

---

---

**UNITED STATES OF AMERICA  
BEFORE THE  
FEDERAL ENERGY REGULATORY COMMISSION**

**WESTERN ELECTRICITY COORDINATING COUNCIL ) Docket No. RM08-12-000  
REGIONAL RELIABILITY STANDARD REGARDING )  
AUTOMATIC TIME ERROR CONNECTION )**

**COMPLIANCE FILING OF THE  
NORTH AMERICAN ELECTRIC RELIABILITY CORPORATION  
IN RESPONSE TO PARAGRAPHS 26 AND 51 OF ORDER NO. 723 –  
DIRECTED MODIFICATION OF VIOLATION RISK FACTORS FOR REGIONAL  
RELIABILITY STANDARD BAL-004-WECC-01, AUTOMATIC TIME ERROR  
CORRECTION**

Rick Sergel  
President and Chief Executive Officer  
David N. Cook  
Vice President and General Counsel  
North American Electric Reliability  
Corporation  
116-390 Village Boulevard  
Princeton, NJ 08540-5721  
(609) 452-8060  
(609) 452-9550 – facsimile  
david.cook@nerc.net

Rebecca J. Michael  
Assistant General Counsel  
Holly A. Hawkins  
Attorney  
North American Electric Reliability  
Corporation  
1120 G Street, N.W.  
Suite 990  
Washington, D.C. 20005-3801  
(202) 393-3998  
(202) 393-3955 – facsimile  
rebecca.michael@nerc.net  
holly.hawkins@nerc.net

August 28, 2009

---

---

## TABLE OF CONTENTS

I.	INTRODUCTION	1
II.	NOTICES AND COMMUNICATIONS	2
III.	REVISIONS TO VIOLATION RISK FACTORS	2
III.	CONCLUSION	4

**EXHIBIT A** — REVISED VIOLATION RISK FACTORS FOR APPROVED RELIABILITY STANDARD BAL-004-WECC-01

**UNITED STATES OF AMERICA  
BEFORE THE  
FEDERAL ENERGY REGULATORY COMMISSION**

**WESTERN ELECTRICITY COORDINATING COUNCIL    ) Docket No. RM08-12-000  
REGIONAL RELIABILITY STANDARD REGARDING        )  
AUTOMATIC TIME ERROR CONNECTION            )**

**COMPLIANCE FILING OF THE  
NORTH AMERICAN ELECTRIC RELIABILITY CORPORATION  
IN RESPONSE TO PARAGRAPHS 26 AND 51 OF ORDER NO. 723 –  
DIRECTED MODIFICATION OF VIOLATION RISK FACTORS FOR REGIONAL  
RELIABILITY STANDARD BAL-004-WECC-01, AUTOMATIC TIME ERROR  
CORRECTION**

**I. INTRODUCTION**

The North American Electric Reliability Corporation (“NERC”),<sup>1</sup> in compliance with the directives in paragraphs 26 and 51 of the Federal Energy Regulatory Commission’s (“FERC”) May 21, 2009 Order (“Order No. 723”) in Docket No. RM08-12-000,<sup>2</sup> hereby submits modifications to the Western Electricity Coordinating Council’s (“WECC”) Violation Risk Factors (“VRFs”) for the BAL-004-WECC-01 Regional Reliability Standard as specified by FERC.<sup>3</sup> **Exhibit A** to this filing shows the VRFs that are being modified according to the FERC directive in Order No. 723.

---

<sup>1</sup> The Federal Energy Regulatory Commission (“FERC”) certified NERC as the electric reliability organization (“ERO”) in its order issued on July 20, 2006 in Docket No. RR06-1-000. *North American Electric Reliability Corporation*, “Order Certifying North American Electric Reliability Corporation as the Electric Reliability Organization and Ordering Compliance Filing,” 116 FERC ¶ 61,062 (July 20, 2006).

<sup>2</sup> *Western Electricity Coordinating Council Regional Reliability Standard Regarding Automatic Time Error Corrections*, 127 FERC ¶ 61,176 (2009) (Order No. 723).

<sup>3</sup> *Id.* at PP 26 and 51.

## **II. NOTICES AND COMMUNICATIONS**

Notices and communications with respect to this filing may be addressed to the following:

Rick Sergel  
President and Chief Executive Officer  
David N. Cook\*  
Vice President and General Counsel  
North American Electric Reliability Corporation  
116-390 Village Boulevard  
Princeton, NJ 08540-5721  
(609) 452-8060  
(609) 452-9550 – facsimile  
david.cook@nerc.net

Rebecca J. Michael\*  
Assistant General Counsel  
Holly A. Hawkins\*  
Attorney  
North American Electric Reliability Corporation  
1120 G Street, N.W.  
Suite 990  
Washington, D.C. 20005-3801  
(202) 393-3998  
(202) 393-3955 – facsimile  
rebecca.michael@nerc.net  
holly.hawkins@nerc.net

\*Persons to be included on FERC’s service list are indicated with an asterisk. NERC requests waiver of FERC’s rules and regulations to permit the inclusion of more than two people on the service list.

## **III. REVISIONS TO VIOLATION RISK FACTORS**

On March 16, 2007, FERC issued Order No. 693, approving 83 of the 107 Reliability Standards originally proposed by NERC.<sup>4</sup> In addition, pursuant to section 215(d)(5) of the Federal Power Act (“FPA”), FERC directed NERC to develop modifications to 56 of the 83 approved Reliability Standards. In Order No. 693, FERC approved a continent-wide Reliability Standard BAL-004-0 — Time Error Correction, but noted that WECC’s regional approach appeared to serve as a more effective means of accomplishing time error corrections.<sup>5</sup>

On July 29, 2008, NERC submitted for FERC approval Regional Reliability Standard BAL-004-WECC-01, which would apply to Balancing Authorities within the Western

---

<sup>4</sup> *Mandatory Reliability Standards for the Bulk-Power System*, Order No. 693, FERC Stats. & Regs. ¶ 31,242, *order on reh’g*, Order No. 693-A, 120 FERC ¶ 61,053 (2007).

<sup>5</sup> *Id.* at PP 377 and 382. The Commission also directed NERC to develop a modification to BAL-004-0 to include Levels of Non-Compliance and additional Measures for Requirement R3.

Interconnection. The primary purpose of the Regional Reliability Standard is to reduce the number of time error corrections imposed on the Western Interconnection by requiring Balancing Authorities that operate synchronously in the Western Interconnection to automatically correct for their contribution to time error.

On May 21, 2009, in Order No. 723, FERC approved Regional Reliability Standard BAL-004-WECC-01 — Automatic Time Error Correction. As a separate action in that same Order, FERC directed WECC to develop several modifications to the Regional Reliability Standard. This included, *inter alia*, to submit a filing within 60 days of the effective date of Order No. 723 revising the VRFs assigned to BAL-004-WECC-01, Requirements R1, R2, R3 and R4 from “Lower” to “Medium.” WECC subsequently authorized the directed changes to be presented to the NERC Board of Trustees for approval and filing with FERC and applicable governmental authorities in Canada. The revisions presented in **Exhibit A** of this filing were approved by the NERC Board of Trustees on August 5, 2009.

#### IV. CONCLUSION

NERC respectfully requests that the Commission accept this filing as compliant with Paragraphs 26 and 51 of Order No. 723 and approve the revised VRF assignments for BAL-004-WECC-01 included in **Exhibit A** to this filing.

Respectfully submitted,

Rick Sergel  
President and Chief Executive Officer  
David N. Cook  
Vice President and General Counsel  
North American Electric Reliability Corporation  
116-390 Village Boulevard  
Princeton, NJ 08540-5721  
(609) 452-8060  
(609) 452-9550 – facsimile  
david.cook@nerc.net

/s/ Rebecca J. Michael  
Rebecca J. Michael  
Assistant General Counsel  
Holly A. Hawkins  
Attorney  
North American Electric Reliability  
Corporation  
1120 G Street, N.W.  
Suite 990  
Washington, D.C. 20005-3801  
(202) 393-3998  
(202) 393-3955 – facsimile  
rebecca.michael@nerc.net  
holly.hawkins@nerc.net

**CERTIFICATE OF SERVICE**

I hereby certify that I have served a copy of the foregoing document upon all parties listed on the official service list compiled by the Secretary in this proceeding.

Dated at Washington, D.C. this 28th day of August, 2009.

/s/ Holly A. Hawkins

Holly A. Hawkins

*Attorney for the North American Electric  
Reliability Corporation*

**Exhibit A**

**Revised Violation Risk Factors**

**For Approved Reliability Standard BAL-004-WECC-01**

## *Exhibit A*

### *Four Revised Violation Risk Factors for WECC Regional Standard BAL-004-WECC-01*

<b>Standard Number</b>	<b>Requirement Number</b>	<b>Text of Requirement Segment</b>	<b>Original Proposed Violation Risk Factor</b>	<b>Revised Proposed Violation Risk Factor</b>
BAL-004-WECC-01	R1	Each BA that operates synchronously to the Western Interconnection shall continuously operate utilizing Automatic Time Error Correction (ATEC) in its Automatic Generation Control (AGC) system. <i>(See Standard for formula)</i>	Lower	Medium
BAL-004-WECC-01	R1.1	The absolute value of the WECC Automatic Time Error Correction term is limited as follows: <i>(See Standard for formula)</i>	N/A	N/A
BAL-004-WECC-01	R1.2	Large accumulations of primary inadvertent point to an invalid implementation of ATEC, loose control, metering or accounting errors. A BA in such a situation should identify the source of the error(s) and make the corrections, recalculate the primary inadvertent from the time of the error, adjust the accumulated primary inadvertent caused by the error(s), validate the implementation of ATEC, set $L_{max}$ equal to $L_{10}$ and continue to operate with ATEC reducing the accumulation as system parameters allow.	N/A	N/A
BAL-004-WECC-01	R2	Each BA that is synchronously connected to the Western Interconnection and operates in any AGC operating mode other than ATEC shall notify all other BAs of its operating mode through the designated Interconnection communication system. Each BA while synchronously connected to the Western Interconnection will be allowed to have ATEC out of service for a maximum of 24 hours per calendar quarter, for reasons including maintenance and testing.	Lower	Medium
BAL-004-WECC-01	R3	BAs in the Western Interconnection shall be able to change their AGC operating mode between Flat Frequency (for blackout restoration); Flat Tie Line (for loss of frequency telemetry); Tie Line Bias; Tie Line Bias plus Time Error control (used in ATEC	Lower	Medium

Standard Number	Requirement Number	Text of Requirement Segment	Original Proposed Violation Risk Factor	Revised Proposed Violation Risk Factor
		mode). The ACE used for NERC reports shall be the same ACE as the AGC operating mode in use.		
BAL-004-WECC-01	R4	Regardless of the AGC operating mode each BA in the Western Interconnection shall compute its hourly Primary Inadvertent Interchange when hourly checkout is complete. If hourly checkout is not complete by 50 minutes after the hour, compute Primary Inadvertent Interchange with best available data. This hourly value shall be added to the appropriate accumulated Primary Inadvertent Interchange balance for either On-Peak or Off-Peak periods.	Lower	Medium
BAL-004-WECC-01	R4.1	Each BA in the Western Interconnection shall use the change in Time Error distributed by the Interconnection Time Monitor.	N/A	N/A
BAL-004-WECC-01	R4.2	All corrections to any previous hour Primary Inadvertent Interchange shall be added to the appropriate On- or Off-Peak accumulated Primary Inadvertent Interchange.	N/A	N/A
BAL-004-WECC-01	R4.3	Month end Inadvertent Adjustments are 100% Primary Inadvertent Interchange and shall be added to the appropriate On- or Off-Peak accumulated Primary Inadvertent Interchange, unless such adjustments can be pinpointed to specific hours in which case R4.2 applies.	N/A	N/A
BAL-004-WECC-01	R4.4	Each BA in the Western Interconnection shall synchronize its Time Error to the nearest 0.001 seconds of the system Time Error by comparing its reading at the designated time each day to the reading broadcast by the Interconnection Time Monitor. Any difference shall be applied as an adjustment to its current Time Error.	N/A	N/A