UNITED STATES OF AMERICA BEFORE THE FEDERAL ENERGY REGULATORY COMMISSION

Mandatory Reliability Standards for the Bulk Power System

Docket No. RM06-16-000

COMMENTS OF THE PUBLIC UTILITIES COMMISSION OF THE STATE OF CALIFORNIA

Pursuant to the Notice of Proposed Rulemaking ("NOPR") issued by the Federal

Energy Regulatory Commission ("FERC" or "Commission") on October 20, 2006, the

California Public Utilities Commission ("CPUC") hereby submits its comments in this

rulemaking proceeding.

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I. INTRODUCTION

On April 4, 2006, the North American Electric Reliability Council, on behalf of its

wholly-owned subsidiary, the North American Electric Reliability Corporation,

("NERC") filed 102 proposed Reliability Standards for FERC approval, subject to NERC's application for certification as the Electric Reliability Organization pursuant to Section 215 of the Federal Power Act. NERC subsequently filed with FERC five additional proposed Reliability Standards.

On October 20, 2006, FERC issued a Notice of Proposed Rulemaking ("NOPR") to approve 83 of NERC's 107 proposed Reliability Standards. In its NOPR, FERC states that although it believes that it is in the public interest to make these Reliability Standards mandatory and enforceable by June 2007, it also finds that much work remains to be done. FERC specifically states its belief that many of these Reliability Standards require significant improvement, and therefore proposes to require NERC to make significant improvements to many of the 83 Reliability Standards that are being proposed for approval as mandatory and enforceable. With respect to the remaining 24 Reliability Standards, FERC proposes that they remain pending until further information is provided. Comments on FERC's NOPR are due by January 3, 2007, 60 days after their publication in the Federal Register.

The CPUC generally applauds and supports FERC's proposed approval of NERC's Reliability Standards with the qualifications discussed below. The CPUC supports the concept of mandatory reliability standards, and the three major investorowned utilities regulated by the CPUC already participate in the Reliability Management System enforced in the Western Interconnection by the Western Electricity Coordinating Council ("WECC"). The CPUC has worked closely with on WECC's own Reliability

Management System ("RMS"), and generally supports WECC's comments on the NOPR that were filed on December 22, 2006.

II. GENERAL COMMENTS

A. FERC Appears to be Pushing for National Uniformity in Areas Where Such Uniformity is Unnecessary or Even Counterproductive

FERC's NOPR seeks national uniformity notwithstanding regional differences. FERC's NOPR proposes to adopt, for example, national definitions of alerts and emergencies. Such definitions should depend on the specific market systems and demand-side contracts in place in each locality. For another example, in California, the ISO declares a Stage II emergency when reserves drop below 5 percent. This allows the ISO to request load reductions from customers who have signed "interruptible" contracts with utilities. If NERC adopts a conflicting definition, it may require changes in existing contracts. It certainly will add to confusion as the new system is implemented, with no clear benefits.

1. The Existing, Enforceable Reliability Standards in the Western Interconnection

In the Western Interconnection, WECC has experience in adopting and enforcing reliability standards through the FERC-approved RMS Agreement. Currently, there are 15 existing, enforceable WECC standards that overlap the proposed mandatory Reliability Standards, all of which are included in the 83 standards that FERC proposes to approve. Five of these WECC RMS fall into what FERC describes as the fill-in-theblank category. However, there are three <u>additional</u> WECC RMS standards already in

effect in the Western Interconnection that do not have a corresponding NERC proposed Reliability Standard. FERC should consider approving these additional three standards for enforcement in the Western Interconnection only.

These three WECC-only RMS standards are: Operating Limits Available to System Operators, Automatic Voltage Regulators ("AVR") and Power System Stabilizers ("PSS"). The first is applicable to Balancing Authorities, while the other two, AVR and PSS, are applicable to generators. There is no reason for FERC to ignore and exclude any WECC standard already in effect. Most of the RMS standards have been in place and properly functioning for about two years. Thus, these standards have been field tested and proven to work. Approving and implementing these standards in the Western Interconnect would support reliability without adding the complexity and risk of new and untried standards. On the other hand, ignoring these established standards when the NERC standards are scheduled to go into effect can threaten reliability already being achieved in the Western Interconnection.

2. The Roles of the Regional Organizations

The proposed standards should not be directly enforceable on regional organizations, such as WECC. (That is, WECC should not have to pay fines to NERC.) Rather, FERC and NERC may <u>direct</u> those organizations to take certain actions. The CPUC accordingly objects to FERC's proposal that the proposed Reliability Standards, in their current form, name NERC, not regional entities such as WECC, as the compliance monitor for all standards. This proposal appears to deny the regions any enforcement role.

3. Applicability of the Proposed Standards

In general, the 83 standards proposed for approval will apply to all entities of the types identified as subject to mandatory Reliability Standards. NERC does state that applicability to certain electric facilities may be limited, such as generators with a nameplate rating less than 20 MW, or transmission facilities energized below 200kV. More generally, FERC should ensure that each standard is enforced only upon the entities or categories of entities for which that standard needs to be enforced to protect reliability, as well as that each standard is not inappropriately and inefficiently enforced beyond what is needed to protect reliability. Thus, a mandatory Reliability Standard should not apply to entities that have no material impact on the Bulk Power System, and each standard should specify the entities to which it applies.

Moreover, enforcement of the standards will take time and effort, putting a premium on efficiency. Enforcing a particular standard on hundreds, probably thousands, of small generators and transmission facilities, in particular where there is essentially no impact on Bulk Power System reliability, does not make logistical or economic sense and can even be counterproductive. Enforcement will be most effective and beneficial for ratepayers when mandatory Reliability Standards apply only to those entities to which they need to apply, namely, those entities that have an impact on the Bulk Power System.

4. Need for a Trial Period

NERC suggested a six-month trial period during which the proposed mandatory Reliability Standards would not be formally enforced, presumably meaning that there would be no penalties assessed during this period. WECC has proposed a phase-in

period of two to four years. In its June 26, 2006 Comments (see Attachment A), the CPUC supported WECC's proposed phase-in period.

In the NOPR, the Commission rejected any phase-in period whatsoever, presumably because this would interfere with the anticipated summer 2007 implementation date, and also because, according to FERC, entities have already been subject to NERC's standards on a voluntary basis. FERC therefore proposes, only for entities that are not already voluntarily complying with these standards, that NERC and the applicable Regional Reliability Organization ("RRO") can use their discretion in imposing penalties for the first six months.

However, the Commission's discretionary enforcement approach is problematic. With the existing voluntary standards, some entities choose to ignore them or are even unaware of certain standards. In the West, and presumably across the country, there are numerous small entities that have limited impact on the Bulk Power System, limited resources and limited familiarity or previous need to be concerned with some of the standards that will soon be mandatory. Many of these entities may not yet be registered with NERC. For such entities, for some of the proposed standards, a six-month test period is insufficient.

Even where some entities are already complying on a voluntary basis with certain standards, those standards may have been proposed for modification, so that the entities in question face mandatory compliance with "new" standards. For example, in its December 22, 2006 Comments, WECC pointed to this, specifically to Reliability Standard EOP-001. This Standard was based upon NERC Operating Policy 6B.

However, EOP-001 required that the two most recent annual self-assessments and emergency plans be available for review at any time. NERC Operating Policy 6B does not contain this.

Another example is Standard PRC-005-1, part of the Transmission Protection System Maintenance and Testing. This standard protects the Bulk Power System by requiring all entities covered by Reliability Standards to develop/document/implement a protection system maintenance program which should be available for review at any time by the RRO. Each entity will develop and implement such a program. However, since there is no specific guideline for developing such program, each entity will perform this differently, and the time interval for performing maintenance and testing will differ from entity to entity. This poses a problem, because in the NOPR, the Commission requests this standard to change by including a "requirement that maintenance and testing of a protection system must be carried out within a maximum allowable interval that is appropriate to the type of the protection system and its impact on the reliability of the Bulk Power System." (NOPR at ¶ 848.) It is reasonably foreseeable that each entity will interpret "maximum allowable interval" differently, such that when the actual standard is changed, most entities will be in violation of this standard pertaining to their interpretation of "maximum allowable interval".

Once the standards go into effect, affected entities need to know how to comply. Adequate communication and education are essential, and both NERC and the RROs have important roles here. Since <u>mandatory</u> Reliability Standards will be a new

experience for most entities, the learning curve will often take time. However, the CPUC believes that a substantial phase-in period is essential.

The Commission's decision to forego a formal trial period may reflect a sense of pressure and expectation to fully "implement" or "go live" with the standards by the summer of 2007. However, such pressure is inimical to the cause of reliability and the economic interests of ratepayers. In the implementation of mandatory Reliability Standards, both the entities subject to those standards and this Commission need to be primarily concerned with the technical and economic aspects of such implementation, including the question of overall benefits to ratepayers, not with artificially imposed deadlines that have no technical basis.

Finally, as already noted, some of the entities that will be subject to the mandatory Reliability Standards may not yet be registered with NERC. Thus, for some of the proposed standards, even a six-month test period may be inadequate. (This was one of the many reasons for the Western blackout in 1996. Standards were in place, but on a voluntary basis, such that certain small entities had no idea that these standards existed.) In response to this concern that a trial period is needed, FERC proposes that for those entities that are not already in voluntary compliance with existing standards, the NERC and the RROs can use their discretion in imposing penalties for the first six months. However, this discretionary authority is left open to interpretation. FERC should accordingly institute a formal trial period for all of the NERC-proposed mandatory Reliability Standards after FERC approves them.

5. Need for Modification of Certain of the Proposed Standards

FERC has recognized that some of the proposed standards will be approved as mandatory and enforceable even though they require modification. However, it is not fair to expect entities subject to these mandatory Reliability Standards to comply with them when they are not finalized or need modification. FERC has identified 61 of the 83 proposed standards as needing refinement. Much of the refinement deals with the compliance elements. However, requiring compliance with 61 standards, which do not have finalized compliance elements, would create many problems. This would lead to differing interpretations by different entities and compliance monitors, as well as further confusion down the road as compliance elements are finalized. Too much ambiguity exists. While NERC has filed changes to 20 of the 61 standards, the Commission has not yet acted on the modifications.

This situation further accentuates the need for a sufficient trial period. An entity cannot rigorously comply with a standard until the standard is finalized. Again, a sixmonth discretionary period is insufficient. This opinion is also stated by WECC in its December 22, 2006 Comments. If a standard is finalized <u>after</u> the six-month discretionary period, are entities that did not anticipate and pre-comply with the final standard then to be penalized for non-compliance, since the discretionary period has passed? Instantaneous compliance with a modified standard is not realistic. Entities cannot fully prepare for ultimate compliance until a standard has been finalized.

Interpretations of incomplete standards would differ not only from entity to entity, but between RROs. RROs would interpret the standards differently, leading to

uncertainty and inconsistent enforcement throughout the country. Inconsistency would occur in interpreting compliance, and NERC would therefore need to step in and resolve the issue. This presents a picture of unnecessary and inefficient time-consuming effort, avoidable through a longer trial period.

For these reasons, if any of the standards that FERC adopts still require modification, it does not make sense to enforce penalties for non-compliance with such standards until all necessary modifications to such standards have been made and approved by FERC.

B. FERC's Proposed Mandatory Standards Should Reflect the Concerns Raised by the CPUC in its Previous Comments

In response to FERC staff's preliminary assessment of the proposed Reliability Standards, the CPUC filed comments in this Docket on June 26, 2006. The Commission's subsequent actions apparently reflect agreement with some of the CPUC's comments, but not others, and for the latter we again emphasize certain of our concerns. FERC needs to recognize the importance of those concerns that the CPUC previously raised, and we hereby request FERC to incorporate those concerns in any final action it takes on the 83 proposed mandatory Reliability Standards. Accordingly, the CPUC's June 26, 2006 Comments are being re-submitted at this time, as Attachment A to these Comments.

Finally, as the CPUC noted in its June 26, 2006 Comments, CPUC's General Order 167 includes a set of Generator Operation and Maintenance Standards that are enforceable against the operators of large independent and utility-owned power plants. As we pointed out in those Comments, NERC's ERO application does appear to respect the line between federal and state jurisdiction over power plant operations, maintenance and reliability. In the NOPR, however, this issue is not explicitly addressed. Based on this silence, the CPUC assumes that the status quo remains in effect, such that California maintains its authority to enforce the rules that are set forth in CPUC General Order 167, and that the proposed adoption by FERC of the 83 proposed Reliability Standards will not in any way undermine or adversely affect the State's authority in this regard..

III. COMMENTS ON SPECIFIC PROPOSED STANDARDS

The CPUC commends the work of, and agrees with, FERC Staff on many of the individual standards proposed for adoption. The CPUC is particularly pleased that FERC Staff agreed with us on many of the issues we commented on this past June, in particular, on proposed standards BAL-005-0 and FAC-003-0. In particular, in proposed Standard BAL-005-0, FERC Staff agreed with the CPUC's earlier comments and stated that due to unit characteristics or operating restrictions, certain types of resources may not be capable of operating with automatic generation control ("AGC"), or that AGC may not be economically feasible. (See, NOPR, at ¶ 193.) Moreover, FERC Staff stated that one solution to this is exactly what CPUC suggested, namely, to require that Balancing Authorities have a certain percentage of their total load subject to control by AGC.

However, a number of the standards, as proposed for adoption by FERC, raise some troubling issues, in particular, issues involving the limits to FERC's jurisdiction and

the need for more regional and operational flexibility. We address these concerns on a standard-by-standard basis below.

A. BAL-002-0, Contingency Reserves

FERC's NOPR directs NERC to develop a continent-wide contingency reserve policy, based on the probability of loss of load. We agree with NERC that an absolutely uniform standard nationwide is problematic. Given FERC's intention to establish such a standard, however, FERC should take care to craft a standard that is workable and cost effective. As FERC recognizes, it is not possible to design a power system free from occasional outages, particularly at the distribution level. Many customers can tolerate the occasional outage of limited duration, and would prefer to do so rather than pay much higher rates for power. Accordingly, it may be more cost effective to provide back-up power supplies to customers with very high needs for reliability rather than design the entire system to very high and very expensive levels, especially since customers will inevitably be exposed to the occasional outage at the distribution level, due to, for example, high winds or storms.

We agree that the standard should require <u>consideration</u> of the probability of loss of load due to multiple generation failures (one measure of this is known as Loss of Load Probability, or "LOLP"). However, such probabilities are only <u>one</u> of a number of relevant factors, including (1) the number of customers or megawatts likely to be lost, (2) the value that customers in the area put on reliability (including where appropriate the public interest in uninterrupted power supplies), and (3) the costs of avoiding outages (in this case the cost of reserves). Failure to consider such factors will increase customer

costs unnecessarily.

B. COM-001-0, Telecommunications

The CPUC shares FERC's belief that redundant communications are crucial to the prevention of blackouts. In particular, system operators must maintain communication with other system operators, security coordinators, and distribution utilities that bear responsibility for rotating blackouts.

However, FERC proposes to require individual generating plants and distribution providers to maintain redundant communications links with system operators. (See, NOPR at ¶ 249.) FERC's authority under the Federal Power Act covers the Bulk Power System, but does not extend to power plants *per se*. The CPUC believes that FERC's assertion of authority to impose Reliability Standards applicable to either generation or the electric distribution system should be extremely limited, and should be based on an essential nexus between the proposed standard and the operation of the Bulk Power System. Accordingly, FERC should only adopt Reliability Standards affecting these entities where other authorities (such as State regulators or independent transmission system operators) have failed to act or simply cannot act.

In this case, the standard that FERC proposes to adopt is duplicative and unnecessary when applied to California, and risks being counterproductive unless applied with considerable restraint. The CPUC's Operation Standards applicable to generators require, among other things, power plants to maintain the ability to communicate with the Control Area Operator all times, and to plan for the continuity of management and communications during emergencies. (See, CPUC General Order No. 167, Appendix E,

O.S. 20 and 21.) Further, the California ISO has full control over generators within its control area, and can impose such requirements. Finally, the CPUC stands ready to impose any additional regulations on power plants that may be necessary to assure full communications between power plants and the Bulk Power System.

C. COM 002-0, Communications and Coordination

FERC proposes to adopt a standard under which system operators will be required to clear with the security coordinator all actions that could affect multiple control areas. The CPUC agrees that all control areas should communicate fully with each other in emergencies, and that security coordinators should have authority to transmit orders to local control areas. However, FERC's prescription to clear all actions with the security coordinator could be a recipe for paralysis, and threaten the whole concept of control areas.

Quick action may be required in certain emergencies. For example, control areas now have the responsibility to balance supply and demand within their jurisdiction. However, it is conceivable that a given control area could lose a major source of generation, and need to drop load quickly to avoid impacts on neighboring areas. In such an event, a requirement to clear a proposed action to drop load with the security coordinator could undermine the very benefit that prompt action would provide. Similarly, if a control area faces increasing and sudden oscillations due to problems elsewhere in the interconnection, it should not be prohibited from taking quick actions to isolate itself from the rest of the system, thereby preventing cascading outages.

Short of establishing an Interconnection-wide, central control room run by the

security coordinator (a massive undertaking), FERC must preserve some room for individual control areas to act in the interest of their systems when time is short.

D. EOP-001-0, Emergency Preparedness and Operations

In Standard EOP-001-0, FERC Staff calls on quick load shedding, as soon as possible, and in less than 30 minutes. "As soon as possible" is an appropriate term to use in such a standard, but if the Commission insists on explicitly stating that shedding all load necessary to correct system emergencies needs to be performed in less than 30 minutes, then the best course of action may be irrelevant due to the time constraint.

We support FERC's goal of having sufficient load shedding available quickly to avoid rolling blackouts. However, it is not necessary that <u>all</u> load shedding be available within 30 minutes. Utilities typically "rotate" the outages among customers every hour or two -- thus the term "rotating outage." Once system operators shed enough load to avoid an outage, it is acceptable to restart that load and shed other load, for example, by sending utility crews to substations, which can take more than 30 minutes. FERC should accordingly clarify that only load shedding needed to cover contingencies need be available within one-half hour.

In its June 26, 2006 Comments, the CPUC emphasized that different systems use widely varying definitions of "normal, alert, and emergency" states, and that imposing uniform definitions is impractical and counterproductive. FERC proposes to develop clear, objective criteria to define such states, but this intention simply fails to recognize the complexity of the electric system. Trying to define in advance all contingencies that the system may face is unlikely to be either feasible or efficacious. The CPUC supports

FERC's goal, namely, quick identification and correction of problems, but we believe that the only feasible way to meet this goal is to improve real-time monitoring of the grid, so that contingency analyses can be run for current system conditions. In the meantime, all of us (system operators, regulators and end use customers) must rely to some extent on the judgment of experienced operators and reliability coordinators, and the regulators should not impose arbitrary or overly complex requirements that could be counterproductive.

E. EOP-003-0, Load Shedding Plan

The CPUC supports FERC's requirement that bulk power authorities be prepared to shed load in emergencies. However the CPUC is concerned that FERC's order appears to assume that load-shedding at the <u>transmission</u> level is the only or primary way to address system emergencies.

FERC should note that load shedding at the transmission level may not be the best way to respond to an emergency, because such load shedding is likely to affect a wide geographic area. Rather, entities under FERC's jurisdiction should be required to coordinate with distribution system operators that are not under FERC jurisdiction in order to effectuate load shedding with minimum overall social and economic impact.

In this regard, FERC should note that the CPUC has ordered its distribution utilities to maintain and update load shedding plans. If there is time to do so, CPUCjurisdictional utilities must avoid shutting down entire regions or communities. Rather, the utilities are directed to cut power to smaller areas scattered around the state, thereby allowing citizens in blacked out areas to buy food, gas and other necessities nearby.

Public institutions such as police stations and hospitals are exempt from rotating outages.

The CPUC is not suggesting that FERC regulate the rotating outage plans of distribution utilities, which are generally outside the reach of FERC's authority. As noted in our Comment under COM-001-0 above, FERC's assertion of authority to impose Reliability Standards applicable to either generation or the electric distribution system should be extremely limited, and should be based on an essential nexus between the proposed standard and the operation of the Bulk Power System.

To address the concern that this proposed standard purports to address, the CPUC believes that the distribution utilities, the states, and bulk power authorities should continue to work together to assure that bulk power authorities have the widest possible set of options in emergencies. In California, the California ISO sponsors annual workshops where it and the State's distribution utilities simulate statewide emergencies.

However, we understand that at least one large publicly-owned utility adjacent to the California ISO control area declined to participate in this exercise. Accordingly, despite our reservations about FERC's jurisdiction over the functions of utilities at the distribution level, the CPUC does believe that in this proposed standard, FERC should require all neighboring distribution or transmission utilities to participate in annual drills when requested by an ISO or other bulk power authority.

F. FAC-003-1, Vegetation Management

The CPUC supports strong vegetative management measures, and is pleased that FERC Staff agreed with us that there should be regional discretion and not a uniform standard applicable to this standard. However, the CPUC disagrees with FERC Staff's

assessment that NERC should determine which power lines under 200Kv are critical and have an impact on the Bulk Power System. The CPUC believes that discretion on which lines are critical to the Bulk Power System should be left to the individual State, which has much greater knowledge of what is needed on the local level, rather than to NERC or the RRO.

In particular, in the case of California's CPUC-jurisdictional utilities, it should be left up to the CPUC (working in concert with the California ISO) to determine which power lines are critical and have an impact on the Bulk Power System. To have an RRO or NERC spend time, effort and money in identifying all critical transmission lines within the oversight of State regulatory authorities and/or RTOs/ISOs is illogical, as such entities already know their own transmission systems best.

Furthermore, California already has requirements applicable to minimum vegetation clearance. See, CPUC General Order 95. In view of these existing State requirements, FERC must take care to assure that any mandatory Reliability Standard hat it adopts on this subject does not preempt the ability of California (and other States with similar State standards) from imposing stricter requirements that have no adverse impacts on reliability *per se*.

G. IRO-004-1, Reliability Coordination - Operations Planning

The CPUC agrees with FERC Staff that it is useful for system operators to assess the outlook for the following day on a daily basis. However, we are concerned about FERC's requirement that system operators should identify "effective control actions that cam be implemented within 30 minutes during contingency conditions." (See, NOPR, ¶

530.) In the view of the CPUC, this requirement amounts to counterproductive micromanagement. Considering the myriad of potential problems that could arise on the system, and the equally lengthy list of potential actions that could be taken to address such problems, such a list is likely to be either so generic as not to be meaningfully enforceable or so detailed and lengthy as to be of no feasible use in an actual emergency.

H. PER-001-0, Operating Personnel Responsibility and Authority

The CPUC strongly supports requirements for training of system operators. Such training has long been part of NERC and WECC's programs, and is clearly tied to the reliability of the power plant system.

FERC proposes, however, to extend training requirements to power plant operators. This requirement goes far beyond anything contemplated in regulation of the Bulk Power System under previous NERC guidelines, and far beyond what is authorized by the Energy Policy Act of 2005. As noted in our Comment under COM-001-0 above, FERC's assertion of authority to impose Reliability Standards applicable to either generation or the electric distribution system should be extremely limited, and should be based on an essential nexus between the proposed standard and the operation of the Bulk Power System.

Further, we note that a number of provisions of the CPUC's Operation and Maintenance Standards require plants to be ready to respond to orders of the system operator. The CPUC of course stands ready to work with the California ISO, FERC and NERC to impose any requirements that may be necessary to the health of the Bulk Power System. We understand that power plant operators can affect the Bulk Power System in

terms of voltage control, provision of reactive power, etc. However, the impacts of generation operator actions on the Bulk Power System are of a much smaller magnitude and consequence compared to the actions of the system controllers themselves.

In short, it is appropriate for FERC to require limited and focused training of power plant operators, where other authorities (such as balancing authorities and state governments) have not acted to do so in an appropriate manner. However, where other authorities have already taken appropriate action to require training of power plant operators (such as the CPUC has done it General Order No. 167), FERC should decline to taken further action, or should defer to the action that other authorities have already taken.

I. PRC 001-0, Systems Protection Coordination

FERC is understandably concerned with the speed with which system operators will respond in the process of complying with certain standards. In Standard PRC-001-0, NERC proposed an "as soon as possible" response to a failure on an element in order to reduce the risk of system outage. FERC instead insists that the standard should specify a 30 minute time limit on corrective action. But, in reality, the appropriate response time depends on the kind of disturbance, and the kinds of information and response measures that are available. For some circumstances, a 5-minute response may be necessary and possible, while for others a much longer response time is appropriate. Sometimes, a fast response may be possible but much less effective than a slower response when more information and/or options are available. "One size fits all" simply does not work in this case.

Setting such a specific limit on how quickly to bring a system back on-line can inflict more harm than good. Inter-temporal restrictions are ambiguous in situations where balancing the system is more important than an artificial time limit restraint. Until the event takes place, determining the correct steps in protecting the system may not be evident. Once the event has taken place and the data analyzed, only then can we accurately and efficiently perform the actions required when the next such event occurs.

The ultimate desideratum is to efficiently maximize utility. When a system element fails, the goal should be to act efficiently to reduce the risk of a system outage. However, the introduction of an unnecessary constraint, such as a time limit, decreases the possible choices of action, such that the operator may not be able to efficiently maximize utility, because the most effective/beneficial choice was the one that required 35 minutes to implement. Often, such knowledge is not gained until after the event has occurred and relevant data has been analyzed. Once this analysis is available, one can establish a proper course of action for the next such event using the means in which the damage is minimized and benefits are maximized. However, such action may require more than 30 minutes.

If, however, FERC insists that some time deadline is necessary in connection with this standard, the proposed language should be amended to read:

"Transmission or generation operators shall carry out corrective control actions, *i.e.*, returning the system to a stable state that respects system requirements as soon as possible, and no longer than 30 minutes, <u>except where a longer</u> response time is feasible, or where a longer response is demonstrated to produce a better ultimate solution without unacceptable interim risk."

J. PRC-006-0, UFLS

Though it declines to adopt this standard at this time, the Commission proposes to extend rules to cover the protection systems of individual generating plants. In this case, adequate protection of the Bulk Power System does not require regulation of the kind of protection systems installed at individual power plants. It is reasonable for FERC to require that power plants participate in tests of their capabilities and responsiveness to system conditions, so that the system operator can manage the system properly. However, the adoption of a Reliability Standard that would require power plants to adopt particular protection schemes or to install equipment overreaches FERC's authority, because there are clear alternatives that do not require FERC intrusion into the regulation of individual generating plants. Rather, grid authorities have the option to locate protective equipment on systems under their control, or to contract with generators willing to install such equipment. Accordingly, FERC should determine that when this standard is ready to be adopted, it will not require generators to install particular types of protective equipment.

K. TOP 001-0, Reliability Responsibilities and Authorities

This proposed standard is duplicative of what the California ISO already requires under its Participating Generator Agreements. As discussed above, FERC should not adopt standards that are duplicative of what is already mandated by existing authorities unless FERC provides appropriate deference to the requirements of such existing authorities where such requirements already meet the objective of the standard that FERC proposed to adopt.

L. TOP-004-0, Transmission Operations

NERC and FERC propose that "if a transmission operator enters an unknown state…operations should be restored to respect proven reliable power system limits." (See, NOPR, at ¶ 995.) This concept is similar to an idea discussed years ago at WECC: "If you haven't modeled it, don't go there." The goal of avoiding dangerous or unstable system configurations is noble, but not achievable through the proposed standard. It is impossible to model all system conditions in advance, as FERC itself observes at ¶ 1047 of the NOPR. Given this fact, an operator simply cannot know at any given time whether s/he has exceeded "proven reliability power system limits."

For example, in 1996, controllers at the Bonneville Power Administration unknowingly entered such a condition; <u>they did not realize</u> that the successive outage of three relatively small transmission lines (certainly below an N-1 or N-2 condition) had deprived the system of crucial reactive support. The system had not been modeled in that configuration. Proven (past) "reliability power system limits" provide a less effective guide to safe operation than more sensitive modeling and assessment of actual (current) conditions.

Accordingly, the CPUC believes that this goal can be achieved only through realtime modeling of actual system conditions, including modeling of contingencies, based on accurate, real-time system data. FERC and NERC's energy would be better spent working toward such a system, rather than developing an unenforceable standard such as proposed Standard TOP-004-0. By contrast, proposed Standard TOP-006-0 is a good first step in the right direction.

Finally, FERC should recognize the limitations of "deterministic" contingency analysis, that is, the practice of modeling system response to the largest contingencies. Such analysis fails to consider the probability of the contingency, the number of customers affected, the value of reliability to those customers, or the cost of preventing the contingency. Many serious outages (such as the 1996 incident described just above) stem from multiple small contingencies. The limitations of deterministic analysis are well recognized. Indeed, WECC (and probably others) have sponsored efforts to develop more useful "probabilistic" (we would prefer the term "cost-benefit" or "economic") analysis. The CPUC supports the use of deterministic analysis, at least for now, until the industry develops something better. But such analysis must be interpreted flexibly, and with concern for the costs it imposes on ratepayers. Certainly, the use of "deterministic" analysis should not be cast in concrete, as this proposed Standard TOP-004-0 (as well as several other proposed Reliability Standards) would do. For example, in the discussion of proposed Standard TOP-008-0, for example, FERC and NERC refer to "probable" or "credible" contingencies. (See, NOPR at ¶ 1041 and 1042.) But, in the real world, contingencies do not generally carry probabilities of 100% or 0% (as implied by deterministic studies), but, rather, carry some probability between those two extremes. Accordingly, in view of the limitations of deterministic analysis, FERC should not try to adopt an exacting nationwide definition of contingencies.

Similarly, FERC should not focus on natural events in connection with contingency planning for the Bulk Power System. Suffice it to say that events such as ice storms, hurricanes, earthquakes, and the like actually <u>reduce</u> demand and stress on the

Bulk Power System, although they do often cause outages on local distribution systems. They rarely, if ever, cause notable cascading outages. The proper approach for dealing with natural events is to focus on system restoration planning rather than including them in large-scale contingency analyses of the sort that would be required by this proposed Standard.

M. TOP-008-0, Response to Transmission Limit Violations

See comments above on proposed Standard TOP-004-0.

IV. CONCLUSION

For all of the foregoing reasons, FERC should seriously consider the concerns that the CPUC has raised in these Comments. In particular, FERC should not adopt standards, which are duplicative of existing applicable requirements, too narrowly prescriptive or which micro-manage aspects of the Bulk Power System where a modicum of flexibility will produce better results. In addition, FERC should limit its assertion of authority over those entities that largely fall outside FERC's regulatory jurisdiction. Dated: January 3, 2007

Respectfully submitted,

RANDOLPH L. WU MARY F. McKENZIE HARVEY Y. MORRIS LAURENCE G. CHASET

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CERTIFICATE OF SERVICE

I hereby certify that I have this day caused the foregoing document to be served upon all known parties in this proceeding by e-mail upon each party identified in the official service list compiled by the Secretary in this proceeding.

Dated at San Francisco, California, this 3rd day of January, 2007.

/s/ Laurence G. Chaset

Laurence G. Chaset

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ATTACHMENT A

UNITED STATES OF AMERICA BEFORE THE FEDERAL ENERGY REGULATORY COMMISSION

Mandatory Reliability Standards for the Bulk Power System

Docket No. RM06-16-000

COMMENTS OF THE PUBLIC UTILITIES COMMISSION OF THE STATE OF CALIFORNIA

INTRODUCTION

On April 4, 2006, the North American Electric Reliability Council, on behalf of its wholly-owned subsidiary, the North American Electric Reliability Corporation ("NERC"), filed 102 proposed Reliability Standards for Commission approval, subject to its application for certification as the Electric Reliability Organization pursuant to section 215 of the Federal Power Act. On May 11, 2006, FERC Staff released a Preliminary Assessment of NERC's proposed Mandatory Reliability Standards.

Pursuant to the FERC's May 11, 2006 Notice of Comment Period, the Public Utilities Commission of the State of California ("CPUC") provides its comments on FERC Staff's Preliminary Assessment. The CPUC filed its Notice of Intervention in this proceeding on May 4, 2006, and is accordingly already a party to these proceedings.

The CPUC supports the concept of mandatory reliability standards, and the three major investor-owned utilities regulated by the CPUC already participate in the Reliability Management System enforced in the Western Interconnection by the Western Electricity Coordinating Council ("WECC"). As the FERC Staff's Preliminary Assessment acknowledges (at page 4), NERC's current voluntary standards provide a solid foundation to maintain and improve electric system reliability. Both NERC and the FERC Staff recognize, however, that the Reliability Standards, as proposed, must be viewed as a starting point. There remains a great deal of work to be done before the proposed Reliability Standards are ready to be implemented.

Toward the goal of contributing to the improvement of the reliability of the transmission system, the CPUC's Comments cover the following points relating to NERC's proposed standards and to FERC Staff's initial assessment of them:

- General observations on the structure and language of NERC's proposed standards;
- Mandatory standards must be enforceable;
- Not all of the proposed standards should be mandatory and enforceable on a national basis;
- In considering NERC's proposed standards, FERC should defer to the existing Reliability Standards being enforced by the WECC;
- In certain cases, states must not be preempted from imposing stricter requirements;

- FERC should recognize the relationship of the proposed mandatory reliability standards to the CPUC's generator operations and maintenance standards;
- The CPUC explicitly endorses and supports many of the points made by WECC in its Comments being filed in this proceeding.

COMMENTS

<u>General Observations on the Structure and Language of NERC's</u> <u>Proposed Standards</u>

Uniformity of Language Will Not Produce Uniform Results

In the standards that it has proposed, NERC seems to assume that uniformity of the <u>language</u> of standards equals uniformity of <u>reliability</u> throughout the country. However, this is an incorrect assumption. Current NERC standards are deterministic, not probabilistic. That is, NERC states that systems must withstand the loss of two major system elements (a California example would be the loss of the 2,000 megawatt Diablo Canyon nuclear power plant and the loss of the California - Oregon Intertie, a key interstate transmission line). However, it would be meaningless for NERC (and FERC) to try to make sure that all regions use the same deterministic standards. First, the largest system elements may differ region to region. But even more important, as reliability engineers at WECC and elsewhere recognize, deterministic standards leave out crucial elements such as:

- the probability that a given event will actually occur;
- the number of people affected by that event;
- the time the event is likely to occur; and

• the cost of the event (*i.e.*, how much customers would be willing to pay to avoid the event).

If transmission system operators know all these factors, they can approach the problem probabilistically in order to figure out what the expected cost of the loss from a given event might be. Given such a cost estimate, one can compare it to the cost of measures intended to prevent or control the consequences of the event. There will inevitably be cases where the cost of the event to society (in terms of direct financial losses, as well as more indirect impacts, such as lost productivity) will be significantly lower than the cost of the measures needed to prevent the event in the first place. It simply does not make good sense economically to spend more resources to prevent certain events than the events themselves would cost.

This being said, probabilistic planning is very difficult, because it requires huge amounts of data. Nonetheless, this concept is very useful in demonstrating the limitations of deterministic standards of the type NERC is proposing. This is not to say that deterministic standards are unacceptable; it does suggest, though, that the kind of uniformity the NERC (and presumably also FERC Staff) is advocating is illusory, and will involve rather heavy costs when compared to the reliability improvements that society will gain from this effort.

One conclusion from the foregoing observations is that "fill in the blank standards" may be perfectly appropriate in many cases, especially where systems differ markedly. Another conclusion would be that trying to make sure that all regions plan for the failure of the same elements may not be justified; rather,

planning "in a similar way," *e.g.*, for single largest contingency, would be a more appropriate approach.

What follows are a few examples of text from FERC Staff's Preliminary Assessment that demonstrate the concern noted above. As an initial example, we note that FERC Staff seeks uniformity in the definition of critical facilities (see, page 68 of the Preliminary Assessment). In this regard, the CPUC would point out that it is likely to be very difficult or complex to define all "critical facilities" in all of the different regions of the country in an identical or uniform manner.

Similarly, on page 93 of the Preliminary Assessment, we note that FERC Staff is concerned about the speed with which system operators will respond to the failure of an element of the protection and control system. The proposed NERC standard (PRC-001-0) requires action by operators "as soon as possible" to reduce the risk of system cascading outages. FERC suggests that this standard should require action in 30 minutes. The problem with this suggestion is that the action adequate to bring the system into balance may be ambiguous: a more effective action taken in 35 minutes may be far preferable to a less effective action taken in 28 minutes. In any case, the determination of the correct action to protect the system may not be clear until months after the event takes place, and after detailed data is collected and analyzed.

The CPUC shares the overarching goal of FERC Staff, namely, that reliability standards should be structured so as to prevent major power outages from occurring. However, the best action to take in order to meet this goal will

necessarily depend on many details facing the system operator at the time of an event. To assume that this kind of standard should be enforceable through exact measurements is misguided. Rather, NERC's proposed general guideline for action by operators "as soon as possible" may, in fact, be the best that one can expect in such situations. Much more important is that operators have the information, tools, and training to make good decisions when unexpected events on the system do occur.

The CPUC would note that sometimes, responses to unexpected system events must be made within 10 minutes or 5 minutes, or even, immediately, but at other times, the situation does not demand action within such tight time frames. FERC Staff's concern here apparently relates to the Eastern outage of August 2003, where operators failed to take effective action in the very short time frame required to prevent cascading outages throughout the region. The extent to which a rigid 30minute standard, of the type FERC Staff seems to be advocating, would have prevented much of the system dysfunction that occurred in August 2003 remains an open question.

Another apparent goal of FERC Staff, which the CPUC shares in principle, is to assure a fair allocation of reliability throughout the transmission system. However, if this truly is a goal of FERC, it should consider a uniform <u>cost-</u> <u>effectiveness</u> standard rather than uniformity in the details of a set of deterministic standards. Such a cost-effectiveness standard might consist of a national requirement to spend, say, \$10 to avoid an hour of outage per affected customer.

This kind of approach would go a lot further toward establishing a national level of reliability than the requirement that reliability standards across the country have parallel or identical wording.

Finally on this point, on page 23 of the Preliminary Assessment, in its initial discussion of "fill-in-the-blank" standards, FERC Staff argues that standards are "not enforceable" if they apply only to one Regional Entity or Regional Reliability Organization (hereafter, "RRO"). The CPUC fundamentally disagrees with this observation. Different laws apply in different jurisdictions, just as different reliability standards may apply in different regions. Moreover, it may be efficient, as well as reasonable, to enforce certain reliability standards by requiring RROs to prepare implementation plans spelling out how given standards, or sets of standards, will be enforced, which implementation plans may differ somewhat region to region.

<u>Problems With Specific Definitions</u>

On page 26 of the Preliminary Assessment, FERC Staff notes that the definition of bulk power in NERC's proposed standards does not match that in EPAct. The staff falls back on the literal words in the Act, rather than adopting a more meaningful and helpful interpretation of that definition.

On page 32 of the Preliminary Assessment, FERC Staff notes that the balancing standard (BAL-005-0) does not "require either Generation Operators of Load Serving Entities to provide AGC [Automatic Generation Control] capabilities to the Balancing Authority." In this regard, FERC Staff seems to be contemplating

requirements that go far beyond what is necessary to operate an electric system. In California, for example, the California ISO, with a load of 40,000+ megawatts, operates with about 1000 megawatts of AGC operated reserve. In lieu of requiring <u>generators</u> to provide AGC controlled units, it makes more sense to require that <u>Balancing Authorities</u> have a certain percentage of their total load subject to control by AGC. However, the necessary amount of such AGC would depend on the characteristics of the load in the area (that is, what is the real magnitude of demand fluctuations in the region) and the amount of generation that is responsive to changes in voltage and frequency (as opposed to direct control from the control area operator).

On page 50 of the Preliminary Assessment, FERC Staff, in addressing the emergency operations planning standard (EOP-001-0), comments on various interpretations of NERC's proposal that load-shedding capability must be implementable within 30 minutes. If FERC Staff is simply saying that quick load shedding must be available, that is reasonable. However, if FERC Staff is saying that <u>all</u> load shedding capability must be available within 30 minutes, this would not be reasonable, as it would require implementation of SCADA (Supervisory Control And Data Acquisition) on all load. This would entail very significant costs, some of which may not be necessary, to the detriment of ratepayers.

On page 57 of the Preliminary Assessment, FERC Staff addresses vegetation management. The CPUC supports strong vegetative management measures, and agrees that NERC proposed standard may be inadequate. We also agree that some

consideration of the time between inspections is important. However, the CPUC would point out that relying on the maintenance of specified space between vegetation and power lines may not, by itself, achieve FERC's goal. Rather, one should also consider the amount of rainfall in the previous period, and the growth rates of plants found in a particular region. Again, uniformity of language will not guarantee uniformity of result.

Mandatory Standards Must Be Enforceable

Like FERC, the CPUC supports the goal of sound and enforceable reliability standards consistent with the statutory requirements of Section 215 of the FPA. However, reliability standards do need to be enforceable if they are going to be mandatory, and this includes unambiguous delineation of who is required to comply, what they are required to do, the measures or criteria for determining compliance, and to the extent feasible and applicable, different specific levels (severity) of noncompliance, which may guide sanctions and corrective actions.

FERC staff found 26 of the "Version 0" standards submitted by NERC to be unenforceable due to their lack of criteria for measuring compliance or for establishing levels of noncompliance. FERC staff also found a greater number of standards to be ambiguous and identified many others as "fill-in-the-blank" standards that only provide broad direction for more detailed implementation by the RROs. In its Application, NERC itself identified 39 standards overall as "fill-inthe-blank" standards, which establish the requirement for a type of standard, but

leave the specifics to be determined and applied at the regional or other level. FERC should not approve any of these currently unenforceable standards proposed by NERC.

However, in those cases where certain standards are already being implemented effectively, often with added specificity and enforceability, at the regional level, FERC should consider approving such already existing regional standards on an interim basis within the region where they currently apply (as is the case for many standards currently being enforced through the WECC's Reliability Management System) while FERC, in collaboration with NERC, the RROs and other stakeholders, continues to review how to implement such standards on a national basis.

In reviewing the proposed standards that need more work, and in considering the needed improvements to them, FERC should also recognize that in some instances, overall system reliability may be preserved or even enhanced when the enforcement of reliability standards is predicated on reasonable regional variation in the details of the standards to be enforced, and on the delegation of the means of enforcement of such standards to RROs. Thus, FERC can appropriately address the existing differences in regional conditions without compromising overall reliability by acknowledging that some of the "missing detail" regarding requirements and compliance criteria needed for enforceability may ultimately be provided at the regional level.

Finally, on this point, the CPUC would note that it has not yet been fully established which entities, as users of the transmission system, need to register and to meet the mandatory reliability standards. Some entities newly impacted by these kinds of standards will find themselves on unfamiliar ground. This fact must be considered when FERC evaluates what "enforceability" should consist of, and where it may be left to the regions or system operators to fill in certain specifics of compliance requirements and criteria that make a standard truly enforceable.

Not All of the Proposed Standards Should Be Mandatory and Enforceable on a National Basis

As it continues its evaluation of NERC's proposed mandatory reliability standards, FERC should recognize that any standard being considered for approval and implementation can be ultimately placed into one of three categories:

(1) Standards that will be mandatory on a national level, and for which specific compliance criteria and levels of noncompliance are set on a national basis. For example, standard BAL-001-0 (Real Power Balancing Control Performance), found acceptable in FERC Staff's Assessment, establishes two specific numerical requirements for a balancing authority's Area Control Error ("ACE"), along with four specific levels (severity) of noncompliance for each measure, with these specific requirements universally applicable. (We note that even here, the final compliance criteria measures will depend on frequency parameters specific to balancing authority areas and to different interconnections, and that WECC standards additionally specify exclusion of ACE measurements under certain

conditions producing measurement error).

(2)Standards that will be mandatory on a national level, but for which specific compliance criteria and levels of noncompliance can be fleshed out or tailored (and potentially made more stringent) at a regional level without negatively impacting (and often enhancing) the reliable operation of the grid. Such standards would have sanctions and appeal processes that, where necessary, could be taken all the way up to FERC. For example, proposed standard BAL-002, Disturbance Control Performance addresses a balancing authority's ability to utilize contingency reserve to maintain frequency and load-supply balance, by requiring regional (or more disaggregated) reserve policies, minimum reserve levels as a function of outage contingencies, and specified recovery criteria for both ACE and amounts of available contingency reserves). This standard was found in FERC Staff's Preliminary Assessment to be ambiguous and potentially technically inadequate regarding what contingencies are to be anticipated, reserves composition (among different types) and generator eligibility, and reporting threshold for disturbance magnitudes. Apparently, FERC staff concludes that region-specific policies regarding contingency reserves composition (among types, such as spinning) and eligibility (e.g., large interruptible loads) may be acceptable, but need to be justified.

It should be noted that the corresponding WECC standards do, in fact, provide added specificity in the areas of defining what contingencies should be anticipated (in procuring reserves), the composition of (and supply/load eligibility

for providing) reserves under different circumstances, control area reporting and other requirements, and a more stringent minimum disturbance reporting threshold. FERC should accordingly defer to and approve such regional standards already in place that correspond to NERC-proposed mandatory standards, but that add specificity and stringency, especially when such differences will apply on an interconnection-wide basis, without triggering a need for the RRO that would be enforcing such regional standards to provide extensive justification for "regional differences," unless there is a clearly stated, compelling reason for requiring such justification.

As another example, proposed standard PRC-007, Assuring Consistency with Regional Underfrequency Load Shedding ("UFLS") Program Requirements, essentially requires that transmission owners/operators, distribution providers and LSEs maintain consistency with RRO requirements, thus delegating responsibility to the RROs. FERC Staff identified no substantive issues for this standard, and the applicable requirements are specified in WECC's Minimum Operating Reliability Criteria and Coordinated Off-Nominal Frequency Load Shedding and Restoration Plan. FERC should accordingly determine that this is a standard which will be adopted as mandatory on a national basis, but for which it is appropriate for the details of implementation to be delegated to the RROs.

(3) Standards that would be advisory on a national basis, (i.e., that would be national guidelines) but whose actual implementation would be left to the RRO or to the system operator or control area (including RTO/ISOs). Such guidelines

would not be enforceable by sanctions that could be appealed to NERC or FERC. In other words, FERC should be prepared to consider that certain candidate standards may simply be inappropriate for "mandatory and enforceable" status under Section 215 of the FPA, but instead should be identified as guidelines. An example of such a guideline would be a requirement for planning reserve margins. Clearly, it makes sense to plan for more capacity than is strictly needed to meet operating reserve margins, because some planned-for capacity may never be built. For this reason, the CPUC has adopted a 15% planning reserve margin as a guideline. However, in practice, such guidelines are not, and should not be, enforceable as "mandatory reliability standards," because the determination of such guidelines requires the use of many assumptions about future conditions, and compliance with such guidelines is dependent on uncontrollable variables. For example, demand forecasts are heavily dependent on economic conditions, which are in turn subject to considerable uncertainty. In addition, unusual weather patterns, phenomena that are clearly beyond the reasonable control of transmission system operators, can have significant impacts on whether planning reserve margins are, or are not, met in a given month, season or year.

<u>In Considering NERC's Proposed Standards, FERC Should Defer to the</u> <u>Existing Reliability Standards Being Enforced by WECC</u>

In its Planning Standards and its Minimum Operating Reliability Criteria, WECC already has a set of standards having specific compliance requirements and criteria, generally based on NERC standards, but in some instances covering additional ground or going further in specificity or stringency.

In evaluating candidate mandatory standards, NERC (and FERC) should consider retention of WECC standards. This would be consistent with the principle of deference to standards established by an interconnection-wide regional entity, as established both in the EPACT and in FERC's Order 672. Absent a clear showing that these WECC standards are inadequate, NERC should adopt them without change. Where the WECC standards are more stringent than (or have no) corresponding NERC standard, then FERC itself should also consider approving these WECC standards (to be submitted by NERC), absent a clear reason for requesting changes, in which case interim approval of the existing and more stringent standards should be considered.

FERC approval status of other WECC reliability standards may, however, be tied to the approval status of the corresponding NERC standards, with which the WECC standards may ultimately be merged. In such situations, FERC should simply hold off taking action until it is prepared to fully approve a single standard. However, if FERC decides to consider alternative standards (*i.e.*, standards at variance from current WECC standards) to be applicable within the WECC region, FERC should carefully examine the geographical, electric system and organizational difference between WECC and other regions, as well as whether the existing standards present actual disadvantages in terms of reliability or competition. Here, FERC will need to explicitly distinguish between those reliability standards that must necessarily be uniform throughout the country and

those for which regional variation is in fact the most efficient and effective way to support reliability across the electrically distinct WECC region.

<u>In Certain Cases, States Must Not Be Preempted from Imposing Stricter</u> <u>Requirements</u>

Some of the modifications to the NERC filing proposed by FERC Staff, *e.g.*, those dealing with minimum vegetation clearance requirements for overhead transmission lines, are acceptable as far as they go. However, with regard to this particular standard on minimum vegetation clearance requirements, as well as several others, FERC-approved mandatory standards must not preempt the ability of the states to adopt or impose even more stringent requirements, such as those contained in CPUC General Order 95.

FERC Should Recognize the Relationship of the Proposed Mandatory Reliability Standards to the CPUC's Generator Operations and Maintenance Standards

In its General Order 167, the CPUC has adopted a set of generator operation and maintenance standards enforceable against the operators of large independent and IOU-owned power plants. Although it does not specifically address this subject, NERC's ERO application does appear to respect the line between federal and state jurisdiction over power plant operations, maintenance and reliability. Similarly, as it evaluates, and ultimately approves NERC-proposed mandatory reliability standards, FERC should respect this line and should not to take any action that would either blur this line or in any way impinge upon state authority to enforce the kind of rules that are set forth in CPUC General Order 167.

<u>The CPUC explicitly endorses and supports many of the points made by</u> WECC in its Comments being filed in this proceeding

The CPUC has reviewed the comments submitted by WECC in this proceeding. The CPUC herby states its explicit support for and endorsement of the following points made by WECC in its comments:

- NERC should develop, and FERC should require, a thoughtfully structured phasing-in process through which proposed mandatory reliability standards take effect over a two-to-four-year period. The implementation process should prioritize the proposed standards that will deliver the greatest positive impact on reliability. Implementation priorities should be based on a risk assessment, industry experience with existing reliability approaches, or other criteria tied to technical merit and cost-effective benefits to consumers.
- Proposed mandatory reliability standards should not be approved unless they
 include clear measures for assessing compliance, and all elements of
 proposed mandatory reliability standards (including their associated
 measures) should be thoroughly field-tested before they are implemented.
- Reliability standards must be flexible enough to accommodate regional variations so that, while expectations for reliability performance will be uniform across the nation, the *means* to deliver required results can be

tailored to enable regions to deploy approaches that will be most efficient and cost-effective within their areas.

 It will not be helpful for FERC to grant conditional approval of reliability standards that are not well tested and workable when proposed. Proposed mandatory reliability standards should be approved or disapproved. Use of conditional approval will likely complicate the industry's ability to clearly understand what it must do to comply with mandatory standards. Moreover, a reliability standard that has gained conditional approval is almost certain to change before approval becomes final.

CONCLUSION

For all the foregoing reasons, FERC should move carefully as it considers whether and how to implement the proposed mandatory reliability standards that NERC filed in this Docket. Moreover, as it proceeds, FERC should make sure that those standards that it does approve are realistic, cost-efficient and truly enforceable. Finally, and most importantly, as it moves through this process of approving mandatory reliability standards, FERC should recognize the usefulness and importance of allowing regional variation in reliability standards and should acknowledge and, to the extent possible, defer to the successful reliability program, based on enforceable, quasi-mandatory standards, which WECC has implemented in the Western Interconnection.

Dated: June 26, 2006

Respectfully submitted,

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CERTIFICATE OF SERVICE

I hereby certify that I have this day caused the foregoing document to be served upon all known parties in this proceeding by e-mail upon each party identified in the official service list compiled by the Secretary in this proceeding.

Dated at San Francisco, California, this 26th day of June, 2006.

/s/ Laurence G. Chaset

Laurence G. Chaset

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