Interconnection Technical Working Group

12/19/18 G. Smith Summary to EC 1/11/19

This working group is co-chaired by the NYDPS and NYSERDA to discuss and resolve technical issues with regard to interconnecting with inverter-based resources on the TO's electrical systems at the subtransmission and distribution levels. Participants include the NY TOs (JU is a joint utility group comprised of the NY TOs), NYSERDA, the NY DPS and equipment suppliers.

The CESIR is a Coordinated Electrical System Interconnection Review process.

A preliminary screening criteria document includes determining the connection point, if certified equipment is used (UL 1741), exceedance of any EPS ratings, compatibility of the grounding configuration, a simplified penetration test (15% of peak load and adequacy of feeder capacity. The document was reviewed and updated at the meeting.

The group also has developed and maintains a Utility Requirements Matrix which tabulates requirements for back feed, protection, monitor and control as well as effective grounding requirements. Cost estimates are provided for each of the TOs. Note that monitor and control is not required by any of the utilities for generation sources less than 50 kw.

The group has developed interim guidelines for existing PV projects in the queue where energy storage systems (ESS) are being added to an existing application in order to comply with the DPS "energy roadmap". NY PSC order (CASE 18-E-013) states "The Roadmap anticipates that the deployment of **1,500 MW of energy storage by 2025, and between 2,800 and 3,600 MW by 2030**, will result in reductions in system peak load demand during critical periods, increases in the overall efficiency and resiliency of the electric grid, and displacement of fossil fuel-based generation."

BOREGA solar systems presented a paper on automatic control of combined PV and ES systems to curtail output so as not to exceed electric system limits and BEST (NY Battery and Energy Storage Consortium) presented a paper on energy storage use cases.

The JU (joint NY utilities) are working on monitor and control equipment requirements and surveying various suppliers with a goal of developing a least cost approach for various level of generation (< 50 KW, 50-500 KW, > 500 KW).

The ITWG website, google "NYDPS ITWG", contains meeting information and includes links to meeting materials presented at each meeting. For 2019, meetings are tentatively scheduled for 2/20,3/27,4/24 and 6/26.