



Supplemental GMDVA Scope and Process and Preliminary Findings

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Supplemental Geomagnetic Disturbance Vulnerability Assessment (GMDVA)

- ERCOT presented a brief [GMD introduction](#) at the May 2020 RPG meeting and an [overview of the Benchmark GMDVA scope](#) at the July 2020 RPG meeting
- A draft of the Benchmark and Supplemental GMDVA Scope and Process is posted to the May 2021 RPG meeting page

Key Differences in the Supplemental GMDVA Scope from the Benchmark GMDVA

- The NERC defined geoelectric field peak amplitude for the supplemental GMD event of 12 V/km will be used across the ERCOT system
- If applicable, suggested actions resulting from thermal impact assessments for transformers with maximum effective GIC flows exceeding the 85 A/phase supplemental GMD threshold will be incorporated
 - A thermal impact assessment was required for one transformer in the 2021 Supplemental GMDVA

Supplemental GMDVA: Supplemental GMD Event Caused Outages

- Market Notice M-A062118-07 PGRR requested Resource Entities and Transmission Service Providers (TSPs) to provide a list of potential equipment that may be removed from service as a result of Protection System operation or misoperation due to harmonics that could result from the supplemental GMD event
 - Currently received submissions have been applied to the cases
 - Thermal impact assessment has been included in the preliminary analysis

Preliminary Findings and Recommendation

- Based on currently received supplemental GMD event caused outages:
 - No low voltage violations
 - No potential cascading for BES
- No proposed changes to the steady state voltage performance criteria for both the benchmark and supplemental GMDVAs

Questions?

Please send any questions or comments to
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