

TO: NERC Board of Trustees (BOT)

FROM: Thomas J. Galloway, NATF President and CEO



SUBJECT: NATF Periodic Update to the NERC BOT – February 2016

Attachments: 1. NATF Focus and Activities

The North American Transmission Forum (NATF) mission is to promote excellence in the reliable operation of the electric transmission system, with the vision to see reliability continuously improve. To augment our strategic goals, the NATF has focused on several topics that serve as the base for trilateral collaboration between NATF, EPRI and INPO. The 2016 focus areas are:

- Resiliency (All hazards, including Physical and Cyber security)
- Human Performance (reduced frequency and consequences of errors)
- Equipment Performance and Asset Management
- Operating Experience Exchange – including cause analyses and lessons learned
- Continuous performance improvement – mechanisms/processes including risk reduction

Some of the specific activities associated with the above are expanded upon in attachment 1 and summarized as follows:

- CIPV5 standards transition guidance and implementation support
- Detailed CIP-014 reference documents and cross-member calibration on results
- Switchyard reliability assistance on-site visits and self-assessment tools
- Stratification of member performance regarding key equipment failure rates
- Protection system misoperation reduction – training and practice documents
- Risk assessment and controls self-assessment tools and training webinars
- Resiliency workshops – comprehensive and topic-specific (GMD, EMP, etc.)
- Transmission line Right of Way (ROW) maintenance superior practices and coordination
- Modeling reference documents (various topics)
- Member assistance to support comprehensive event review and corrective action
- Cold weather lessons learned/preparation webinar

The NATF shares many common objectives with NERC. To advance these common objectives, and avoid redundant or conflicting efforts, we have undertaken periodic coordination meetings between the senior leadership of both organizations. The next such session is scheduled for January 29, 2016, with expected agenda topics including:

1. Targets for addressing equipment failures
2. Protection system misoperations, including related materials/goals
3. Transition to CIPV5
4. Human performance conferences in 2017
5. Compliance guidance—various technical topics
6. ROW maintenance
7. Geomagnetic disturbance (GMD)
8. Supply Chain management

Also, given the extremely complex and dynamic nature of the industry currently, the NATF has decided to make certain, specific work-products available beyond the membership. Two noteworthy areas involve recent NATF work on both physical security and modeling.

NATF member subject matter experts (SMEs) have produced high-quality work-products on both of these topics. And, with NATF Board concurrence, we have decided to make selected documents public – to the benefit of the entire industry. Such documents are available via www.natf.net and are listed below.

- NATF Modeling Data Request Guide (MOD-032)
- NATF Reference Documents – CIP-014 R1, R4 and R5
- NATF Reference Document – Generator Specifications
- NATF Reference Document – Power Flow Modeling
- NATF Reference Document – Reporting and Verification of Generating Unit Reactive Power Capability for Synchronous Machines

We plan to make other selected NATF work-products available outside the membership on a case by case basis.

cc:

ERO: G. Cauley, M. Lauby, J. Merlo, A. Koch, S. Noesse, C. Edge
NATF: R. Carter, K. Berent, C. Sills, Letter Log

Attachment 1 - NATF Focus and Activities

NATF/EPRI/INPO

- Five focus areas as framework for trilateral collaboration
 1. Resiliency (all hazards, including cyber/physical security)
 2. Equipment Performance / Asset Management
 3. Human Performance/ Error Reduction
 4. Operating Experience Exchange
 5. Performance improvement (mechanisms/processes)

NATF/EPRI specific

- Joint NATF/EPRI/INPO Resiliency Summit March 1-2, 2016 (Charlotte, NC)
 - Anticipate about 100 attendees
 - Risk prioritization tools and associated actions (practices/R&D)
 - Cross-industry panel on challenges and solutions
 - Vendor panel on challenges and solutions
 - Tutorials: EMPIEMI, GMD, Security
- Joint NATF/EPRI/INPO Resiliency Summit Aug 31-Sept 1, 2016 (Palo Alto, CA) - **Tentative**
 - Recovery/restoration emphasis
 - Blackstart paths
- Equipment Performance and Maintenance
 - Shared insights on failure rates, causes, and corrective actions
- Strategy Sessions: Grid Operations and Planning Synergies

NATF/INPO specific

- Shared Operating Experience/LOOP Reductions (IER 13-53)
- Nuclear plant switchyard self-assessment tools
- Emergency power runtime/fuel supply replenishment/blackstart

Attachment 1 - NATF Focus and Activities (Continued)

Other/General

- Systematic interaction with Members/ERO on Reliability Assurance Initiative (RAI)
 - Sharing of Key Principles and Lessons Learned
 - Strong Risk/Controls focus in Peer Reviews
 - Preparing Members for risk-focused audits
 - Interacting with ERO Staff (workshops, etc.)
- NATF Peer Review Program fully integrates:
 - Risk Assessment and Internal Controls
 - Human Performance/Error Reduction
 - Operating Experience Exchange
 - Physical Security
 - *Now offering tailored, focused reviews on specific reliability subsets*
- Other recently completed/near term activities:
 - Human Performance Symposium
 - System Operations – EMS focus
 - Train-the-Trainer workshop
 - Vegetation Management – detailed benchmarking/compliance template
 - Cold weather preparation webinar
 - Comprehensive peer challenge boards for review of selected member events
 - March 1-2 Resiliency Summit
- **Training Webinars (New NATF Offering)**
 - **Risk Assessment and Internal Controls (RAIC)**
 - **9/15/15: Internal Control Framework and Governance Overview (150+ attendees)**
 - **9/28/15: Risk Assessment (125 attendees)**
 - **1/20/16: Internal Control Design and Implementation**
 - **2/17/16: Control Effectiveness (Monitoring and Testing of Internal Controls)**
 - **Protection Systems / MisOperation Reduction**
 - **11/10/15: Directional Element Settings Practices (96 attendees)**
 - **11/12/15: Directional Comparison Blocking Scheme Settings Practices (186 attendees)**