Unoffical Nomination Form
Project 2015-10 Single Points of Failure – TPL-001

Standards Authorization Request Drafting Team

**Do not** use this form for submitting nominations. Use the [electronic form](https://www.nerc.net/nercsurvey/Survey.aspx?s=6ffac353bc67467da08c22db611448ee) to submit nominations by **8 p.m. Eastern, Tuesday, December 1, 2015.** This unofficial version is provided to assist nominees in compiling the information necessary to submit the electronic form.

Documents and information about this project are available on the [project page](http://www.nerc.com/pa/Stand/Pages/Project-2015-10-Single-Points-of-Failure-TPL-001.aspx). If you have any questions, contact Standards Developer, Katherine Street (via email) or at (404) 446-9702.

By submitting a nomination form, you are indicating your willingness and agreement to actively participate in the review or drafting team meetings if appointed by the Standards Committee. If appointed, you are expected to attend most of the face-to-face drafting team meetings, as well as participate in all the team meetings held via conference calls.

The time commitment for these projects is expected to be up to two face-to-face meetings per quarter (on average two full working days each meeting) with conference calls scheduled as needed to meet the agreed-upon timeline the review or drafting team sets forth. Drafting teams also will have side projects, either individually or by subgroup, to present to the larger team for discussion and review. Lastly, an important component of the review and drafting team efforts is outreach. Members of the team should be conducting outreach during development prior to posting to ensure all issues can be discussed and resolved.

Previous drafting or review team experience is beneficial, but not required. A brief description of the desired qualifications, expected commitment, and other pertinent information is included below.

Project 2015-10 Single Points of Failure

The purpose of the proposed project is to draft a Standards Authorization Request (SAR) to address the findings of the System Protection and Control Subcommittee (SPCS) and the System Modeling and Analysis Subcommittee (SAMS) assessment of protection system single points of failure, conducted in response to FERC Order No. 754,[[1]](#footnote-1) including analysis of data from the NERC Rules of Procedure Section 1600 Request for Data or Information. The assessment confirms the existence of a reliability risk associated with single points of failure in protection systems that warrants further action.

As such, regarding single points of failure in protection systems, the SPCS and the SAMS proposed the following recommendations for modifying NERC Reliability Standard TPL-001-4 (Transmission System Planning Performance Requirements) through the NERC standards development process identified in the NERC Rules of Procedure:

* For Table 1 – Steady State & Stability Performance Planning Events, Category P5:
	+ Replace “relay” with “component of a Protection System,” and
	+ Add superscript “13” to reference footnote 13 for the replaced term under the “Category” column.
* For Table 1 – Steady State & Stability Performance Extreme Events, under the Stability column, No. 2:
	+ Remove the phrase “or a relay failure” from items a, b, c, and d to create distinct events only for stuck breakers.
	+ Append four new events for the same items a, b, c, and d in the above bulleted item to create distinct events replacing “a relay failure” with “a component failure of a Protection System.”
* Replace footnote 13 in TPL-001-4 with, “The components from the definition of “Protection System” for the purposes of this standard include (1) protective relays that respond to electrical quantities, (2) single-station DC supply that is not monitored for both low voltage and open circuit, with alarms centrally monitored (i.e., reported within 24 hours of detecting an abnormal condition to a location where corrective action can be initiated), and (3) DC control circuitry associated with protective functions through the trip coil(s) of the circuit breakers or other interrupting devices.”[[2]](#footnote-2)

Modify TPL-001-4 (Part 4.5) so that extreme event assessments must include evaluation of the three-phase faults the described component failures of a Protection System13 that produce the more severe system impacts. For example, add a new second sentence that reads “[t]he list shall consider each of the extreme events in Table 1 – Steady State & Stability Performance Extreme Events; Stability column item number 2.”

**Standards affected:** TPL-001-4

We are seeking a cross section of the industry to participate on the team, but in particular are seeking individuals who have experience and expertise with transmission planning in the United States and/or Canada.

Experience with developing standards inside or outside (e.g., IEEE, NAESB, ANSI, etc.) of the NERC process is beneficial, but is not required, and should be highlighted in the information submitted, if applicable.

Individuals who have facilitation skills and experience and/or legal or technical writing backgrounds are also strongly desired. Please include this in the description of qualifications as applicable.

|  |  |
| --- | --- |
| Name:  |  |
| Organization: |  |
| Address: |  |
| Telephone: |  |
| E-mail: |  |
| Please briefly describe your experience and qualifications to serve on the requested Standard Drafting Team (Bio): |
| **If you are currently a member of any NERC drafting team, please list each team here:**[ ]  Not currently on any active SAR or standard drafting team. [ ]  Currently a member of the following SAR or standard drafting team(s): |
| **If you previously worked on any NERC drafting team please identify the team(s):** [ ]  No prior NERC SAR or standard drafting team.[ ]  Prior experience on the following team(s): |
| Select each NERC Region in which you have experience relevant to the Project for which you are volunteering: |
| [ ]  TRE[ ]  FRCC[ ]  MRO | [ ]  NPCC[ ]  RFC [ ]  SERC | [ ]  SPP[ ]  WECC[ ]  NA – Not Applicable |
| **Select each Industry Segment that you represent:** |
| [ ]  | 1 — Transmission Owners |
| [ ]  | 2 — RTOs, ISOs |
| [ ]  | 3 — Load-serving Entities |
| [ ]  | 4 — Transmission-dependent Utilities |
| [ ]  | 5 — Electric Generators |
| [ ]  | 6 — Electricity Brokers, Aggregators, and Marketers |
| [ ]  | 7 — Large Electricity End Users |
| [ ]  | 8 — Small Electricity End Users |
| [ ]  | 9 — Federal, State, and Provincial Regulatory or other Government Entities |
| [ ]  | 10 — Regional Reliability Organizations and Regional Entities |
| [ ]  | NA – Not Applicable |
| Select each Function**[[3]](#footnote-3)** in which you have current or prior expertise:  |
| [ ]  Balancing Authority[ ]  Compliance Enforcement Authority[ ]  Distribution Provider[ ]  Generator Operator[ ]  Generator Owner[ ]  Interchange Authority[ ]  Load-serving Entity [ ]  Market Operator[ ]  Planning Coordinator | [ ]  Transmission Operator [ ]  Transmission Owner[ ]  Transmission Planner[ ]  Transmission Service Provider [ ]  Purchasing-selling Entity[ ]  Reliability Coordinator [ ]  Reliability Assurer[ ]  Resource Planner |
| Provide the names and contact information for two references who could attest to your technical qualifications and your ability to work well in a group: |
| Name: |  | Telephone: |  |
| Organization: |  | E-mail: |  |
| Name: |  | Telephone: |  |
| Organization: |  | E-mail: |  |

1. In Order No. 754, the Commission expressed its concern that there was an issue concerning the study of a single point of

failure on protection systems. To address this issue, the Commission directed FERC staff to meet with NERC and its appropriate

subject matter experts to explore this reliability concern. The Commission also directed NERC to submit an informational filing

within six months explaining whether there is a further system protection issue that needs to be addressed and if so, what forum

and process should be used to address it and what priority it should be afforded. *See Interpretation of Transmission Planning*

*Reliability Standard*, Order No. 754, 136 FERC ¶ 61,186 at PP 19-20 (2011). [↑](#footnote-ref-1)
2. See Order 754 (NERC website) Requests for Clarifications and Responses ([http://www.nerc.com/pa/Stand/Order%20754%20DL/Order\_
754-Requests\_for\_Clarification\_and\_Responses\_July2013.pdf](http://www.nerc.com/pa/Stand/Order%20754%20DL/Order_754-Requests_for_Clarification_and_Responses_July2013.pdf)). [↑](#footnote-ref-2)
3. These functions are defined in the NERC [Functional Model](http://www.nerc.com/page.php?cid=2%7C247%7C108), which is available on the NERC web site. [↑](#footnote-ref-3)