provided for informational purposes only to assist Developers in their planning for DERs. These cost estimates have not been determined in connection with any particular interconnection and are subject to change at any time by Appalachian Power Company. In addition, other substation upgrades and protection facilities that are not identified below may be required for transformers. The distribution and substation improvement estimates are for materials only; engineering, labor, and construction costs are adders. Notwithstanding these cost estimates, a Developer shall be responsible for the actual costs for any required distribution and substation improvements required for the interconnection of its DER.

Distribution Improvements:

1-Mile of 1-phase Wire Upgraded to 3-phase 556 AL ¹	\$ 379k - \$ 570k
1-Mile 3-phase Re-Conductor to 556 AL ¹	\$ 385k - \$ 580k
Adder ² - Distribution Wire Upgrade (Engineering \ Mobilization \ Construction Management)	\$ 25k - \$ 340k
Install New or Replace Existing Recloser with 1- 3-phase Electronic Unit ¹	\$ 69k - \$ 105k
Install New 1- 1-phase Regulator ¹	\$ 25k - \$ 70k
Install New 3- 1-phase Regulators as a Bank ¹	\$ 76k - \$ 200k
Install Standard DER Attachment Facilities (recloser, meter, telemetry) ¹	\$ 165k - \$ 250k
Integrate DER Facility into Existing DACR Scheme	\$ 38k - \$ 60k
Adder ³ - Off-Road Work - 1- Mile – Varies	\$ 180k - \$ 580k

Substation Improvements:

Adding New Circuit Breaker at Substation	\$ 230k - \$ 800k
Install New or Replace Existing Station Transformer with 25 MVA Station Transformer	\$ 1,500k - \$3,900k
Reprogram Existing LTC \ Regulator Controls	\$ 1.1k - \$ 5k
Upgrade Existing LTC \ Regulator Controls	\$ 5.6k - \$ 25.5k
Adder ⁴ - TX Engineering \ Mobilization \ Construction Management	\$ 173k - \$ 1,200k

¹ Per unit cost includes poles and ancillary equipment.

² This adder is applicable to the following distribution improvement work, and is not on a per mile basis:

- 1-Mile of 1-phase Wire Upgraded to 3-phase 556 AL.
- 1-Mile 3-phase Re-Conductor to 556 AL.

³ These adders could apply to any distribution improvement work.

⁴ This adder is applicable to all substation improvement work.