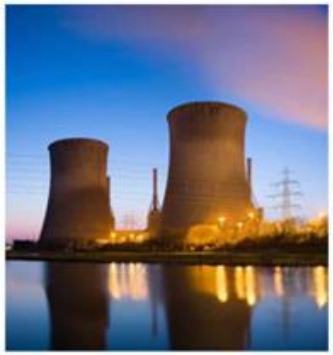
NERC
NORTH AMERICAN ELECTRIC RELIABILITY CORPORATION

Project 2019-03 Cyber Security Supply Chain Risk Management

February 4, 2020
1:00 p.m. – 2:30 p.m. Eastern

RELIABILITY | RESILIENCE | SECURITY

Agenda

Administrative

- Review NERC Antitrust Compliance Guidelines and Public Announcement

Agenda

- Drafting Team
- Project Status
- Standards Updates
- Next Steps
- Questions and Answers

NERC Antitrust

It is NERC's policy and practice to obey the antitrust laws and to avoid all conduct that unreasonably restrains competition. This policy requires the avoidance of any conduct that violates, or that might appear to violate, the antitrust laws. Among other things, the antitrust laws forbid any agreement between or among competitors regarding prices, availability of service, product design, terms of sale, division of markets, allocation of customers or any other activity that unreasonably restrains competition. It is the responsibility of every NERC participant and employee who may in any way affect NERC's compliance with the antitrust laws to carry out this commitment.

NERC Public Disclaimer

Participants are reminded that this meeting is public. Notice of the meeting was widely distributed. Participants should keep in mind that the audience may include members of the press and representatives of various governmental authorities, in addition to the expected participation by industry stakeholders.

Project 2019-03 Standard Drafting Team (SDT)

Name	Organization/ Company
JoAnn Murphy (Chair)	PJM Interconnection L.L.C.
Tony Hall (Vice Chair)	Louisville Gas & Electric Kentucky Utilities
Howard Hunt	Southern Company
Jeffery Sweet	American Electric Power
Parisa Mahdian	Ontario Power Generation
Sharon Koller	America Transmission Company, LLC
Jason Snodgrass	Georgia Transmission Corp
Brian Gayle	Dominion Energy, Inc.
John Hargrove	John E Hargrove PE

Timeline Project 2019-03

- FERC Order issued October 18, 2018
  - Directed inclusion of EACMS
- NERC Cyber Security Supply Chain Risks Report published May 17, 2019
  - Recommended inclusion of PACS
- SAR Drafting Team met September 2019
- SDT Team held first in-person meeting November 19-21, 2019
- This is the formal initial posting
  - 45-day comment period, January 27 – March 11, 2020
  - 10-day ballot period, March 2 – March 11, 2020

Standards Updates

- Goal is to make minimal changes to meet the FERC Order 850 and the NERC Supply Chain report
  - Changes include adding EACMS and PACS to CIP-005, CIP-010, and CIP-013
- Coordinating with ongoing CIP projects
  - 2016-02 – Modifications to CIP Standards
  - 2019-02 – BES Cyber System Information Access Management

Draft CIP-005-7

CIP-005-~~7~~6 Table R2 – Remote Access Management			
Part	**Applicable Systems**	**Requirements**	**Measures**
2.4	High Impact BES Cyber Systems and their associated: 1. PCA; 2. PACS; and ~~1.~~3. EACMS Medium Impact BES Cyber Systems with External Routable Connectivity and their associated: 1. PCA; 2. PACS; and ~~1.~~3. EACMS	Have one or more methods for determining active vendor remote access sessions (including Interactive Remote Access and system-to-system remote access).	Examples of evidence may include, but are not limited to, documentation of the methods used to determine active vendor remote access (including Interactive Remote Access and system-to-system remote access), such as: • Methods for accessing logged or monitoring information to determine active vendor remote access sessions; • Methods for monitoring activity (e.g. connection tables or rule hit counters in a firewall, or user activity monitoring) or open ports (e.g. netstat or related commands to display currently active ports) to determine active system to system remote access sessions; or • Methods that control vendor initiation of remote access such as vendors calling and requesting a second factor in order to initiate remote access.

Draft CIP-005-7

CIP-005-~~6~~7 Table R2 – Remote Access Management			
Part	**Applicable Systems**	**Requirements**	**Measures**
2.5	High Impact BES Cyber Systems and their associated: 1. EACMS; 2. PACS; and ~~1.~~3. PCA Medium Impact BES Cyber Systems with External Routable Connectivity and their associated: 1. EACMS; 2. PACS; and ~~1.~~3. PCA ~~PCA~~	Have one or more method(s) to disable active vendor remote access (including Interactive Remote Access and system-to-system remote access).	Examples of evidence may include, but are not limited to, documentation of the methods(s) used to disable active vendor remote access (including Interactive Remote Access and system-to-system remote access), such as: • PCA or BES Cyber System Methods to disable vendor remote access at the applicable Electronic Access Point for system-to-system remote access; or • PCA or BES Cyber System Methods to disable vendor Interactive Remote Access at the applicable Intermediate System. • PACS or EACMS Methods to disable active vendor remote access either through electronic access point, an intermediate system or any other method of remote acess

Draft CIP-010-4

CIP-010-~~3~~4 Table R1 – Configuration Change Management			
Part	**Applicable Systems**	**Requirements**	**Measures**
1.6	High Impact BES Cyber Systems and their associated: 1. EACMS; and ~~1.~~2. PACS Medium Impact BES Cyber Systems and their associated: 1. EACMS; and ~~1.~~2. PACS Note: Implementation does not require the Responsible Entity to renegotiate or abrogate existing contracts (including amendments to master agreements and purchase orders). Additionally, the following issues are beyond the scope of Part 1.6: (1) the actual terms and conditions of a procurement contract; and (2) vendor performance and adherence to a contract.	Prior to a change that deviates from the existing baseline configuration associated with baseline items in Parts 1.1.1, 1.1.2, and 1.1.5, and when the method to do so is available to the Responsible Entity from the software source: 1.6.1. Verify the identity of the software source; and 1.6.2. Verify the integrity of the software obtained from the software source.	An example of evidence may include, but is not limited to a change request record that demonstrates the verification of identity of the software source and integrity of the software was performed prior to the baseline change or a process which documents the mechanisms in place that would automatically ensure the identity of the software source and integrity of the software.

Draft CIP-013-2

R1. Each Responsible Entity shall develop one or more documented supply chain cyber security risk management plan(s) for high and medium impact BES Cyber Systems and their associated EACMS and PACS. The plan(s) shall include: *[Violation Risk Factor: Medium] [Time Horizon: Operations Planning]*

1.1. One or more process(es) used in planning for the procurement of BES Cyber Systems and their associated EACMS and PACS to identify and assess cyber security risk(s) to the Bulk Electric System from vendor products or services resulting from: (i) procuring and installing vendor equipment and software; and (ii) transitions from one vendor(s) to another vendor(s).

1.2. One or more process(es) used in procuring BES Cyber Systems, and their associated EACMS and PACS, that address the following, as applicable:

1.2.1. Notification by the vendor of vendor-identified incidents related to the products or services provided to the Responsible Entity that pose cyber security risk to the Responsible Entity;

1.2.2. Coordination of responses to vendor-identified incidents related to the products or services provided to the Responsible Entity that pose cyber security risk to the Responsible Entity;

1.2.3. Notification by vendors when remote or onsite access should no longer be granted to vendor representatives;

1.2.4. Disclosure by vendors of known vulnerabilities related to the products or services provided to the Responsible Entity;

1.2.5. Verification of software integrity and authenticity of all software and patches provided by the vendor for use in the BES Cyber System and their associated EACMS and PACS; and

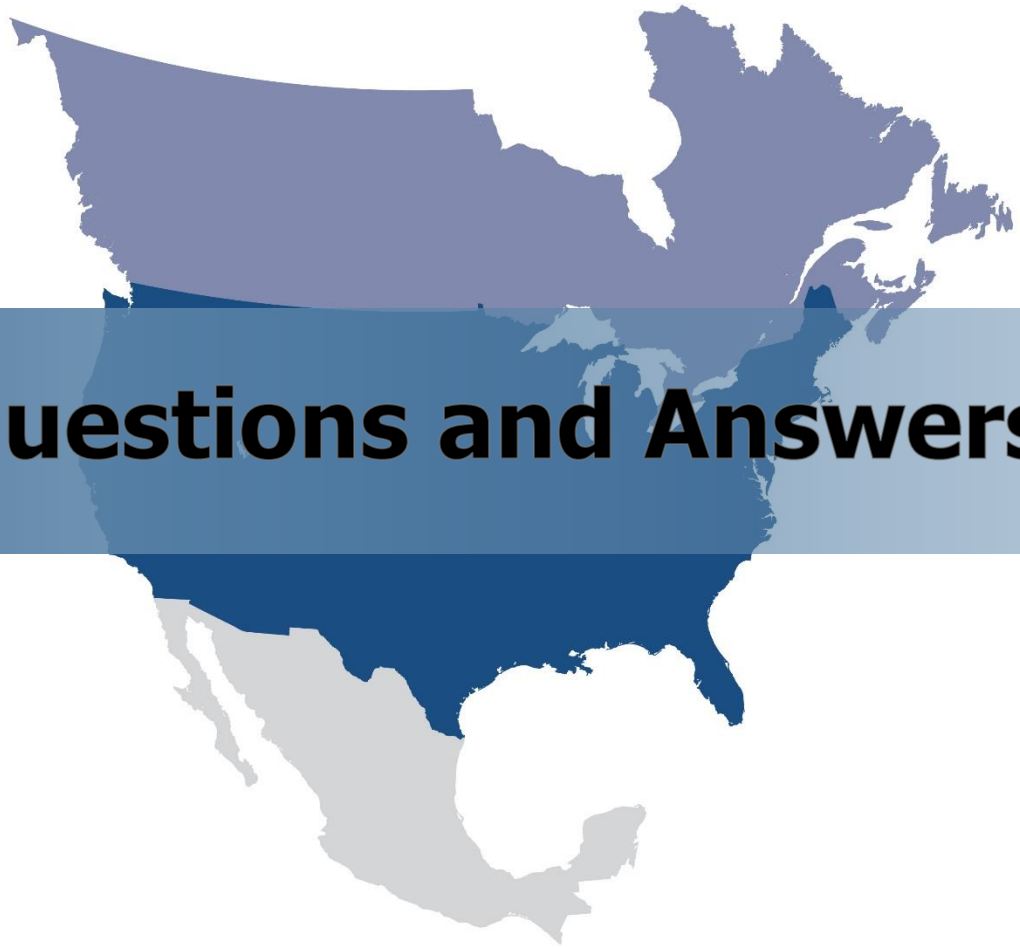
1.2.6. Coordination of controls for (i) vendor-initiated Interactive Remote Access, and (ii) system-to-system remote access with a vendor(s).

Next Steps

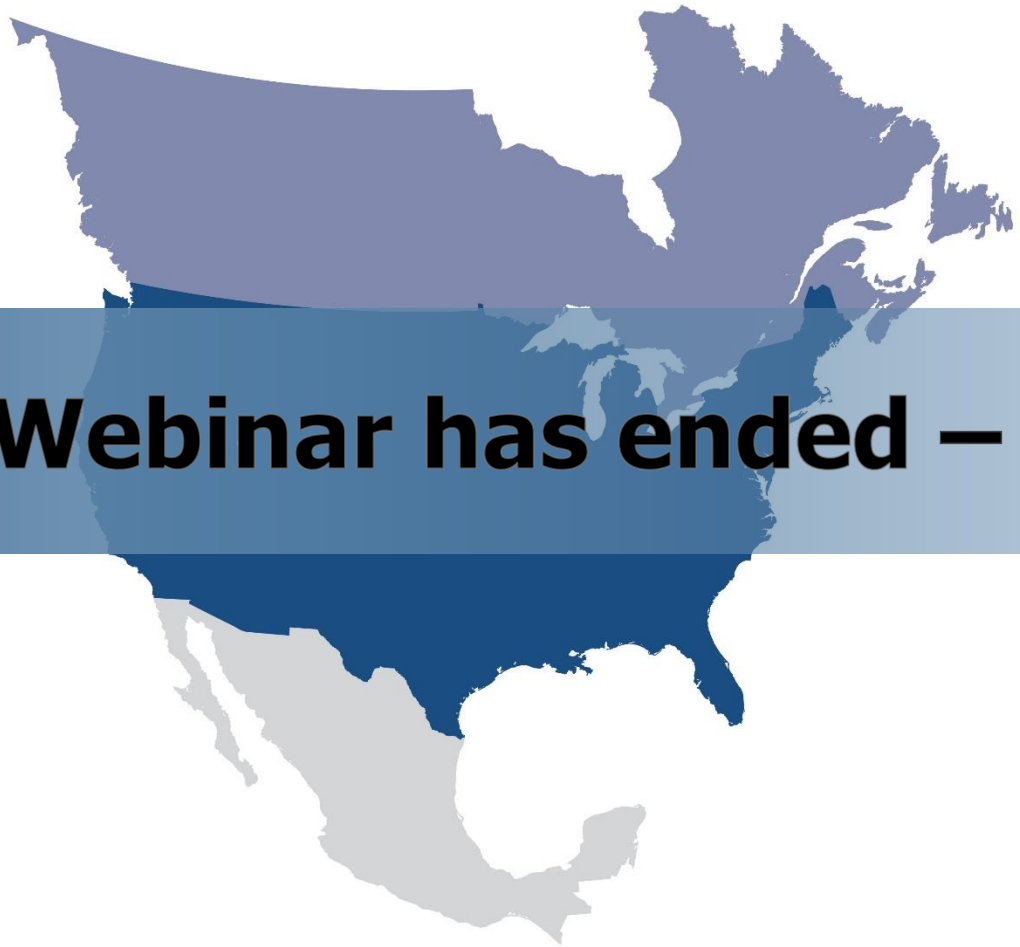
- Initial Ballot and Comment Period
  - January 27 – March 11, 2020
  - Project 2019-03 Project Page
- Respond to Comments
  - In-Person Meeting Week of March 23
  - Projected Second Posting April 22 – June 8, 2020
- Point of Contact
  - Alison Oswald, Senior Standards Developer
  - Alison.oswald@nerc.net or call 404-446-9668
- Webinar Posting
  - 48-72 hours
  - Standards Bulletin

Q & A Objectives

- Informal Discussion
  - Via the Q&A feature
  - Chat only goes to the host, not panelists
  - Respond to stakeholder questions
- Other
  - Some questions may require future team consideration
  - Please reference slide number, standard section, etc., if applicable
  - Team will address as many questions as possible
  - Webinar and chat comments are not a part of the official project record



Questions and Answers



Webinar has ended – Thank You