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BEFORE THE

FEDERAL ENERGY REGULATORY COMMISSION

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In the matter of: :

TECHNICAL CONFERENCE ON : Docket Number

PRIORITIES FOR ADDRESSING : AD11-6-000

RISKS TO THE RELIABILITY OF :

THE BULK-POWER SYSTEM :

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Commission Meeting Room

Federal Energy Regulatory Commission

888 First Street, Northeast

Washington, D.C. 20426

Tuesday, February 8, 2011

The technical conference was convened, pursuant to notice, at 10:05 a.m., Commissioner Cheryl A. LaFleur, presiding.

ATTENDEES:

CHAIRMAN JON WELLINGHOFF, Chairman, FERC

COMMISSIONER MARC SPITZER, Commissioner, FERC

COMMISSIONER PHILIP MOELLER, Commissioner, FERC

COMMISSIONER JOHN NORRIS, Commissioner, FERC

COMMISSIONER CHERYL A. LaFLEUR, Commissioner, FERC

JIM PEDERSON

JOSEPH McCLELLAND

1 ATTENDEES (Continued):

2 NORMAN BAY

3 ROGER MORIE

4 MICHAEL BARDEE

5 JONATHAN FIRST

6 CHRISTOPHER YOUNG

7 THE HONORABLE TRENT FRANKS, (AZ) U.S. HOUSE OF

8 REPRESENTATIVES

9 JOHN Q. ANDERSON, Chairman of the Board, NERC

10 GERRY W. CAULEY, President & CEO, NERC

11 THE HONORABLE BETTY ANN KANE, Chairman, DCPUC, on

12 behalf of DCPS AND NARUC

13 KEVIN BURKE, Chairman, President & CEO, Consolidated

14 Edison Inc., on behalf of Consolidated Edison

15 and the Edison Electric Institute

16 ROBERT S. BROWN, P.E., President, Sassafras River Assoc.

17 MIKE SMITH, President and CEO, George Transmission Corp.,

18 on behalf of Georgia Transmission Corp. and the

19 Rural Electric Cooperative Association (NRECA)

20 JOHN A. ANDERSON, President, Electricity Consumers

21 Resource Council (ELCON)

22 LONNIE N. CARTER, President and CEO, Santee Cooper

23 RANDY VICKERS, Director, United States Computer Emergency

24 Readiness Team (US-CERT)

25

1 ATTENDEES (Continued)

2 AVI SCHNURR, President, Electric Infrastructure Security

3 Council

4 RONALD L. LITZINGER, President, Southern California

5 Edison Company

6 STEPHEN J. WRIGHT, Administrator and CEO,

7 Bonneville Power Administration

8 STEPHEN G. WHITLEY, President and CEO, New York ISO

9 ED TYMOFICHUK, Vice-President, Transmission

10 Manitoba Hydro

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1 PROCEEDINGS

2 10:07 a.m.

3 CHAIRMAN WELLINGHOFF: If we could all take our
4 seats please and get started. We're here this morning, and
5 if you could sort of turn off your cell phones, that would
6 be helpful too please. We're here this morning for a
7 technical conference, to address the risks and reliability
8 of the bulk power system. Really, we're here to talk about
9 priorities with respect to reliability.

10 We have a number of panels throughout the day
11 that are going to address that for us, but we are going to
12 also hear from a Congressman, Congressman Trent Franks here
13 in a moment. But I want to let you know that this is a very
14 important issue to me. Reliability, I think, is a critical
15 issue.

16 I was actually speaking with Steve Wright of BPA
17 coming into the workshop this morning, and he and I were
18 discussing how critical reliability is and how it interfaces
19 with the issues of the commercial side as well. Economics
20 and reliability are very entwined.

21 So I'm looking forward to the panel this morning.
22 I want you to know that we're going to have our Commissioner
23 LeFleur, who is going to take over the session this morning,
24 and she'll be chairing it. But I'm very appreciative for
25 all of you coming, and looking forward to all the remarks

1 you're going to provide. Thank you. Commissioner LeFleur.

2 COMMISSIONER LeFLEUR: Thank you, Mr. Chairman.
3 Good morning everyone and welcome. What a great group, both
4 the speakers and all the folks that are here. We really
5 appreciate having you here, especially our honored guest
6 from the Hill.

7 As everyone knows, the purpose of today's
8 conference is to discuss policy issues for addressing risk,
9 reliability and emerging issues. We'll begin with opening
10 remarks from the Commissioners, followed by remarks from our
11 Congressman, Trent Franks.

12 We'll then proceed to three panel discussions,
13 ask each of the panelists to give brief, five-minute opening
14 presentations, followed by a question and answer period.
15 We'll break for lunch approximately 11:45 to 12:30.

16 After the conference, interested parties may
17 submit written comments in Docket AD11-6. The Commission
18 may issue a further notice seeking comment on specific
19 areas, based upon what we hear today.

20 Now I'd like to recognize my colleagues for their
21 opening remarks, beginning with the Chairman.

22 CHAIRMAN WELLINGHOFF: Thank you, Commissioner
23 LeFleur. As indicated, I think reliability is one of the
24 most important things that this Commission addresses, and we
25 can all appreciate that, number one, from the recent events

1 in Texas, New Mexico and Arizona, and from events in the
2 District here that don't necessarily relate to reliability
3 at the bulk power system level. But when I go to dinner,
4 people ask me what am I going to do about PEPCO?

5 (Laughter.)

6 CHAIRMAN WELLINGHOFF: I tell them to talk to
7 your D.C. Commission and your Maryland Commission, because
8 there's 99 percent distribution issues there.

9 But nevertheless, they're intertwined, and we
10 need to look at those issues, the ones that we have
11 jurisdiction over, and the ones that certainly our federal
12 and state commissioners have issues with as well, and we
13 need to work together to ensure that the bulk power system
14 is reliable and secure, and to also ensure that that
15 security is maintained at a reasonable cost.

16 We can do that and move forward with integrating
17 those clean energy resources into the grid that we need to
18 integrate into the grid, to ensure the economic viability
19 and security of this country.

20 So with that, I'm looking forward again to
21 listening all the panelists today, and seeing how we can
22 take that information and move forward with it together, and
23 ensure that reliability does become an integral part of what
24 we do every day. Thank you.

25 COMMISSIONER LeFLEUR: Thank you. Commissioner

1 Spitzer?

2 COMMISSIONER SPITZER: Thank you, Commissioner.
3 Once again, I appreciate the opportunity to hear from
4 stakeholders with regard to the reliability and the
5 implementation of our reliability program. I also want to
6 sincerely thank Congressman Franks for his leadership on
7 reliability issues, especially with regard to
8 electromagnetic pulses.

9 The starting point for me on any discussion with
10 the industry on reliability is to acknowledge that FERC and
11 the regulated community have the same goal, to ensure the
12 reliable operation of the nation's transmission grid.

13 I know industry and NERC take their obligations
14 seriously, and I commend the industry and NERC for their
15 hard work on these critical matters, and I am committed to
16 working with the industry and NERC to achieve our common
17 goal.

18 I recognize, however, that some have disagreed
19 with the role FERC has played with regard to the development
20 of reliability standards. Section 215 of the Federal Power
21 Act imposes responsibilities on FERC and NERC regarding the
22 development of reliability standards. I believe that we
23 have struck the proper balance of our respective roles in
24 the recent order regarding the definition of the bulk
25 electric system.

1 In revisions to electric reliability organization
2 definition of bulk electric system, that's Order 743, we
3 offered guidance, but left to industry the role of
4 developing a standard to address the Commission's concerns.

5 I believe Order 743 established a template for
6 the future. Now I do not hold false hope that our approach
7 in 743 will eliminate all disagreements between FERC and
8 NERC. However, as we continue to work together towards our
9 common goal, I believe we can and will find common ground.

10 As for today's discussion, the topic is
11 priorities. I consider priorities in at least two ways.
12 First, I think of a priority in terms of identifying
13 specific reliability standards or key reliability issues
14 that we need to address first, to best ensure the reliable
15 operation of the system. I perceive this as a "what"
16 question.

17 Second, in answering the what question we cannot
18 lose sight of the need to be sensitive, is the "how"
19 question. That is, how should the Commission, NERC and the
20 industry best ensure that the reliability standards address
21 Commission orders and other important reliability
22 developments, without interfering with ongoing work or the
23 reliable operation of the grid, as required by the Federal
24 Power Act.

25 I look forward to hearing about both aspects of

1 the reliability question today, and in follow-up comments.
2 Finally, I'd like to thank all those in attendance,
3 particularly colleagues from the states and our
4 international regulators, for their effort and attention to
5 these matters. Thank you.

6 COMMISSIONER LeFLEUR: Thank you. Commissioner
7 Moeller?

8 COMMISSIONER MOELLER: Thank you, Commissioner.
9 In 1999, I was a staffer for the United States Senate,
10 worked for Senator Gorton, and we put together the first
11 stand-alone reliability legislation, which did eventually
12 pass the Senate in 2000, only to die in the House, but
13 become law five years later.

14 So as some of you know, I'm partly to blame for
15 us being here today. Nevertheless, it was an honor to be a
16 part of that process and, as we look at where the present
17 reliability set of issues are, it's I would say our most
18 important job here. It's not always the most glamorous job
19 we have, and there's a lot of hard work behind it, and
20 that's what today's effort is about.

21 I echo Commissioner Spitzer's thanks for the
22 extraordinary effort that many of you have put in to travel
23 here, prepare your remarks, and it's a complex relationship
24 that I believe is getting better. It's a relationship
25 between ourselves at the Commission, NERC and the industry.

1 Like every good relationship, it will be better with more
2 open channels of communication, and that is what today's
3 effort is about.

4 I look forward to our discussion, and especially
5 the discussion on priorities and how to use tools to reach
6 those priorities that we can all be comfortable with. Thank
7 you, Commissioner LeFleur.

8 COMMISSIONER LeFLEUR: Thank you. Commissioner
9 Norris.

10 COMMISSIONER NORRIS: Thank you, Commissioner.
11 I'm hard-pressed to think of a meeting or anything I'm
12 involved in at FERC since last July 6th, when Steve Wright
13 launched this notion that we should have a high level
14 discussion about priorities. It's been a topic of
15 conversation nearly every meeting I've been in with industry
16 and at NERC since then.

17 So I have a lot of anticipation for today, and
18 good anticipation, because I think the discussion we're
19 going to have this afternoon is a much-needed discussion.
20 It's clear that everyone wants a better sense of priorities,
21 and I agree with what Phil just said.

22 I think this is not -- if not the most, it is,
23 reliability is fundamental to our responsibility here at
24 FERC. If there was any doubt about that before 2005 in
25 NEPAAct '05, it was cleared up then, that that is a

1 fundamental role we play here at FERC, and it's not an easy
2 role.

3 But it is a role that I think is going to get
4 more complicated, as we make this transmission grid and
5 system more complicated, and because we are doing things now
6 that were never contemplated would be done on this
7 transmission grid.

8 I won't go into a lot of it with you all in this
9 industry. You know we're asking the system to do more and
10 more every day, and the notion that we could pass a law and
11 not have any more rolling blackouts also does not escape me
12 as being an unreasonable notion, because like as we may want
13 to to do all we can to plan to prevent reliability problems,
14 they're going to happen.

15 I want to make sure that this process leads to,
16 as Bill said, we've done all we can reasonably do to prevent
17 that from happening, and limit the damage for when it may
18 happen. That's what I see as our goal. But as I said, the
19 threats are increasing every day. In fact, I've got to
20 relate one story.

21 I took my boys to the Spy Museum a couple of
22 weeks ago, and if you haven't been through it lately, you
23 get to the very last room. The greatest threat to America
24 today and the SBI that threatens us the most is this. One
25 entire room at the end is dedicated to this scary

1 proposition, of what bringing down the eastern or western
2 interconnect could mean to the entire world's economy, and
3 the threat of cyber security.

4 It's a little daunting. I wanted to say to my
5 boy that we can ride back to work, but it is daunting about
6 the scope of what we're trying to do here. As I think about
7 it, I think about what Congress did in that law, there is no
8 way in my mind that this gets done, our responsibility gets
9 done without industry.

10 In fact, with over 200,000 miles of transmission
11 line, and over 1,800 entities that own and operate that
12 system, there's no way this gets done without industry
13 taking the lead. Industry has to take the lead. We don't
14 have the capacity here to manage 200,000 transmission lines,
15 and operate 1,800 entities unless industry itself takes
16 responsibility for this.

17 So my priority today, while we talk about
18 vegetation management and relays and ambiguities and a list
19 that Steve brought to our attention last July that needs to
20 get worked out, and a process for establishing that to set
21 priorities is so critically important, my priority today is
22 also to have a discussion with you about roles and
23 responsibilities.

24 So if you haven't contemplated that in your
25 presentation for today, expect that as a question from me in

1 a follow-up. How do we sort through this, what I hope --
2 when Mark said BES to me, it helped clear it up. But I
3 still hear a lot of frustration out there, as I travel the
4 countryside talking about reliability, about roles and
5 responsibilities.

6 What I want to know today, and this discussion --
7 we have a couple of hours for this panel, and throughout
8 the rest of the panels as well, is what can we do at FERC to
9 empower and help industry to take the lead like I think has
10 to take place, to get this job done?

11 Thanks to all of you for your travel here today,
12 and helping us as we wrestle with these tough issues.

13 COMMISSIONER LeFLEUR: Thank you, Commissioner
14 Norris. Finally, I too would like to thank all of you for
15 coming to this important meeting. One of the first
16 decisions I made when I joined the Commission, I guess it
17 was seven months ago, was that I would make reliability a
18 personal priority.

19 I made that decision, because I know how
20 important it is. Obviously, keeping the lights on and
21 everything else that stays on from electricity is why we're
22 all in this enterprise that we're all in together. That was
23 even before I knew it was in the International Spy Museum,
24 so it's gone up a few notches now.

25 But also I just took it selfishly, because I

1 thought it was very interesting and would be an area that
2 because it's so new in the Commission's jurisdiction, would
3 be likely to see a lot of change and evolution, and that's
4 already proved to be true and I think there's more change
5 ahead.

6 While Congress has entrusted the Commission with
7 the responsibility for enforcing mandatory reliability
8 standards, as you all know the statutory scheme incorporated
9 elements of the previous voluntary regime that I was quite
10 familiar with back then, led by NERC and the regional
11 reliability councils.

12 So I guess it should be no surprise that the
13 transition has been somewhat difficult, to transition from a
14 voluntary regime to a hybrid between a voluntary and a
15 mandatory structure that we have now. I think it's
16 important to acknowledge that the transition has worked well
17 in many respects, and a lot has been accomplished and a lot
18 of standards have been written and enforced and improvements
19 have been made in a lot of areas.

20 But it's clear that there have also been growing
21 pains, I think, powered by disagreements among the
22 Commission, NERC, the industry, but also just by the volume
23 of work and the demands on the system in every aspect of its
24 operation.

25 Many of you have heard me say before that the

1 complex relationship among FERC, our Canadian counterparts,
2 NERC, the regional entities and industry, will work best if
3 it's grounded in mutual trust. Mutual trust, in turn,
4 depends on a set of shared priorities that we're working to
5 address in a timely manner.

6 The Commission, NERC, our Canadian counterparts
7 in industry, must identify which standards and directives
8 are of the highest priority based on their impact in
9 improving reliability for customers, and that's part of what
10 we hope today will -- not that there hasn't been a lot of
11 thought already. I know NERC already has a process to
12 prioritize its work.

13 But I hope today's discussion will help advance
14 that high level understanding. I hope that we have a lively
15 discussion, and I hope some consensus about where to go from
16 here emerges.

17 In addition to agreeing on priorities, we also
18 need to discuss how to update those priorities, because
19 everyone knows nothing stands still, and how to add emerging
20 issues that we already see or that may come forward in the
21 future.

22 And our guest from the Hill and our second panel
23 will focus on some of those emerging issues, including cyber
24 and physical security. This past September, I was fortunate
25 to represent the Commission at an international conference

1 on infrastructure security, particularly the potential
2 vulnerability of the electric grid to solar disturbances and
3 man-made electromagnetic disturbances. Our honored guest
4 this morning, Congressman Franks, sponsored that conference.

5 So I would now like to introduce our guest from
6 Capitol Hill, the Honorable Trent Franks, U.S. House of
7 Representatives. Mr. Franks is serving his fourth term in
8 the U.S. Congress, representing the 2nd District of Arizona.
9 He serves on the Armed Services Committee and the Judiciary
10 Committee, and has been a leader in Congress on addressing
11 the physical and cyber security of the U.S. electric grid.
12 Congressman Franks, thank you so much for being here.

13 CONGRESSMAN FRANKS: Well, thank you Commissioner
14 LeFleur. I just can't express to you what a tremendous
15 honor it is to be among all of you. Mr. Chairman, I'm
16 grateful for your hospitality here. As it happens, there
17 are a couple of people here that I consider very beloved
18 friends. Commissioner Spitzer and I have known each other
19 for about 25 years, and we decided earlier that if we told
20 stories about each other, it would be mutually assured
21 destruction.

22 So but I think he is a truly honorable man, and I
23 have the greatest respect for him. Also, Joseph McClelland,
24 Joe McClelland, I think personifies what a public servant
25 should be. With people like this and just the general

1 feeling I get being in this room, it makes me think that God
2 may not yet have despaired of mankind here. We still have a
3 lot to hope for, and I'm really grateful to be here.

4 I'm especially grateful to, just to express my
5 gratitude to all the people here for being here. I know
6 that this is a huge issue and it's going to take a lot of
7 people to address it, and I think you're all heroes for
8 doing that.

9 It is obvious to all of us that this is one of
10 the most pressing national security issues currently facing
11 the United States of America, and indeed the human family
12 today. Now I know you all have a great deal of material to
13 cover in your conference, and so as King Henry VIII said to
14 his fourth wife, "I promise I'm not going to keep you here
15 long."

16 (Laughter.)

17 CONGRESSMAN FRANKS: But it's true that in our
18 technological advancement, we have now captured the electron
19 and transported its utility into nearly every business, home
20 and industrial endeavor throughout the civilized world. In
21 so doing, we've also advanced our standard of living and
22 productivity beyond dreams, and we've also grown profoundly
23 dependent upon electricity and its many accoutrements.

24 In keeping with one of humanity's most reliable
25 hallmarks, we now find ourselves having a great strength

1 that also has an unsettling vulnerability, and that is EMP
2 or electromagnetic pulse. I am probably going to repeat so
3 many of the things that all of you know so well. I feel
4 like a first grader before a college examination board
5 sometimes.

6 But catalyzed by a major solar storm, a high
7 altitude nuclear blast or a non-nuclear device induced
8 intentional electromagnetic interference. This invisible
9 force of ionized particles has the capability to overwhelm
10 and destroy our present electrical power grid, our
11 electrical equipment, in many cases, including electric
12 communication networks, radio communications, integrated
13 circuits and computers.

14 Now I know we all owe a great debt of gratitude
15 to an astronomer, Richard Carrington, who first discovered
16 this phenomenon in 1855, when he identified and chronicled a
17 major solar storm, which intensified the Northern Lights and
18 caused the telegraph system, the only major electrical
19 system on earth at the time, to go down across the planet.

20 The National Academy of Science predicts this
21 effect to a lesser or greater degree will recur globally
22 approximately every 100 years. In 1962, the United States
23 discovered that a high altitude nuclear blast could generate
24 a more localized EMP effect of the same intensity as the
25 Carrington Effect.

1 In an upper atmospheric nuclear test called
2 Starfish Prime, an EMP occurred, causing electric lines to
3 fuse and radio and street lights to stop working in Hawaii,
4 nearly 900 miles away. The residual effects also disabled
5 nearly all major satellite systems at the time.

6 Because of new understandings of how EMP
7 interacts with the earth's electromagnetic field, and that
8 it has intensified over a large land mass, we now believe
9 that if a nuclear warhead of sufficient size were detonated
10 at an altitude of 400 kilometers over America's heartland,
11 the resulting damage to our electric grid and infrastructure
12 would be catastrophic across most of the continental United
13 States.

14 Such a result would of course be devastating to
15 our electricity, our transportation, our water and food
16 supply, our medical care, financial networks,
17 telecommunication and broadcasting systems and our
18 infrastructure. Under such a scenario, both military and
19 productive capability would be indeed devastated. The
20 immediate and eventual impact, directly and indirectly on
21 the human population, especially in major cities, is
22 unthinkable to all of us.

23 Now it should be remembered that EMP was first
24 considered as a military weapon during the cold war, as a
25 means of paralyzing U.S. retaliatory forces. The Soviet

1 Union had studied it greatly at that time.

2 The EMP Commission began their 70-page executive
3 summary describing a one or two EMP attack, a one or two
4 missile EMP attack as one of the few threats which looks as
5 if it could potentially defeat the U.S. military. Dr.
6 William Graham, the chairman of the EMP Commission,
7 testified before the U.S. House Armed Services Committee.

8 I happened to be there at the time. He is a very
9 articulate person. He said "EMP is one of a small number of
10 threats that can hold our society at risk of catastrophic
11 consequences." Continuing, "a determined adversary can
12 achieve an EMP attack capability without having a high level
13 of sophistication.

14 "For example, an adversary would not have to have
15 a long-range missile capability to conduct an EMP attack
16 against the United States. Such an attack could be launched
17 from a freighter off the U.S. coast using a short or medium-
18 range missile, to loft a nuclear warhead to high altitude.
19 A terrorist sponsored by a rogue state could potentially
20 execute such an attack without revealing their identity."

21 Now Dr. Graham has said that a major catastrophic
22 EMP attack on the United States could cause an estimated 70
23 to 90 percent of the population of the United States to
24 become unsustainable. It is impossible for me to even wrap
25 my mind around that figure. But for terrorists, I'm afraid

1 that such a scenario is potentially their ultimate goal, and
2 I believe EMP could be their ultimate asymmetric weapon.

3 In 1988, Osama bin Laden called it a religious
4 duty for Al-Quaeda to acquire nuclear weapons. U.S. Admiral
5 Mike Mullen, Chairman of the Joint Chiefs of Staff has said
6 "My worst nightmare is terrorists with nuclear weapons. Not
7 only do I know that they're trying to get them, but I know
8 that they will use them."

9 This is, in my judgment, the greatest danger of
10 all if a rogue state like Iran steps over that nuclear
11 threshold. Rogue regimes and terrorists the world over will
12 have access to these monstrous weapons and potential EMP
13 capability.

14 We would do well to remember that Iran, the
15 world's leading sponsor of international terrorism, has
16 practiced launching a mobile ballistic missile from a vessel
17 in the Caspian Sea. Iran has also tested high altitude
18 explosions of their medium range ballistic missile, the
19 Shahab-3, a test mode very consistent with an EMP attack,
20 and described as successful. A recent Iranian journal
21 contained an article recommending just such a strategy. The
22 article noted that if western nations do not learn to defend
23 themselves against EMP attacks, they will be destroyed.

24 On June 2nd of this year, Iranian President
25 Mahmoud Ahmadinejad again made it clear where he stands.

1 Israel, he declared, "is about to die, and will soon be
2 erased from the geographical scene." Now Jewish author
3 Primo Levi once was asked what he had learned from the
4 Holocaust, and he replied "When a man with a gun says he's
5 going to kill you, believe him."

6 At this moment, Mahmoud Ahmadinejad, a man who in
7 the same breath both denies the Holocaust ever occurred and
8 then threatens to make it happen again, is arrogantly
9 seeking a gun with which he vows to wipe the state of Israel
10 off the map, while promising that a world without Israel and
11 America is "possible."

12 He's also stated the time for the fall of the
13 Satanic power of the United States has come, and the
14 countdown to the annihilation of the emperor of power and
15 wealth has started. He has said point blank the wave of
16 Islamic revolution will soon reach the entire world. Now
17 what a happy, cheerful fellow. He just lifts one's spirits.

18 But unfortunately, he talks like a man who knows
19 something the rest of us don't. It's not enough to casually
20 dismiss this fanatical rhetoric, because when analyzing the
21 nature of any threat, of course we must always seriously
22 assess two things: a potential enemy's intent and his
23 corresponding capacity to carry out any such intent.

24 Mahmoud Ahmadinejad and his regime have stated
25 very clearly that they desire to see Israel wiped off the

1 face of the earth and America and the west brought to their
2 knees. Nuclear warheads could give them the capacity to
3 proceed in that endeavor, and to ignore the incontrovertible
4 fact that Iran is rapidly progressing towards nuclear
5 weapons capability is to resign ourselves and our children
6 to walk in the shadow of nuclear terrorism and potentially
7 the devastation of EMP aftermath.

8 You know, ladies and gentlemen, it seems like
9 there is usually and thankfully a moment in the life of
10 every problem, when it is big enough to be seen by
11 reasonable people, and still small enough to be solved. You
12 and I live in just such a moment, and there is still time
13 for the free world to address and mitigate the vulnerability
14 that naturally-occurring or weaponized EMP represents to the
15 mechanisms of our civilization.

16 It is my belief that the U.S. Congress should and
17 must immediately move forward to protect our electric
18 infrastructure from the devastation that could come from
19 EMP. To that end, I'm introducing the Shield Act, which
20 will address the electric grid's vulnerabilities to an EMP
21 event by establishing mandatory procedures intended to
22 isolate the most critical elements of the grid from an
23 attack, and provide hardware-based solutions to actually
24 fortify the electric infrastructure itself.

25 Let me just, if I could, have a little side note

1 here. I believe that what Commissioner Norris said is
2 absolutely true, and also Commissioner LeFleur, that trust
3 and common goals between industry and the recognized
4 regulatory mechanisms are vital. I came from a small
5 business background. I know that regulation is always
6 something that makes it difficult for private individuals
7 and businesses to try to assimilate in their business.

8 Yet I am convinced that in this case, that one of
9 the best investments that producers of electricity can make
10 is to make sure that they are not affected by something of
11 this magnitude. We've also introduced and launched the EMP
12 Caucus last year, and I will continue to chair that in the
13 new Congress. Its purpose is to educate members and staff
14 about the nature of the EMP threat, and steps Congress can
15 take to defend against it.

16 The challenge to ultimately and fully protect our
17 peoples and nations from all the various perils of
18 electromagnetic pulse will be long and lingering. But the
19 time to act to protect our nation from the most critical
20 danger is now. The threat is real, and the implications are
21 sobering.

22 Frank Lindsey put it all in stark perspective
23 when he said "Here is the grim truth. We are only one act
24 of madness away from a social cataclysm unlike anything our
25 country has ever known. After a handful of such acts, who

1 knows what kind of civilizational breakdown might be in
2 store."

3 Ladies and gentlemen, the purpose of any
4 government or its leaders is to protect the lives and
5 security of its innocent citizens. The failure of this
6 responsibility renders all others meaningless.

7 I'm just so very grateful to every one of you for
8 nobly engaging this indescribably important challenge, and
9 it's my hope that we can join together in raising awareness
10 about the nature of EMP, and doing everything in our power
11 to ensure that, for the sake of our children and future
12 generations, that dark day mentioned by Mr. Lindsey will
13 never occur on our watch.

14 I am grateful to all of you for this opportunity
15 to speak to you, and in Congress we say I'm now ready for
16 questions. I don't know how you do that here, so I'm just
17 grateful again to have the chance to talk to you, and
18 especially appreciate your focus on this.

19 I've talked to so many. I've talked to Mr.
20 Bardee here. He's a brilliant gentleman, and there are just
21 so many people here that I have a great deal of respect for.

22 COMMISSIONER LeFLEUR: Thank you so much. That
23 was certainly thought-provoking. If we had any doubt about
24 the importance of some of the aspects of what we're involved
25 in here, that certainly removed it, and we really appreciate

1 your taking the time out of your schedule to come down and
2 speak with us. So thank you.

3 I'm sure this afternoon when we talk about
4 emerging issues, we'll touch on a lot of what you're talking
5 about. Thank you.

6 CONGRESSMAN FRANKS: I thank you all again very
7 much.

8 COMMISSIONER LeFLEUR: Thank you.

9 (Applause.)

10 COMMISSIONER LeFLEUR: We're going to shift gears
11 a bit here and move to our first panel. So I would ask the
12 panelists from the first panel to take their seats, and this
13 panel will focus on how current reliability issues and
14 standards development issues can be prioritized, to assure
15 that the most important issues are addressed first.

16 As the panelists take their seats, I'll give them
17 a second before we introduce them. We truly have a great
18 group here this morning, led by -- I mean it's not every day
19 the two John Andersons are sitting at the same table here.

20 Led by John Q. Anderson, the Chairman of the
21 Board of NERC; Gerry Cauley, known to all, the president and
22 the CEO of NERC; Chairman Betty Ann Kane of the District of
23 Columbia Public Service Commission, here on behalf of her
24 commission and also NARUC; Kevin Burke, the Chairman,
25 President and CEO of Consolidated Edison, here on behalf of

1 ConEd and also the Edison Electric Institute; Roberta Brown,
2 one of the founders of the Reliability First regional
3 entity, who currently sits on the boards of ISO New England
4 and the Independent Electric System Operator of Ontario, so
5 we have an international presence; Mike Smith, the President
6 and CEO of Georgia Transmission Corp, here on behalf of his
7 company and also the National Rural Electric Cooperative
8 Association, NRECA; the other John Anderson, John A.
9 Anderson, the President of the Electricity Consumers
10 Resource Council or ELCON; and Lonnie Carter, President and
11 CEO of Santee Cooper, representing Santee Cooper and the
12 American Public Power Association.

13 So we'll begin with Mr. John Q. Anderson. Thank
14 you.

15 MR. JOHN Q. ANDERSON: Thank you, Commissioner
16 LeFleur. Good morning to you and Chairman Wellinghoff and
17 the rest of the Commissioners, also the Commission staff and
18 my fellow panelists. We really appreciate this opportunity.

19 I am John Anderson, Chairman of the NERC Board.
20 I've been on the board for about ten years and been chairman
21 for the last two years. Before I start into the prepared
22 remarks, I would just like to say that I very much also
23 appreciate Commissioner Franks -- Congressman Franks'
24 remarks, and say that we will be addressing the EMP issue in
25 some of our remarks later.

1 We take it very seriously, and it's hard to hear
2 something that sobering and that strong without responding
3 right away to it. So I appreciate those, and Gerry and I
4 will both be talking about those, especially this afternoon
5 in the second panel.

6 Several of my colleagues on the board are in
7 attendance today, and in fact the majority of our NERC board
8 is here at this hearing, and we're very interested in
9 learning from the other panelists, and also in hearing from
10 you, the Commissioners, about the priorities that you see as
11 being important, and the methodologies we can use to set
12 those priorities in the future.

13 NERC's vision focuses on enhancing compliance
14 with lessons learned, becoming a learning organization
15 that's focused on improving the reliability performance
16 through event analysis, and on fostering continuous
17 improvement within the organization and across our industry.

18 My colleagues on the board and in NERC are
19 committed to this vision. NERC's initial years were
20 correctly focused on building the organization. Now, with
21 mandatory and enforceable standards in place, NERC begins to
22 focus on four things.

23 First, becoming a risk-informed organization, one
24 that's able to identify and understand reliability risks,
25 and help the industry manage those risks, and effectively

1 prioritize reliability initiatives based on those.

2 Second, on promoting a culture of reliability
3 excellence and compliance with reliability standards. This
4 is accomplished by NERC being a recognized and trusted
5 leader and advocate in reliability matters, and by strong
6 enforcement authority that's independent, without conflict
7 of interest, objective and fair.

8 Third, by building a coordinate ERO enterprise
9 that's based on effective integration and leveraging of
10 regional and stakeholder ideas and expert resources, with a
11 common purpose of improving reliability.

12 Fourth, building a constructive relationship with
13 FERC, Congress and other federal, state and provincial
14 authorities in the United States and Canada. Such
15 relationships must be built through communicating
16 expectations, and consistently delivering responsive results
17 that demonstrate the effective mitigation of the reliability
18 risks that we've identified.

19 NERC has just completed its fourth year of
20 operating as the ERO authorized by the Energy Policy Act of
21 2005. It's an appropriate time to take stock of where we're
22 heading, and two things stand out for me.

23 First, we collectively must focus on high
24 priority issues. Neither NERC nor the Commission nor the
25 industry, nor the ultimate customers, have the resources to

1 do everything that one can possibly imagine to support and
2 improve reliability.

3 We've learned this over these four years. We
4 must set priorities, and an important part of setting
5 priorities is also deciding what we are not going to devote
6 resources to that could be worthy.

7 The second thing that stands out to be is we
8 believe the best way to set those priorities is to use a
9 risk-based analysis in our decision-making. It will be
10 important to engage the expertise of the asset owners and
11 operators as we do that risk assessment. It will also be
12 important for policymakers to weigh in on the nature and
13 level of risk that they expect to be addressed.

14 A key component of that risk assessment will be
15 coming to a common, shared understanding of what is an
16 adequate level of reliability, as that term's used in
17 Section 215. The discussion on priority-setting and risk
18 assessment must include stakeholders and policymakers from
19 Canada as well as the U.S. The grid is an international
20 one, and it must operate to a common set of rules and
21 policies.

22 Given NERC's international make-up, some of those
23 discussions can and do take place at NERC. Others will need
24 to occur between the policymakers on both sides of the
25 border themselves. NERC would be pleased to be a resource

1 for those discussions.

2 Recently, the NERC board has approved actions to
3 improve the pace of the standards process, while retaining
4 the ANSI accreditation that many of us consider so
5 important. We've established just this year a Trustee
6 Standards Oversight and Technology Committee.

7 That committee will provide greater oversight to
8 the stakeholder standards process, and one of its foremost
9 roles is ensuring priorities are set and adequate resources
10 are directed to the most important standards according to
11 those priorities.

12 My colleagues and I also recognize NERC's public
13 service role. As we move forward, we must also be conscious
14 of the cost of our initiatives, both at NERC and the
15 regions, but also impacts to the bulk power system owners,
16 operators and users. Our inquiry must begin with the
17 question of what is best for reliability, but we must also
18 assure that we do is done efficiently and effectively.

19 Again, I appreciate this open dialogue with the
20 Commissioners on reliability policy and priorities, and I
21 look forward to your questions and comments for the rest of
22 the discussion. Thank you.

23 COMMISSIONER LeFLEUR: Thank you very much. Mr.
24 Cauley.

25 MR. CAULEY: Thank you, Commissioner LeFleur.

1 Good morning Chairman Wellinghoff, Commissioners, staff and
2 fellow panelists. NERC's mission is to ensure the
3 reliability of the bulk power systems of North America, and
4 promote reliability excellence.

5 To be effective, we must understand and address
6 risks that can lead to failures of the grid. In contrast to
7 the emerging risks to be addressed in Panel 2, the
8 conventional risk landscape is reasonably well understood.
9 The generator failures, gas shortages and rolling blackouts
10 experienced in the cold weather in Texas and the Southwest
11 last week represent just one opportunity to improve our
12 readiness, and to address conventional risks such as extreme
13 weather.

14 However, we cannot address reliability priorities
15 without a common understanding of the meaning and scope of
16 an adequate level of reliability. For several decades,
17 reliability in the NERC arena meant preventing cascading
18 failures, preserving the integrity of the grid, avoiding
19 equipment damage, and providing an adequate bulk power
20 supply.

21 The Commission, has on several instances raised
22 the notion of continuity of service to customers as an
23 additional factor, and I believe this is a fair suggestion,
24 as long as we distinguish between unintentional load loss
25 caused by grid failures, and intentional load-shedding used

1 as an essential operational tool.

2 Because the meaning of an adequate level of
3 reliability is so important to setting priorities, I'm
4 directing a new NERC review of this question this year, and
5 plan to file a proposal later in the year. I believe the
6 reliability investment that we are promoting every day
7 through our standards, compliance programs, alerts and other
8 initiatives, should be driven primarily by overall value to
9 customers and ratepayers.

10 It is important to achieve reliability risk
11 mitigation in a manner that balances affordability of
12 electricity in a competitive global market, with the need to
13 ensure reliability and security of our North American
14 infrastructure. Priorities must be driven by a clear
15 understanding of risks and consequences, and the costs and
16 benefits associated with addressing them.

17 In assessing priorities going forward, it is
18 helpful to see what was accomplished looking back. Since
19 the August 2003 blackout, not only have we stood up a
20 mandatory compliance and enforcement program with 1,900
21 registered entities, we have completed a number of important
22 reliability initiatives, including new standards on
23 vegetation management, transmission line relay loadability,
24 operator training, backup control center and cyber security.
25 A few years from now, I want to be able to say we've

1 conquered more big issues like these.

2 So what are my priorities going forward with
3 regard to conventional risk management? Each of these is a
4 recurring theme we've seen over recent years. Ensuring
5 relay protection systems operate as expected and faults are
6 cleared without unnecessarily tripping other equipment;
7 ensuring field engineers and technicians modify system
8 configuration, including protection and control settings,
9 only after assessment of the consequences, and after
10 informing operating personnel when a change in configuration
11 could temporarily set up common mode failure.

12 Third, ensuring operating personnel use clear,
13 unambiguous communications when issuing directives and
14 communicating other operational information. Finally,
15 preventing non-random equipment outages, such as those
16 caused by vegetation or objects within safe clearance
17 distances from energized lines, and common mode failures of
18 generation, such as we saw last week during the extreme
19 cold.

20 In the area of reliability standards development,
21 the setting of priorities for NERC also takes into
22 consideration the need to be responsive to regulatory
23 directives, such as those on frequency response, personnel
24 training, the Planning Standard Footnote B regarding loss of
25 load following a contingency, the definition of a bulk

1 electric system and dozens of other projects.

2 We also have an opportunity to soon close out
3 several standards projects that have been in the works for a
4 while, such as standards on transmission planning,
5 reliability coordination and real-time operations.

6 Another opportunity in standards is to see how we
7 can further expedite the development process. I believe
8 that the highest priority standards we have in front of us
9 call for a new procedure to resolve objectives and create a
10 90 percent draft in a very short time frame, using a team of
11 industry experts, attorneys and compliance staff.

12 The ANSI consensus process then could be used for
13 vetting and validating near the end of that process. By
14 simply discussing priorities today, beyond simply discussing
15 priorities today, we must ensure there's a systematic
16 approach for analyzing risks and setting priorities going
17 forward.

18 With our shift toward risk-based approaches in a
19 learning industry, NERC is introducing quantitative measures
20 of reliability performance and root cause analysis. We are
21 beginning to see the benefits from our transmission and
22 generator outage database.

23 We also have a new database to monitor the
24 performance of demand side management programs. We recently
25 formalized criteria for event analysis; we've begun to use

1 that process, and I think this data and trends will help us
2 in the future in determining priorities.

3 I thank you for your attention, and look forward
4 to your questions and comments.

5 COMMISSIONER LeFLEUR: Thank you so much.
6 Chairman Kane.

7 MS. KANE: Thank you, Commissioner LeFleur and
8 good morning to Chairman Wellinghoff, Commissioners of the
9 Federal Energy Regulatory Commission and other witnesses
10 here today. I am Betty Ann Kane. I am the chairman of the
11 D.C. Public Service Commission, and I'm conscious that I
12 believe four of the Commissioners are constituents and
13 customers of our electric utility, that distribution
14 company, I should say, that we regulate.

15 I'm also here, however, on behalf of the National
16 Association of Regulatory Utility Commissioners and my state
17 colleagues from all over the country. NARUC, as you know,
18 is the national organization of state commissions,
19 responsible for economic and safety regulation of the retail
20 operation of utilities.

21 Specifically, NARUC's 220 plus members have the
22 obligation under state law to ensure the establishment and
23 maintenance of such energy utility services as may be
24 required by the public convenience and necessity, as well as
25 ensuring that such services are provided at just and

1 reasonable rates.

2 NARUC's members include the government agencies
3 in the 50 states, the District of Columbia, Puerto Rico, the
4 Virgin Islands, charged with regulating the rates and terms
5 and conditions of service associated with the intra-state
6 operations of electric, natural gas, water and telephone
7 utilities, and both Congress and the federal courts have
8 long recognized NARUC as the proper party to represent the
9 collective interests of state regulatory commissions.

10 I'm grateful for the opportunity to participate
11 today on behalf of NARUC as well as the D.C. Public Service
12 Commission. We care about this issue, because state utility
13 regulators are on the front lines of reliability, and
14 believe me as a regulator in this region, when the lights go
15 out, we're the ones who hear about it.

16 We're the first to hear complaints about outages
17 and about increased electricity prices. We are accountable
18 directly to the public. Some of us are elected, some of us
19 are appointed by elected officials, but we are directly
20 accountable to the public. Our names and our numbers are in
21 the phone book, and we're very easy to reach.

22 NARUC is pleased that FERC and NERC are having
23 these dialogues to clarify NERC's priorities, and the
24 relationship between the two organizations, and we
25 appreciate the opportunity to participate in this important

1 dialogue and bring the unique perspective of state
2 regulators to the discussion.

3 As everyone in this room knows, reliability is
4 essential at every level. If we can't guarantee a reliable
5 system, the public will lose faith, not only in their
6 utility provider, but in the fact of regulation itself.

7 As I said, however, in my shoes as a regulator, I
8 have an additional responsibility of ensuring that costs are
9 just, reasonable and as affordable as possible. D.C., the
10 District of Columbia is a unique example. We have some of
11 the wealthiest and the poorest consumers in the nation, and
12 it's my job to make sure the lights stay on at reasonable
13 rates for everyone in the District.

14 Maintaining reasonable costs is an important
15 regulatory mandate. But as you know, utility investments
16 that are mandated by FERC are passed through as costs to
17 consumers in retail rates, and they don't accept the
18 explanation that they're not rates that I control, a cost
19 that I control.

20 We encourage NERC and FERC, as I said, to ensure
21 that the standards to provide reliability have benefits that
22 justify their costs, and we encourage you to avoid creating
23 costly compliance requirements that do not necessarily
24 increase bulk power reliability.

25 State commission staff should work with NERC as

1 participants, or do work with NERC, excuse me, as
2 participants on a variety of NERC committees and task
3 forces. State staff engaged with NERC remark on the intense
4 number of standards that need to be developed under an
5 expedited time frame, and say that while it is important to
6 act quickly on standards, especially the cyber security
7 standards, it is also important to get those standards
8 right, which makes dialogue today even more important.

9 So the most discussed around reliability issues
10 among my NARUC colleagues are number one, the new
11 standardized definition of the bulk power system. There is
12 concern especially among my colleagues in the Western
13 interconnection and the Northeast regions, that the bright
14 150 kV definition will cause significant incremental costs
15 without equivalent benefits. I would refer you to a filing
16 by NARUC in March of 2010.

17 On vegetation management, we generally see this
18 as a successful standard, and on cyber security, which we
19 will speak about this afternoon, this is an issue that is
20 closely watched by NARUC's critical infrastructure
21 committee, and is a major topic of discussion among state
22 regulators, especially as communication systems and
23 communications capability are added to the grid at both the
24 wholesale, the interstate and the intrastate level.

25 Then in my testimony, when the staff prepared

1 this, they said PEPCO, question mark?

2 (Laughter.)

3 MS. KANE: Let me say a couple of things. First
4 of all, we are having a hearing at the District of Columbia
5 Commission on Thursday on PEPCO's response to the latest
6 storm. But storm situations aside, obviously the
7 distribution system and the reliability of the distribution
8 system is a major concern, not only in this city but across
9 the country.

10 I wanted to say two things about that. My staff
11 did a recent survey of reliability performance standards
12 among our neighbors, and we found that while D.C. has
13 performance standards, our neighbors in Maryland and
14 Virginia do not have any reliability standards.

15 One of the things I always have to say, we
16 regulate PEPCO in D.C. We don't regulate PEPCO in Maryland
17 or in the other places.

18 Secondly, when we're talking about Reliability
19 and we're talking about standards, both in the state and
20 nationally, I think we have to use real facts. I'm not here
21 to argue with the Washington Post or anyone that's been in
22 public life knows how much public opinion gets influenced by
23 facts or non-facts that end up in the popular press.

24 But I would say that on many of the standards,
25 storm outages aside, our local distribution system actually

1 ranks fairly high. I'd be happy to discuss that in any
2 detail later, but let me just end by saying again, on behalf
3 of NARUC, we do look forward to working with you, that we
4 are very concerned about costs.

5 Another final D.C. example that based on the
6 reliability pricing model auction last year, where
7 reliability is very much figured into the price, our auction
8 price for the District of Columbia was the highest in PJM,
9 and that significant transmission constraints, as well as
10 reliability, create pricing and reliability and pricing
11 concerns for customers.

12 We look forward to working with you as we put in
13 demand response, smart meters and dynamic pricing that will
14 also help mitigate some of the reliability concerns. Thank
15 you.

16 COMMISSIONER LeFLEUR: Thank you so much,
17 Chairman Kane. It's great to have you and NARUC at this
18 table in this debate, in this discussion. Mr. Burke.

19 MR. BURKE: Yes. Thank you, Commissioner LeFleur
20 and good morning to the Chairman, Commissioners, the staff
21 and all my fellow panelists. I'm Kevin Burke, the CEO of
22 ConEdison, and I'm here this morning representing the Edison
23 Electric Institute and its member companies.

24 I serve as the co-chair of the CEO Reliability
25 Task Force at EEI, and we really appreciate the Commission

1 holding this conference. As the CEO of the company
2 responsible for keeping the lights on in metropolitan New
3 York City, I am strongly aware of the importance of
4 reliability to our customers, and therefore the importance
5 of this topic here today.

6 I just want touch on a couple, which I hope you
7 do get a chance to read at some point time. But I just did
8 want to touch on a couple of things. I think when we talk
9 about priorities, you have to think about a priority system
10 that would indicate there are some issues that are a high
11 priority, some issues that are a low priority, some issues
12 that you might decide we are not going to do, and there are
13 some issues that we have to decide we've been doing them for
14 a while and we should stop.

15 It's those latter two categories that sometimes
16 are a real challenge in developing a prioritization system,
17 and I think that if we think we have a good prioritization
18 system, we should make sure that we can produce issues in
19 that category.

20 I think what should we be looking at, as some of
21 my fellow panelists have already said, what's the
22 likelihood, what are the consequences, you know, and what
23 are the costs. I think with respect to, you know, the
24 issues before with respect to FERC and NERC, we should
25 really be focusing on the risk to the bulk power system.

1 I look at that more in terms of, you know,
2 cascading outages. We have to look at balancing between the
3 bulk power system and the distribution system. I think
4 there's easily a tendency to combine the two, but there
5 really is a distinction between the two. I think when we
6 look at what NERC has to do, and NERC has its plate full, we
7 should try and encourage NERC to focus on bulk power system
8 and not get into the distribution system.

9 I think we have to be mindful of the costs that
10 the customers are being asked to bear, and it's not just
11 here's a cost and there is some marginal increase in
12 reliability, but does that increase in reliability warrant
13 the costs. Any increase in reliability or reliability at
14 any cost is not appropriate, and I think later on today,
15 probably in the Q and A, we'll get into some of those
16 issues.

17 You know, I think we have been focusing on
18 improving the development of standards. I think we said
19 we're going to try and get SIP-002 out by the end of the
20 year. We did. I know there has been some improvements in
21 the process, and I think we need to continue to work on
22 that.

23 But I do continue to have, you know, some
24 concerns about the process. I think, you know, in some
25 cases, there's still a lot on the plate that haven't been

1 prioritized. We haven't pushed some things off the plate
2 yet. We have to continue, I think, to look at, you know,
3 some of FERC's reliability orders, directing NERC to take
4 some action.

5 There are, you know, still a couple hundred of
6 them outstanding, and I think it's important that we
7 prioritize those so that we do look at, you know, those
8 issues that are important, not look at the issues that are
9 important, because new issues are going to come to the
10 table.

11 If we don't focus on what we're not going to do,
12 what we wind up doing is not a very good job in some other
13 areas, or some things will get inadvertently left off the
14 table, and we won't get to them, even though we think that
15 they are more important.

16 I think, you know, some of the things that the
17 NERC has been focusing on, with the alerts. There have been
18 over a dozen alerts issued. I think they have to be issued
19 judiciously and perhaps prioritized, which ones are being
20 issued, which ones are just an alert to the industry to say
21 "take a look at this issue. You don't have to get back to
22 us. Just take a look at it, and look at it from your own
23 point of view. What do you think is important for your
24 system, and how your system has to respond?"

25 We've been in this business a long time. We're

1 proud of ConEdison to come out frequently at the top of any
2 reviews of reliability with respect to our distribution
3 customers. We put a lot of effort into prioritization, and
4 we put a lot of effort into dealing more with the Public
5 Service Commission in New York State, so far, where we have
6 in the last year defined a level of reliability to which
7 we're going to try and get our networks, and not improve it
8 beyond that point, and they pretty much agree with us.

9 We've been talking to them about programs that
10 we've had underway for a number of years, in response to
11 prior events, that we've said we think we've received the
12 benefit of those programs, and while we said it's a long-
13 term program, perhaps at this point in time we should stop
14 implementing those programs.

15 We're having discussions with the staff, and I
16 think we're going to be in agreement, to be able to stop
17 some of those programs. And then, in some cases, either
18 reduce costs to the customers or use that money for some
19 other programs that we think will provide more benefits to
20 the customers.

21 So I look forward to the conversation later on,
22 and that concludes my remarks.

23 COMMISSIONER LeFLEUR: Thank you very much. Ms.
24 Brown.

25 MS. BROWN: Thank you. I'd like to thank the

1 Commission for the opportunity to speak today on the issues
2 related to the reliability of the bulk power system.

3 While Commissioner LeFleur noted that I am a
4 member of the boards of directors of the Ontario Independent
5 Electricity System Operator, and ISO New England, and I'm
6 also honorary godmother of Reliability First, one of my
7 unpaid jobs, my remarks today are on my own behalf. I'm
8 here as an individual, which one of the other panelists said
9 he's very envious of.

10 My remarks do not represent necessarily the views
11 of any other organization, but I also am an individual who
12 stands both in the United States and in Canada. It's always
13 good to be back in my home town, I have to say, and I will
14 confess that I had an apartment in the Spy Museum for a
15 year. So I'm very familiar with the area.

16 My initial training is as a nuclear engineer, and
17 I started my career as secretary of the ANS Standards
18 Committee, the American Nuclear Society Standards Committee,
19 which was involved in the preparation and approval of
20 nuclear standards.

21 Even back then, the ANS Standards Committee and
22 its drafting teams had representatives from experts across
23 the industry, but also generally included representation
24 from the Nuclear Regulatory Commission.

25 Now while the NRC's representatives did not

1 constitute, when they came in and gave input, it did not
2 constitute approval, it certainly did provide some guidance
3 early in the process, and was a tremendous help in getting
4 things done and in priorities.

5 After the Institute of Nuclear Power Operations,
6 which I can say I predate, feedback from INPO's reviews and
7 mutual assistance from the industry experts, made a
8 significant impact on moving plant performance from
9 compliance to operational excellence, through collaboration
10 and information-sharing. Continuously we saw the bar raised
11 on performance.

12 In my remarks today, I'd like to address three
13 things. Collaboration, which I think Congressman Franks
14 very appropriately said involves stress, priorities and
15 process. I continue to believe very strongly that NERC is
16 the appropriate forum to bring together a large and diverse
17 group of industry experts, experts who bring both the skills
18 and the field experience of planning, design, construction,
19 operation and maintenance, but also brings in various groups
20 of large and small customers, who ultimately, as Chairman
21 Kane said, bear the cost of the actions that we take.

22 This group solicits public policy guidance from
23 provincial, state and federal regulators, including FERC, as
24 well as a broad array of industry groups.

25 However, there are several additional aspects I

1 think would strengthen this process. Personally, I would
2 like to see a more comprehensive and consistent collection
3 of reliability data for the major elements of the bulk power
4 system. For many, many years, NERC collected data for power
5 plants using the generating availability data system or
6 GADS.

7 This data has been used extensively both by NERC
8 and throughout the industry, and in recent years, NERC has
9 initiated the transmission availability data system or TADS,
10 a complimentary effort for transmission and substation
11 equipment.

12 I also would like to see, get more involvement
13 from other areas of the industry, including equipment
14 suppliers, major engineering and construction firms. But it
15 won't be easy, because it will have to be done in a way that
16 protects the proprietary interests.

17 It's essential, though, that NERC and the
18 industry are very clear on the purpose of data collection,
19 and work with the industry to create a framework and
20 schedule. There obviously has to be timely analysis of the
21 data, with feedback to the appropriate elements of the
22 industry. I think we had a good example in the blackout
23 report of how that can be done. I believe that the
24 transmission owners forum is working to do, be instrumental
25 in that effort.

1 In terms of prioritization, as we've heard from
2 several of the other panelists, NERC has to concentrate its
3 efforts on developing results-based standards. Frankly, if
4 everything is important, nothing is important, and nothing
5 will get done. NERC's standards-development workload grows,
6 and it's increasingly dominated by reworking of existing
7 standards in response to FERC's orders.

8 Results-based standards have to be the best means
9 of assuring reliability, while permitting different regional
10 system configurations to meet different needs. As
11 Commissioner Spitzer said, you've got to place focus on what
12 must be done, rather than how.

13 I applaud NERC's efforts to adopt a risk-based
14 approach by development results-based standards, and I
15 encourage continued use of that model. Industry, including
16 FERC and provincial regulators, should support the effort by
17 providing feedback.

18 But I also think, though, that one additional
19 thing that needs to happen is that NERC is a unique
20 organization with a unique legacy. Right now, they need to
21 take another look at their process review and update it.

22 NERC is performing both regulatory functions and
23 is itself a highly regulated entity. It's entwined with
24 policy formation in the United States and Canada. It's
25 going through a remarkable period of transition and

1 scrutiny, and it's highly dependent on volunteered industry
2 expertise and resources to conduct many of its processes.

3 While the structure has changed, the organization
4 became the ERO, many of the processes within NERC are
5 basically the same, and new processes were simply appended
6 to the existing ones. It's time for NERC to take a fresh
7 look at its work products and its business processes.

8 Developing business processes that can achieve a
9 workable and sustainable balance among multiple and
10 conflicting objectives, is simply essential. It needs a
11 sustainable platform to organize, maintain and manage vast
12 quantities of data in a timely fashion, assuring that the
13 most critical receives appropriate attention, both
14 internally and externally.

15 I'll be glad to address some of the specific
16 items later in the Q and A session. Thank you.

17 COMMISSIONER LeFLEUR: Thank you so much. Mr.
18 Smith.

19 MR. SMITH: Good morning. My name is Mike Smith,
20 and I'm President and CEO of Georgia Transmission
21 Corporation, a transmission-only electric cooperative
22 serving 4.5 million people in the state of Georgia.
23 Electric cooperatives, as you know, are not-for-profit
24 member-owned independent utilities. They serve 42 million
25 people across 47 states, covering nearly three-quarters of

1 the nation's long mass.

2 As customer-owned businesses, we are committed to
3 reliable, cost-effective service for our members. Georgia
4 Transmission strongly supports the prioritization of
5 reliability initiatives, and the ensuring of proper focus
6 for our industry's scarce resources.

7 We agree with the Commission's prior observations
8 that when everything is a priority, nothing is a priority.
9 You've outlined today several key questions for discussion
10 in regard to reliability, and I would like to share our
11 perspective on them this morning.

12 First, let me start by saying Gerry Cauley and
13 NERC, in a memo to the industry on January 7th, have done an
14 excellent job of identifying eight top priority issues for
15 the next few years. Some of these are based on actual
16 system events, such as relay misoperations and human error
17 in the field.

18 Others are forward-looking, such as integrating
19 new technologies and the changing resource mix of the bulk
20 electric system. While the industry as a whole still needs
21 to weigh in, I believe the focus on these priorities and the
22 directly related standards work will have the greatest
23 positive effect on the performance of the bulk electric
24 system.

25 Another, perhaps much less direct risk to system

1 reliability, is the micro-analyzing of minuscule
2 administrative requirements during compliance audits. The
3 threat of being out of compliance often drives companies to
4 spend enormous amounts of time and resources on matters that
5 could offer little, if any, value to reliability.

6 These resources would be much better focused on
7 primary duties and keeping the system as reliable as
8 possible. To address these concerns, NERC has initiated a
9 process to move standards from prescriptive or rules-based
10 approaches to more risk-based and results-based over a
11 period of time, and we strongly support this prioritization
12 and clarity of focus.

13 First to undergo this transition has been the
14 vegetation management standard, which has been changed to
15 add information that will help end users understand the
16 objective and rationale for each requirement. Additionally,
17 the requirements have been tiered so that the higher risk
18 rankings are applied to those that have the greatest impact
19 on reliability. We applaud this effort and we believe it
20 will allow us to make more efficient and productive use of
21 our limited resources.

22 Another important area that we've touched upon,
23 FERC, NERC and the industry must agree on a reliability
24 objective, or what constitutes a reliable system. Is it no
25 outages, no cascading outages or some other measure? The

1 transmission system we believe was not intended to be 100
2 percent reliable 100 percent of the time.

3 However, some in our industry perceive this is
4 the regulatory expectation that we currently operate under.
5 We feel we need agreement and clarification. We believe the
6 performance of the bulk electric system in the United States
7 overall has been exceptional, and that the regulatory
8 landscape should reflect recognition of such performance.

9 Often, and in all candor, we feel the FERC treats
10 this industry as the gang that couldn't shoot straight at
11 times. Without defining what we're striving for, it is
12 difficult for FERC, NERC and the industry to understand each
13 other's positions and priorities. We believe by
14 establishing an overarching reliability objective, and by
15 communicating through standards requirements the results we
16 want, we can truly move reliability forward.

17 To quote General George S. Patton, as well as
18 Commissioner Spitzer, "don't tell people how to do things.
19 Tell them what to do and let them surprise you with their
20 results." We would also benefit from better communication
21 and cooperation among FERC, NERC and the industry, to ensure
22 that standards-drafting teams address the right risks and
23 appropriately address FERC's concerns.

24 Improved collaboration would minimize the need
25 for Commission directives, NERC alerts and other non-

1 standards process communications. To avoid surprise
2 communications that divert industry attention from our
3 responsibilities, alternatives to directives should be
4 explored, such as these types of technical conferences,
5 preliminary staff assessments, or issuance of advance NOPRs.

6 We are in the fourth year of mandatory standards,
7 and we believe the industry-driven standards process can
8 work and is in fact working. At the same time, there is
9 room for improvement to ensure an effective, timely and
10 reliability-focused process. NERC is working diligently to
11 identify and make adjustments to this end with regards to
12 our ERO process.

13 Industry groups, such as the North American
14 Transmission Forum, are also playing a vitally important
15 role. The Forum brings transmission entities together to
16 share lessons learned and develop and share best practices
17 in a confidential environment.

18 In October of last year, my company participated
19 in a peer review conducted by the Transmission Forum with 24
20 industry experts coming in from around the country, to
21 review our operations and compliance practices and programs.
22 This is a valuable exercise that helps us continually
23 strengthen our overall compliance program.

24 The value of the Transmission Forum is that it
25 allows companies to assess and improve their operations and

1 reliability, and be open and candid during the discussions
2 in a learning environment outside of the audit process.

3 That, of course, is what we are all trying to
4 accomplish, and we believe a similar approach would be
5 beneficial in the NERC-FERC compliance efforts. We'd like
6 to thank the Commission for holding this conference.

7 The key message I would like to leave you with
8 today is the importance of communication and cooperation
9 among FERC, NERC and the industry, in setting a reliability
10 objective, establishing priorities for standards work,
11 minimizing FERC's need to issue directives, and ensuring
12 that available resources are focused on activities that
13 tangibly improve reliability. Thank you.

14 COMMISSIONER LeFLEUR: Thank you very much. Mr.
15 Anderson.

16 MR. JOHN A. ANDERSON: Thank you very much,
17 Commissioner LeFleur, Chairman Wellinghoff and the rest of
18 the Commissioners, the FERC staff, especially Joe McClelland
19 on the reliability issue, and my colleagues here.

20 A reliable supply of electricity is essential to
21 large industrial electricity consumers, who are large end
22 users as well as on-site generators and demand response
23 providers. Thus, we have been and continue to be a strong
24 advocate for the creation and operation of an ERO that is
25 fair, balanced, open and inclusive, as required by the

1 legislation.

2 We believe that a stakeholder-driven ERO has the
3 greatest potential to develop the processes and procedures
4 to assure adequate reliability of the grid, while being
5 sensitive to the trade-offs between increased reliability
6 and consumer costs. We believe that FERC's regulations and
7 NERC's accomplishments, to a large extent, have been
8 commendable. However, all is not well in the reliability
9 space.

10 Various actions by FERC and NERC make us question
11 whether the overarching goal is maintaining reliability, or
12 being obsessed with compliance for its own sake. On a
13 positive note, the NERC Standards Committee has recognized
14 that all standards are not created equal, and has initiated
15 a process to prioritize standards.

16 This project prioritization tool hopefully
17 provides a systematic method of assigning priorities to each
18 standards project, by scoring each project across ten
19 ranking criteria. This tool has been posted for industry
20 comments. I believe the comments are due this Friday, on
21 both the proposed criteria and the specific scores assigned
22 to each standards process.

23 This tool is a significant step in the right
24 direction, in NERC's efforts to decide which projects are
25 most important to reliability, and to focus NERC and

1 industry time and resources on those projects first, even if
2 it means deferring work on other lower priority projects.
3 We strongly support this.

4 NERC also has proposed and is working hard to
5 implement a risk-based approach to reliability standards,
6 compliance and enforcement. The intent is to both reduce
7 the number of requirements by eliminating requirements that
8 are primarily administrative, and do not contribute directly
9 to reliability, as well as number two, reduce or eliminate
10 the lower level facilitating requirements that are already
11 measured through other performance-based requirements.

12 Third, the NERC Planning Committee has recently
13 issued a draft, "Risk-Based Reliability Compliance White
14 Paper" for discussion. The paper sets forth 18 specific
15 recommendations to NERC and regional entities on how to
16 incorporate a risk-based approach.

17 The fundamental purpose of this risk-based
18 reliability paper is to allow registered entities to focus
19 more on reliability and less on administrative aspects of
20 compliance, since most violations have little or no impact
21 on the bulk electric system. The process recognizes that
22 the degree of monitoring and enforcement should be
23 commensurate with the degree of impact the standards and
24 violation has on the BES.

25 Finally, as mentioned earlier, NERC's president,

1 Gerry Cauley, has issued his top priority issues for bulk
2 power system reliability, which we think is very
3 constructive. We support these efforts, and urge the
4 Commission to do so. In my judgment, these activities at
5 least begin a process for NERC and FERC to respond to
6 President Obama's executive order, improving regulation and
7 regulatory review, which is something we look forward to
8 working with you on.

9 Many ELCON members appropriately are subject to
10 at least some of the NERC standards. I also emphasize these
11 companies have every economic incentive to implement cost-
12 effective reliability operations and procedures, in a manner
13 that will minimize Reliability problems, as a stable and
14 reliable supply of electricity is critical for them to
15 manufacture their goods and services.

16 Yet on a less positive note, these companies
17 informed me that they're overwhelmed with demands for
18 documentation and other requirements, simply to show full
19 compliance with each and every requirement in the applicable
20 NERC standards.

21 Often, they find that they are assessed rather
22 substantial penalties for document-only violations, when the
23 work was actually being performed but perhaps not spelled
24 out clearly enough for a specific NERC auditor of the
25 entity's documents.

1 Obviously, serious violations should come with
2 appropriate penalties. However, all too often it seems that
3 document-only violations are treated equal to high risk
4 impact findings. Additionally, FERC issued a notice of
5 proposed rulemaking last March requiring NERC to revise its
6 definition of the bulk electric system.

7 The stated reason was to eliminate the regional
8 discretion in the current definition that allowed one region
9 to exempt from registration certain users, owners and
10 operators of the bulk system not exempt in other regions.

11 FERC's final rule gives NERC one year to develop
12 a new standard of defining the BES. FERC did state that
13 one, the new definition is not intended to significantly
14 increase the scope of the present definition, as it applies
15 to generation transmission in interconnected facilities.

16 Two, FERC does not seek to modify the definition
17 of radio transmission facilities, and three, NERC should use
18 its standards development process to develop the new
19 definition of BES. We commend you for those points.

20 NERC asked for informal comments on a preliminary
21 draft of the BES definition, and NERC staff, and I emphasize
22 this is NERC staff; this is not NERC as an organization,
23 submitted comments calling for the elimination of a
24 categorical exemption to behind the meter generation if the
25 net capacity provided to the BES does not exceed the

1 criteria for BES generation.

2 It also calls for defining BES generation to
3 include any demand response relied on to provide contingency
4 reserves to its balancing authority. At least in my mind,
5 there's a serious contradiction underlying these comments.

6 In the spirit of "let no good deed go
7 unpunished," NERC staff seems to be defining resources that
8 are good for reliability as unwarranted risks to reliability
9 that need to be controlled by heavy-handed regulation. They
10 are simply comments that will go to the drafting team, but
11 we urge you to look at it. We're afraid it will chill
12 industry participation in demand response.

13 In conclusion, we must recognize that we will
14 never have nor should we have 100 percent reliability. The
15 cost would be too great, and at the outset, I recognize and
16 understand that those folks that will be first called before
17 Congressional committees to face the gavel, naturally will
18 be more willing to require costs that they do not have to
19 pay, in exchange for procedures that they believe will lead
20 to greater reliability.

21 However, ELCON members that operate in very
22 competitive worldwide markets simply cannot pay unlimited
23 amounts for activities that provide questionable reliability
24 benefits at best.

25 I leave you with two points. One, I urge that

1 FERC require NERC to expeditiously adopt and use a project
2 prioritization tool, and develop and implement risk-based
3 approach to the standards and compliance.

4 Two, understand that overreaching will bring
5 unintended consequences. Customers may in critical times
6 find that the cost of compliance exceeds the benefits that
7 they receive. To that extent, they may have to decide to
8 restrict their generation and/or demand response, to the
9 detriment of the bulk electric system. Thank you for the
10 opportunity to be with you today.

11 COMMISSIONER LeFLEUR: Thank you very much.
12 Finally, Mr. Carter.

13 MR. CARTER: Thank you, Commissioner LeFleur and
14 Mr. Chairman and Commissioners. My name is Lonnie Carter.
15 I'm President and Chief Executive Officer of the South
16 Carolina Public Service Authority, probably better known as
17 Santee Cooper. I'm also the chairman of the American Public
18 Power Association this year. The chairmanship of APPA, of
19 course, is a rotating position.

20 Santee Cooper is also a member of the Large
21 Public Power Council, the association that represents the
22 largest state municipal-owned utilities in the country, and
23 these comments also reflect LPPC's position. So thank you
24 very much for inviting me today.

25 I echo the comments of those who have said that

1 communication and trust between NERC, FERC and the industry
2 is essential in pressing ahead towards a goal I know that we
3 all share, a reliable electric grid upon which this nation
4 can depend.

5 Nothing is more important to me in serving my
6 customers, my communities depend on it, and the livelihoods
7 of those with whom I work depend on it. It's good to know
8 that reliability is a key focus for this Commission. But I
9 want you to understand there is nothing that has a higher
10 priority for me as Santee Cooper's president than
11 reliability from our organization.

12 Perhaps more that most areas of our business,
13 reliability gives us a lot to think about. In fact, there's
14 too much on which to function effectively without setting
15 priorities. So I think the Commission is wise to focus on
16 the subject. It's no secret that the industry has been
17 nearly overwhelmed with activity related to reliability
18 standards development and compliance.

19 This is true within our organizations, where I
20 think we have done a good job, but not a perfect job. I
21 think that it is true at NERC. On a whole, as the
22 Commission concluded in its three-year assessment of NERC's
23 performance, NERC has done a good job, even a remarkable job
24 implementing the reliability framework in a very short
25 period of time.

1 But there's no doubt that there's still a lot
2 that needs to be done, and because available resources are
3 limited in NERC, and within the organizations like mine that
4 contributes to NERC's work, as industry experts and manage
5 their own compliance programs, we have to be smart about
6 setting our priorities.

7 In establishing those priorities, I'd like to
8 emphasize first that many of the most important things that
9 my organization does, and which I think FERC is right and
10 NERC is right to focus on, are not the sexiest, cutting-edge
11 activities. They are the mundane things like tree-trimming,
12 the maintenance and testing of relay protection, the control
13 systems and training for operations and field personnel.

14 If you ask me what keeps me up at night when it
15 comes to reliability risk, I'd say that it involves our
16 ability to anticipate and respond to the threats that are
17 pretty well defined, like summer and winter storms. On this
18 point, it's worth saying that a relatively small number of
19 reliability standards, perhaps 20 percent, are implicated in
20 as much as 80 percent of the reported system incidents.

21 The applicable standards in most such cases are
22 long-standing and they are generally well-understood. For
23 this reason, it's important that organizations like mine,
24 NERC and the Commission not lose sight of the basics, and
25 that they are not overwhelmed with activity that has

1 diminishing returns with respect to improving reliability.

2 A risk-based approach to enforcement and
3 standards development will help us focus on the highest risk
4 behavior, and on the activities most likely to result in
5 reliability improvements. As to enforcement, at NERC's
6 technical conference in December, many spoke to the need for
7 regional entities like NERC-FERC to focus on the attention
8 of high risk activity, and to de-emphasize the shortcomings
9 and documentation where activity is demonstrated to be in
10 compliance.

11 The flip side of this coin is the reform of
12 existing standards, in order to emphasize performance over
13 documentation. I've heard folks question how you can
14 determine whether performance is up to par without having
15 documentation. I agree that there is an important role for
16 documentation, and I certainly agree that where
17 documentation does not show compliance, there indeed may be
18 a problem.

19 But it seems to me that the lack of documentation
20 is a flag, and that more important, the question is whether
21 the practice is compliant. I think movement toward
22 performance-based standards will assist the organization,
23 like mine, to put that into practice and paper work a
24 priority.

25 I am pleased to learn that NERC's three-year

1 assessment, the Commission indicated that it's receptive to
2 this reform, and I believe it should be a high priority for
3 the NERC standard development process. NERC is currently
4 working on proposals to reform standards, in order to be
5 more performance-based, and I urge the Commission to remain
6 receptive to the proposals it will see in the coming months
7 on this subject.

8 With respect to standards development and reform,
9 I think you are aware that the NERC Standards Committee
10 circulated for comment this month the proposed methodology
11 for establishing a queue for standards development.
12 Comments have yet to be filed, and the queue established,
13 but the basic concept is a good one.

14 Standards will be ranked for consideration in the
15 standards development process according to risk-based
16 criteria. A setting of ranking criteria will be
17 established, that will include the relationship of the
18 proposed standards to practices affecting system stability,
19 uncontrolled separation and cascading outages.

20 Consistent with the statutory scope of the
21 Federal Power Act, the potential to improve reliability
22 associated with the proposed standards, I think, is a
23 concept, is a good one, and one that the Commission should
24 endorse.

25 Of course, NERC must also work to respond to

1 Commission directives and to submit to the standard
2 addressed on specific matters. This has been controversial,
3 of course. However, I think we can all agree that the
4 Commission has the authority to direct NERC to consider
5 these matters, and NERC is obligated to respond.

6 Here, I would urge you to exercise your
7 discretion to act judiciously in issuing such directives,
8 both with respect to the frequency of such actions and
9 specifically with specificity to which the directives should
10 be issued.

11 The Commission's September 16th, 2010 order in
12 this matter suggested some sensitivity to this point of view
13 on the Commission's part, and NERC recently made a
14 compliance filing in this area that enjoys the support of
15 nearly all of the major trade associations, including APPA,
16 LPPC, TAPS, EEI, EPSA and ELCON.

17 This compliance filing reasonably addresses the
18 Commission's concerns that NERC's ballot body may thwart a
19 Commission directive, while it also preserves the
20 stakeholder-based process that serves as a core principle to
21 the ERO model. I'd like to say that I think it would be a
22 mistake to think that standards and activities addressed to
23 the cyber security should be treated entirely differently.

24 It's true that the nature of reliability is new
25 and evolving, but it's also true that the industry is hard

1 at work on these matters. Through pending revisions to SIP-
2 002, the industry is coming to grips with more prescriptive
3 means of identifying critical assets, and I think that the
4 SIP standards are generally on target.

5 But in targeting currently known vulnerabilities.
6 Certainly, that's evolving, and I do not rule out the
7 possibility that there will be an immediate threat requiring
8 responses to which the standards development process is not
9 well-suited. But I think that the actions taken outside of
10 the standards development process should be seen as an
11 occasional necessity and not a matter of routine.

12 Finally, I want to publicly express my
13 appreciation to Gerry Cauley for his work in all of these
14 areas. I know that Gerry has the industry support, and I
15 also know that he can speak quite frankly when he believes
16 that there are challenges to which we need to step up to. I
17 thank you and look forward to your questions.

18 COMMISSIONER LeFLEUR: Well, thank you Mr. Carter
19 and thank all of you. I usually say I don't speak for my
20 colleagues, but I'm sure I speak for my colleagues when I
21 say you gave us a lot to think about, and that we'll
22 probably have an interesting conversation from here. That
23 was terrific.

24 We only have a few minutes to lunch, but we have
25 so much to talk about that I think we might as well start

1 with some questions, and so I will call on the Chairman.

2 CHAIRMAN WELLINGHOFF: Thank you, Cheryl. I
3 appreciate it. The first question for each one of the
4 panelists, and I'll start with Mr. Carter, I guess, and go
5 around. From a substantive standpoint, just list for me,
6 from your experience with the industry, what you would
7 consider to be the top two priorities for NERC in
8 maintaining reliability of the bulk power system.

9 If someone asked you what are the two top things
10 they should focus on, what would those be?

11 MR. CARTER: The first, Mr. Chairman, that I
12 would suggest we focus is to make sure that we communicate
13 clearly, because ultimately whatever the Commission orders,
14 whatever NERC standards are developed, they have to be
15 understood in the field.

16 The second, I would say, is not to lose sight of
17 making sure that we focus on the basics, that we do look at
18 what's often referred to as a "defense indepth." Make sure
19 that we don't overlook what's the obvious in front of us,
20 while we're chasing paper work, which I think is one of the
21 things we've sort of fallen into.

22 MR. JOHN A. ANDERSON: Mr. Chairman, that's an
23 excellent question, and I don't want to try to guess what's
24 going to come out of the prioritization tool from the
25 Standards Committee. I would really rather -- they're doing

1 an excellent job, I believe, in trying to prioritize and
2 focus on that sort of thing.

3 Comments, my understanding is comments are due
4 later this week, and hopefully it will be before the board
5 even next week, if the comments come in in a good way. So
6 I'd like for us to focus on that prioritization tool, which
7 is exactly the thing that you're doing, and not try to
8 anticipate it. I just don't want to try to jump ahead of
9 it. Thank you, though, for the opportunity.

10 CHAIRMAN WELLINGHOFF: Sure.

11 MR. SMITH: I think I would group my two
12 priorities and say the first thing that we need to focus on,
13 from a reliability perspective and Lonnie alluded to this,
14 is blocking and tackling. It's the basics of what we do out
15 there everyday. I believe you described it as it's not the
16 sexiest thing, but our operations of our relays, our
17 protection and our control, our right-of-way maintenance,
18 keeping trained operators out in the field, dealing with all
19 the day-to-day basics of the business.

20 As was alluded, that is where we continue to see
21 outages, and it's unacceptable to those of us in industry,
22 that we continue to see that, and that needs to be a focus
23 for us. So focusing in on the blocking and tackling.

24 Then secondly, dealing with emerging issues and
25 emerging trends. We're not in a static world. We're not in

1 a static environment, and we as an industry need to
2 appreciate that technologies are going to evolve. This
3 generation mix that we have, a change is being thrust on us,
4 whether or not we want it or want to go that fast in that
5 direction, and those kind of things are going to bring new
6 challenges for us.

7 Clearly, some of the things that the Congressman
8 talked about are not things that we have seen in the last 50
9 years, and they're not things that we are the most
10 intelligent folks in the room on. That's where we really
11 need this improved coordination and communication between
12 all of us. So it's the blocking and tackling and then the
13 emerging issues.

14 CHAIRMAN WELLINGHOFF: Thank you, Mike. Roberta?

15 MS. BROWN: I'd like to take a step back and look
16 at this a little differently, and tell you the three things
17 that keep me up at night, and they really demonstrate, in my
18 opinion, the need for industry, NERC, federal, state and
19 provincial regulators to work together, because they have
20 different objectives.

21 The first one that worries me is aging fossil
22 fuel resources. Across the country, we're seeing reduced
23 energy use and energy production from resources that have
24 been around for a long time. To give you a specific example
25 in New England, oil-fired resources make up about 25 percent

1 of New England's capacity, and in 2009 they provided one
2 percent of the energy.

3 This is not a scenario that encourages investment
4 or maintenance, but we need these things. When we do get
5 them, we have a cost impact. That really leads me to my
6 second item, the need for flexible resources. The
7 generating resources, and frankly even some of the
8 transmission and substation resources we have, were built in
9 a different era.

10 Today, with the changing mix, we need resources
11 that can respond and respond quickly. If you don't have
12 them, maybe you can keep the lights on, but there is a huge
13 cost impact, a huge cost impact. Clearly, as we move
14 towards wind integration studies, they've shown how we have
15 to have fast ramping and dispatch flexibility to balance
16 variability. We've seen what happens when you don't. But I
17 would ask you to look not only at reliability but at cost.

18 The third frankly is the integration of demand
19 resources. It's a very, very important part of our system.
20 It's increasingly important. It does impact both
21 reliability and cost. But one of the issues that we have is
22 that sometimes our rules were written in the era that you
23 could only call on DR in emergency situations, but we need
24 it to be like a generator.

25 We need it to offer a price in the market, and we

1 need it to respond accordingly. So we need a way to let
2 operators have greater access to what's a critical resource,
3 when it makes sense to do so from both an economic and an
4 operational perspective. So my apologies for answering a
5 little differently.

6 CHAIRMAN WELLINGHOFF: Oh, that was very good.
7 Thank you, Roberta, I appreciate it. Kevin.

8 MR. BURKE: You know, I want to answer your
9 question directly, but I'd like to divide it into some
10 traditional and forward-looking. Traditional, I think you
11 know, one of the key issues that NERC has been focusing on,
12 the industry has been focusing on a long time are the relay
13 protection systems, you know, looking at the design,
14 engineering, installation, making sure those are right,
15 because those can lead to problems on the bulk power system.

16 I think when we look forward, I think of the
17 cyber security issues, and I think, you know, there
18 government can play a key role, because I believe that there
19 are agencies and government, that I don't think it's the
20 people in this room.

21 I think it's people in other rooms and in defense
22 national intelligence that sort of know what our
23 capabilities are, and probably estimate what the other
24 entities' capabilities are, and could give us, I think, a
25 little bit more guidance than we've been getting.

1 So if I was looking for something, you know, from
2 government, it would be more guidance, perhaps maybe less
3 standards, because this is an evolving area. You know, we
4 know how to protect the system from, you know, we've had
5 lots of experience with hurricanes and thunderstorms and
6 things like this.

7 This is a new area that I think is going to
8 evolve quickly, and I think trying to get more guidance from
9 some of the right people in government, who normally don't
10 like to share their information, for good reasons.

11 CHAIRMAN WELLINGHOFF: Thank you. Chairman Kane?

12 MS. KANE: Yes. I think from the state's point
13 of view, I repeat that it's reliability of cost, and being
14 aware of the impact on the end users as the reliability
15 standards, particularly are prioritized.

16 The second is, if I might echo Mr. Burke, is kind
17 of being aware of what's coming down the road. I've spent a
18 lot of time with representatives from the 39 states,
19 spending a lot of time on the last six months on the Eastern
20 Interconnect State Planning Council. This is a project
21 that's been going on for several years funded by the
22 Department of Energy.

23 As we look at what is coming down the road in
24 terms of renewables, in terms of the demand response, in
25 terms of energy efficiency and the new kind of planning that

1 needs to be done under various scenarios for transmission,
2 there are different kinds of reliability concerns and needs
3 that are going to be coming.

4 I think to be very aware of all those scenarios
5 and that work that's going on, before things are imposed
6 that may be for yesterday's problems and yesterday's needs.

7 CHAIRMAN WELLINGHOFF: Gerry?

8 MR. CAULEY: Thank you, Mr. Chairman. Sometimes
9 the simplest questions are the hardest to answer. So I'll
10 answer it two ways. In terms of the engineering priorities,
11 I did outline, as a couple of people mentioned, the eight
12 priorities in a paper that I recently issued.

13 But the two that really bother me of the
14 technical priorities are the relay operations and
15 maintenance, to make sure that they're operating correctly.
16 They're in every event that we see, and I think the second,
17 then, I would say is the concept of common mode failures.

18 It pervades a lot of things we do in vegetation.
19 In August 2003, why multiple trees went out by vegetation,
20 as opposed to just one random event. We looked at 50 plus
21 generators last week that wouldn't start because of cold
22 weather. So there are systematic common failures that we'd
23 like to be able to resolve.

24 I'd like to answer your question with two
25 suggestions from a more systematic approach. One of the

1 struggles we have is understanding where we are in the
2 process of developing a reliability regulatory framework
3 here, and I think the danger of this process or any
4 discussion of priorities is what are the instant priorities
5 right now? What's the most important thing?

6 If you look at the experience in the nuclear
7 arena and other areas, it took ten years, in some cases 15
8 years to get to the right spot in terms of priorities, and I
9 think we have to look at as a time over sequence over time.
10 What do we need to do today? We need to get certain
11 standards in place. We need to make sure that we focus our
12 compliance program on the key priorities.

13 It may not be the long-term answer, but I think
14 we need a time-sensitive road map to address the sequence of
15 building, I think over three, five, ten years, where do we
16 want to be, and build that sort of a time frame.

17 My other systematic priority is in standards and
18 the process, and making sure that we do everything we can to
19 evaluate options for improving that, the timeliness, focus
20 and making sure that we're able to produce really good
21 standards.

22 CHAIRMAN WELLINGHOFF: Thank you, Gerry. John?

23 MR. JOHN Q. ANDERSON: Well, I'll answer this
24 from a kind of policy level, NERC board level, what we do to
25 help Gerry as we kind of give him a policy framework and so

1 forth.

2 I think the top two priorities I would see that
3 really could have an impact on reliability fairly quickly,
4 one is choose where to spend all of our time and resources,
5 the precious resources we've got, NERC, industry, as well as
6 FERC I think, choose where to spend those resources based on
7 the risks that we see, ad not get caught up in the flavor of
8 the day, not get caught up in the sequence of things we've
9 been doing for a few years and we just can't let them go.

10 But it's kind of what are we not going to do, and
11 focus on those that have the highest risk. We're getting
12 better and better at that. Gerry's got a whole new
13 framework. So I think from a board level, we're very much
14 seeing that as maybe the top priority that we can focus on.

15 The second would be a faster and clearer flow of
16 communication among all the participants that have to get
17 something done, to increase reliability. That means between
18 FERC and NERC or FERC and the industry, between the NERC
19 constituents, between the standards development teams and
20 constituents around those.

21 There's all kinds of communications that have to
22 take place, and they can result in, as you know, months and
23 even years to get something done. So I would put that as my
24 second. So if we could have, you know, choose where to
25 spend all the resources based on the risks that we see, and

1 if we could have faster, clearer communication more quickly,
2 those two would be my priorities.

3 CHAIRMAN WELLINGHOFF: Thank you, John. We're
4 ready for lunch now.

5 COMMISSIONER LeFLEUR: Well, we will break for
6 lunch. I want to give you time so everyone doesn't have to
7 go to the Sunrise Caf to be able, to disperse among the
8 block or two, since there's a lot of folks here. We'll
9 resume at 12:30. Thank you.

10 (Whereupon, at 11:46 a.m., a luncheon recess was
11 taken.)

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1 I think, myself, and I think speaking on behalf
2 of the Board, we have a tremendous amount of respect and
3 understanding of the value of the stakeholder process and
4 the ANSI accreditation and the industry development of
5 standards.

6 What I think has happened is a vision of how that
7 could happen has been implemented, and it relies heavily on
8 a Standards Committee to sort of structure the process and
9 manage it. Also it depends on drafting teams that are
10 formulated from a diverse range of stakeholders.

11 And I think what's apparent to me is that the
12 work process and the structure of how we go about it could
13 be improved substantially. It is not how you--if urgency,
14 if something really important needed to be done, it is not
15 how you would structure the workflow to get it done.

16 So while we think that preserving the ANSI
17 accreditation and the balloting and the stakeholder
18 representation and the final ballots are important, I think
19 we could move the process along more quickly by signing a
20 particular expert team of the best experts say on relay
21 protection, have some attorneys on the team, some compliance
22 people who have been in the field and experienced how the
23 measurements are done in the field, and done some audits,
24 and have sort of a rapid development of the draft I would
25 say to the 90s percent level, then enter it into the

1 commenting and vetting process and the balloting. And I
2 think that is consistent with the constitutional aspects of
3 the process that we have.

4 Because even from day one--I was involved in the
5 standards in my prior stint at NERC--we knew early on that
6 if somebody walked in the door with the best standard in the
7 world already done, that we could enter that into the
8 process and complete the vetting and voting and approval.

9 So I think we are just trying to rethink the work
10 flow, and how it is managed from sort of a cultural
11 perspective and a management process, and I think we can--my
12 plan, we're going to talk about this at the board next week,
13 and also vet it with the stakeholders--but my plan would be
14 to choose one of our highest priority standards and
15 demonstrate it immediately.

16 And to me, the drafting that I'm talking about is
17 probably in the month to two-month time frame to produce the
18 standard. And then we can do the balloting, and voting, and
19 making sure everybody's concerns are addressed. But I think
20 one quickly, you know, by the spring is possible.

21 CHAIRMAN WELLINGHOFF: Very good. Thank you.

22 And the final question really I have, Kevin,
23 actually goes to one of your comments--and Roberta, you
24 might want to comment as well since you mentioned your
25 experience in the nuclear industry--but I was intrigued by

1 your--your comment, Kevin, about some of the things that
2 NERC is not going to do, or should at least not do, or think
3 about stopping doing.

4 I know one area that you've been involved in, and
5 we had some conversations on, was the North American
6 Transmission Forum. Would you talk about that a little bit,
7 and how you envision what things it could do that maybe NERC
8 shouldn't do, or would stop doing if that came about to
9 fruition?

10 MR. BURKE: I think the North American
11 Transmission Forum has been evolving, and I think it is
12 really on a road to making some significant contributions to
13 improving reliability in the industry.

14 Right now, the vast majority of the transmission
15 owners in the country, who represent the miles of
16 transmission, are members of the Transmission Forum. And
17 the focus of the Transmission Forum is going to be on
18 improving operations.

19 So the idea is that NERC would continue to do
20 standards development, compliance audits, and enforcement;
21 but the Transmission Forum would focus more on what are best
22 practices; what are the peer reviews. And, you know, I
23 think Mike mentioned that before. What are some of the
24 lessons learned? Maybe some of the metrics development.

25 If you can get an extensive peer review process

1 going on, and the Transmission Forum has been increasing the
2 last two years and plans to increase this year, and even
3 into the future, the number of peer reviews it can get done
4 each year, I think that will make significant contributions.
5 And it will be an organization that people will get
6 together, quickly talk about, you know, issues.

7 There was an Alert that NERC put out a couple of
8 months ago. Within days, people were on a conference call
9 talking about what they do. People were talking about how
10 they used some of the systems and technologies that are
11 available. I've already heard that some utilities have
12 changed what they do, based upon what they heard on those
13 calls, to improve reliability.

14 I think some of these things you can get done
15 quickly, but it is not to replace NERC. So it wouldn't be
16 writing standards. But it would be coming out with some
17 best practices, and discussing best practices and promoting
18 that in the industry. And I think there is a place for
19 both, and I think clearly--and I spent a couple of years
20 working at a nuclear plant that Con Edison used to own, and
21 I think INPO was a major contributor to the improvement in
22 the nuclear industry. And the operators understood that.

23 CHAIRMAN WELLINGHOFF: Roberta, do you have any
24 comments on that?

25 MS. BROWN: Thank you, Chairman Wellinghoff. I

1 would really like to reinforce what Mr. Burke just said. We
2 need to be very intentional in our language and
3 differentiate between a "standard," which in my opinion is a
4 minimum level of acceptable performance, and "operational
5 excellence."

6 They are two different things. Chairman Kane
7 referred to that earlier. A standard should reflect what
8 everyone supports and is willing to pay for. Beyond that,
9 "operational excellence," while it contributes to
10 reliability and encourages it, is that additional work that
11 you are going to see in some areas. Over time we may find
12 that we raise the standard for what acceptable performance
13 is as we can do so.

14 But it is very, very important here. You heard
15 it from a number of the speakers that we addressed, that we
16 look at cost and benefits and what people are willing to pay
17 for.

18 CHAIRMAN WELLINGHOFF: Thank you.

19 Thank you, Commissioner LaFleur, that's all I
20 have.

21 COMMISSIONER LaFLEUR: I guess we will proceed to
22 Commissioner Moeller.

23 COMMISSIONER MOELLER: Thank you, Commissioner
24 LaFleur. I want to associate my support, as well as the
25 Chairman mentioned, for the Forum. It sounds like things

1 have been trending in a really nice direction lately. And
2 who knew we would be spending so much time talking about
3 INPO here, but it has led to I think a good trend in terms
4 of perhaps a model that can somewhat replicate it without
5 being identical.

6 A couple of individual questions, and then a
7 general question for anyone who wants to answer it:

8 John A. Anderson, John, I just want to make sure
9 I didn't hear you incorrectly, because it sounded as if you
10 may have said ELCON members have been very supportive of a
11 more expanded demand response compensation system and now
12 don't want to be, kind of the flip side, have the
13 responsibility of being registered as part of the
14 reliability component of the system.

15 And I think you threw out a concern, but I want
16 to make sure you had a chance to address that.

17 MR. JOHN A. ANDERSON: Thank you, Commissioner
18 Moeller, for that opportunity. Yes, we are very, very
19 strong supporters of demand response. Many of my members
20 have been providing it for a considerable length of time,
21 years ago as interruptible customers who are now, like in
22 ERCOT, just last week when the freeze came, the load acting
23 as a resource was triggered and really needed help keeping
24 the system up.

25 We're believers in it. We think it makes sense.

1 We think it ought to get paid just like generators, no less
2 no more. At the same time, what I was trying to say was:
3 If you sweep demand responders in, individual companies like
4 that in, and say now you have to comply with a set of
5 standards, you have to go through audits, you have to go
6 through all of that, that is a cost element that they're
7 going to have to balance with the benefits that they get
8 back.

9 And I'm just simply saying we need to look at
10 that very, very carefully and make sure that we don't harm
11 demand response in a way that is not really improving
12 reliability.

13 We are beginning to wonder, is load there to
14 serve the reliability function? Or is the Bulk Electric
15 System there to serve the load?

16 But I appreciate your question, and I hope that
17 that clarified it.

18 COMMISSIONER MOELLER: It does. Thank you.

19 MR. JOHN A. ANDERSON: Thank you.

20 COMMISSIONER MOELLER: It sounds like it's
21 something we can deal with, but we have to be cognizant of
22 the tradeoffs.

23 Chairman Kane, thank you for being here. I think
24 the D.C. Public Service Commission is an outstanding NARUC
25 member, set of members. You have a very talented set of

1 colleagues. I appreciate your willingness to take on a lot
2 of issues such as Dynamic Rates that some other places don't
3 have the courage that you have. So keep up the good work.

4 I will note that my PEPCO bill, though, typically
5 less than 3 percent of it is for transmission. And you
6 articulated your concerns of costs and how those get borne
7 by ratepayers, but when I compare it to my co-op bill from
8 the State of Washington where it's closer to 15 percent for
9 transmission, it seems to me that I just will at least note
10 that I would be happy to pay more for transmission if it
11 lowered my commodity prices. And actually that's the first
12 time I've been able to express that.

13 (Laughter.)

14 COMMISSIONER MOELLER: A general question for all
15 of you who wish to answer it.

16 Gerry, John, I think this is great. This is what
17 you've been referring to, the Standards Committee process.
18 John A. Anderson said comments are due on Friday. I presume
19 maybe you can have a presentation to the board.

20 I'm kind of curious about the review process,
21 though. That's the last ID, prioritization, but monitoring.
22 We've had such a scramble over the last few years with
23 coming up to speed with what we have now, going from a
24 voluntary to a mandatory system, all the standards,
25 compliance, figuring out transparency of enforcement, but at

1 some point it's government's job, or in this case government
2 with NERC, to review what--and Kevin kind of alluded to
3 it--what doesn't work anymore? Or what needs to be changed?

4 I think you've got a reference in here to kind of
5 a five-year review process. Is that the right amount of
6 time? Is that something you're going to plan to undertake?
7 And if it's not the right amount of time, what is?

8 I will open that to anyone on the panel who wants
9 to address it.

10 MR. CAULEY: Thank you, Commissioner Moeller.

11 First of all, there are some requirements for
12 review of the process. We had a three-year initial review
13 of the NERC process as we started up, and now we are into a
14 five-year cycle. But I think as my comment this morning,
15 hearing all the comments today, it's sort of come to me that
16 we need to do this prioritization of what we will do and
17 what we won't do by looking out further than the hood
18 ornament on the front of the ERO car or bus.

19 We need to start thinking about where do we want
20 to take this in the long term? So I think it may mean in
21 the near term that there are some things that we are doing
22 that perhaps are not as important, given the large number of
23 really important standards and initiatives that need to be
24 completed. And maybe I can count them on my hands how many
25 are really that important that we should focus on early on,

1 but not lose sight of some of these enhancements we will
2 need down the road.

3 So I think it's not just holding up some of the
4 projects, but also in the emphasis of our compliance program
5 making sure that the things we focus on today are the most
6 immediate risks, but understanding progressively will
7 improve over time.

8 So if we have this longer term roadmap beyond the
9 hood ornament of the ERO, and figure out where do we expect
10 to be in three years, where do we expect to be in five
11 years, and I think even where do we want to be in ten years,
12 then I think we can set some milestones and measure
13 ourselves to those.

14 In a lot of cases what we're doing now is sort of
15 in a reactive mode. We're trying to catch up with
16 directives. We're trying to catch up with what we said we
17 would do in the three-year assessment. And it's sort of
18 like we're looking at the hood ornament and we're looking
19 behind us, but I'm not sure we're looking down the road.
20 And that would be my suggestion, that we work on that.

21 COMMISSIONER MOELLER: Well will this play into
22 that, then? Assuming it's adopted, somewhat close to what
23 is proposed?

24 MR. CAULEY: Yes. That's a part of the plan.

25 COMMISSIONER MOELLER: Okay. Any other comments

1 on the appropriate time to be looking back at standards to
2 find out whether they were effective and whether they need
3 changes or not?

4 MR. SMITH: I would just add, from my
5 perspective, I look at this as a continual improvement
6 exercise. That we do not go from one static system to
7 another static system and hold it in place for three to five
8 years. As we develop this risk-based, performance-based
9 modeling effort to put standards through the test and
10 identify priorities, from our perspective you learn
11 something about the way you have set up that analysis with
12 every new standard that you put through it.

13 You are not stuck with a static spreadsheet that
14 you have to force-fit every standard through. Hopefully you
15 will learn as every standard goes through it how to modify
16 and improve that analysis that you're doing.

17 So I guess I don't look at some three-year
18 period, or some five-year period where we're going to put a
19 new process in place and freeze it. I would look for us to
20 continually improve that as each new standard does through
21 the development process.

22 COMMISSIONER MOELLER: Betty?

23 DCPSC CHAIRMAN KANE: I would note that we put
24 standards in place five years ago, our performance
25 standards, and we're reviewing them now.

1 On the other hand, the ICEPICK planning process
2 is going out to 2030 and looking at what the transmission
3 system is going to look like under various scenarios then.
4 So there's a review, maybe five, six years makes sense. But
5 also looking forward where there will be all different
6 standards that haven't been thought up yet with the new
7 system.

8 COMMISSIONER MOELLER: Good. Well going back to
9 Gerry's comments, I have tried to be a proponent of the
10 industry, where do we want to go 5, 10 years from now,
11 because we can't do it all now. But when it comes to
12 reviewing an actual standard, we've got so many of them,
13 just reviewing them would take an enormous amount of time.
14 But yet it is still necessary work.

15 John A. Anderson?

16 MR. JOHN A. ANDERSON: Yes. As far as this tool
17 that the Standards Committee is working on now, as a long-
18 standing member of the Standards Committee, I can say that,
19 one, I am impressed with the devotion that they have put
20 into bringing this.

21 I am really glad that you are looking at it as
22 carefully as you are, and I hope the rest of the
23 Commissioners will. I think it is a great tool. But I
24 don't believe that there's anybody on the Standards
25 Committee that thinks that something is going to go into

1 place and be locked in for five years.

2 I mean, that is going to be a living document and
3 we will learn as we go. We know we have a lot to learn.

4 COMMISSIONER MOELLER: Yes. I meant a specific
5 standard. You know, at some point, you know, every specific
6 standard should be reviewed to see whether it was effective
7 or not, whether it should stay on the books, whether it
8 should be modified. But we have so many of them it will
9 take an effort, a major effort to do it.

10 Roberta? Or Kevin?

11 MR. BURKE: I would just say that frequently if
12 you have a standard or a procedure in an organization, it
13 will get reviewed as issues come up. But I think what is
14 important to do is, if it hasn't been reviewed in awhile, go
15 back and take a look at it. See how it's working.

16 And I think either 3 or 5 years would be fine.
17 And I think I would leave that to NERC's discretion to
18 decide what's the appropriate period of time. But I would
19 say, as I mentioned before, it is also important to say:
20 Should we tinker with it? Or should we just get rid of it?

21 COMMISSIONER MOELLER: Roberta?

22 MS. BROWN: When you go about writing standards,
23 there are three words you learn immediately: "Should,"
24 "shall," and "may."

25 The word "shall" means a requirement. The word

1 "should" means you ought to, or a recommendation. And the
2 word "may" means you can if you want to, it doesn't matter.
3 And you find that over time the "shoulds" tend to become
4 "shalls" or in particular jurisdictions, depending on local
5 choice of a state or province or other areas, you find that
6 they may choose to make "shoulds" "shalls".

7 So I think that as you discuss this, it is
8 important to realize that (a) there will be variation; and
9 (b) there will be feedback based on the individual area, and
10 the individual location and what they want.

11 COMMISSIONER MOELLER: Lonnie?

12 MR. CARTER: Thank you, Commissioner Moeller. I
13 may be the last to weigh in on this, but I want to bring a
14 little bit of what I would consider to be a practical
15 perspective to this. I think you are absolutely right and
16 on to something about how many there are, and if we had to
17 review them on some periodic schedule just how much time
18 that would take.

19 And I think that emphasizes while, what has been
20 said here several times is important, let's develop this
21 risk-based approach so that we make sure that we are looking
22 at most frequently the 20 percent of those that are likely
23 to cause 80 percent of the problems, and that we do
24 that--and the practical part I want to add to this is what
25 it would do at least in my organization.

1 It would let me take my best and brightest folks
2 and turn their attention to looking forward, and looking at
3 what I would say is over-the-horizon some of these threats
4 that we have talked about today; and not tie them down so
5 much to making sure that they are dealing with compliance
6 and going back through the routine of reviewing standards.

7 So there's always a tradeoff in this, but I think
8 where we may hurt ourself if we don't take a look at this
9 prioritization issue, we're going to not have our best minds
10 working on the real problems that we need to solve and make
11 sure that they do get developed into some sort of standard.

12 COMMISSIONER MOELLER: All right. All good
13 thoughts. Thank you.

14 COMMISSIONER LaFLEUR: Mr. Spitzer.

15 COMMISSIONER SPITZER: Thank you, Commissioner.
16 Well most of the good questions have been taken,
17 but--

18 (Laughter.)

19 COMMISSIONER SPITZER: --there are still some out
20 there.

21 COMMISSIONER LaFLEUR: Welcome to my world.

22 (Laughter.)

23 COMMISSIONER SPITZER: I know, I feel your pain.
24 And I know John A. Anderson wanted to hold his fire for the
25 comments, but, you know, for a document that is concise and

1 to the point and lets you know what is critical and what is
2 chasing squirrels, I found this [indicating a document] very
3 interesting.

4 I just wanted to talk to maybe Chairman Kane and
5 some of the utility folks. Is there something that should
6 be added? I won't say a "glaring omission," but is there an
7 addition, a concept or principle maybe not ripe for a
8 standard that we should be attentive to? Bearing in mind,
9 you can still file what you want.

10 (Laughter.)

11 MR. CAULEY: I think I would point out to the
12 panelists, Commissioner, that that is the eight priorities I
13 think, the memo that you have?

14 COMMISSIONER SPITZER: Yes, yes.

15 MR. CAULEY: The eight priorities that I had
16 issued earlier in January.

17 COMMISSIONER SPITZER: Yes, I'm sorry.

18 MR. BURKE: I'll just state, my recollection of
19 the eight priorities, I think they were key priorities.
20 Like I said before, I think when you have a priority list
21 it's useful at the same time to say, and here's what we're
22 not focusing on. Because people will keep bringing up the
23 same issues and they'll keep revisiting it.

24 And if we don't focus on what we're not going to
25 do, we just keep tending to add more cost to the system

1 without necessarily significantly increasing the
2 reliability. Because you do want your best and your
3 brightest people focusing on those issues that are going to
4 make a big difference to reliability.

5 And in response to Chairman Wellinghoff's
6 question before, I tried to identify what I thought were two
7 key areas that we needed to focus on.

8 COMMISSIONER SPITZER: And, Kevin, as a corollary
9 to that, I want you to feel free to add something you feel--
10 you know, John, you mentioned the DR. Is there--and I think
11 you alluded to this--there are some issues that need to go
12 bye-bye.

13 MR. BURKE: Right.

14 COMMISSIONER SPITZER: And not simply limited to
15 a reliability standard that you may either feel needs to be
16 de-emphasized or eliminated, is there an issue that you
17 think at this point has been resolved that we can move on
18 and would be in the chasing-squirrels concept?

19 MR. BURKE: I think if there's any issue that
20 comes to mind, I think it's the issue that was brought up by
21 a couple of the panelists on the paperwork that is required
22 in some of the audits. I think it is important to have
23 documentation of compliance, but in some cases that issue
24 has risen to the point where it's I think driving some of
25 the audits and driving some of the responses in the

1 preparation for the audits, as opposed to what we're trying
2 to do with the Transmission Forum of getting operators
3 together and talking about what are really the best
4 practices.

5 And I think if we had a better, you know, risk-
6 based approach, and performance approach, I think some of
7 the NERC reviews would be more effective in terms of
8 enhancing reliability.

9 I think after that, some of the things that I
10 think maybe NERC might have gotten into in the past in some
11 cases like, you know, the Avian Flu alert. We all have
12 business continuity plans. That shouldn't be something that
13 I think NERC should be focusing on. Let's put that one
14 aside.

15 COMMISSIONER SPITZER: Okay.

16 MR. BURKE: And I think what they have to think
17 about is, what is really critical to the Bulk-Power System?
18 And focus on those issues.

19 COMMISSIONER SPITZER: And bearing in mind that
20 those additional matters detract time and attention from--

21 MR. BURKE: Because we all have a certain amount
22 of, you know, key people who can really focus on these
23 issues and make a significant improvement. And if you put
24 too many things on the plate, they're going to be spread
25 thin and they won't get to the really important issues.

1 MR. SMITH: I think if everybody aligned behind
2 this list, we would be successful at all levels of this
3 process, this ERO process. From our perspective, when we
4 look at what needs to go by the wayside, immediately our
5 attention turns to the administrative minutia that is
6 examined during audits.

7 For example, you know, obviously one of the key
8 issues here is human errors by field personnel. And you
9 look for people to have good, solid training and development
10 programs, how to be certified engineers, things like that.
11 That is all relevant and meaningful to this risk. But
12 whether or not your ABC training manual has a cover page
13 that says "ABC Training Manual," and if it doesn't you're
14 written up for that even though it is an ABC Training
15 Manual, that is where you're getting into things that border
16 on ridiculous.

17 And those are the kinds of things where you say:
18 I've got the training materials here. It does what we're
19 trying to do here to prevent a risk. Why am I getting
20 written up because the cover page was not appropriately
21 formatted? These are real examples. And I'm sure everybody
22 who has been through an audit has their own administrative
23 stories of where they thought that they were being written
24 up for something that really didn't have anything to do with
25 keeping a reliable system.

1 And I think that's what the Transmission Forum
2 does through these peer reviews. They don't come in and do
3 a big paper chase. They come in and talk to you about
4 these, especially the first four areas. They have program
5 experts that come in to you and talk to you about not what
6 are you doing to comply with standards, but as was earlier
7 mentioned what are you doing to take this to a best-practice
8 level?

9 And those are true learning exercises, and you
10 feel some level of satisfaction in going through that, that
11 you are stronger as an organization because of what you
12 learned in that exercise. And that is why I may sound like
13 a commercial for the Transmission Forum, but I really, after
14 being a part of it and being peer reviewed through that, I
15 can't endorse that strongly enough to others who may not be
16 members that it is a way to take your organization forward
17 with regards to these items.

18 I did not feel that way after the NERC audit.
19 Even though we successfully completed the NERC audit and
20 were proud of that, we still felt like there was a bunch of
21 paper chase there that you really just want to see drop by
22 the wayside.

23 So from my perspective, when we say what things
24 should we be focusing in on, you know, if it's
25 administrative and it's deemed important, let's go to that

1 traffic ticket and get past it kind of thing. But we're
2 still not where we need to be with regards to that.

3 COMMISSIONER SPITZER: A few reactions, and then
4 I want to take further comment. One is, with regard to the
5 INPO model, in my state role I became acutely aware that at
6 the CEO level, Bill Post was very involved in INPO. And you
7 saw the corporate culture when the CEO was involved, and
8 that's an analogy. You're going to have to get CEO level
9 participation to filter down I think to make it the same
10 success as INPO.

11 Secondly, you talked about the cover page on the
12 manual. That to me is one of those issues that Commissioner
13 Moeller was alluding to, that the forward looking--the first
14 iteration of this requirement to get people's focus on it,
15 you may want the cover page to highlight the significance of
16 the issue. But there's a point at which it goes away.

17 MR. SMITH: And I'm saying those are the kinds of
18 things that need to drop.

19 COMMISSIONER SPITZER: You have to be flexible,
20 and to have issues go away I guess is a good thing.

21 The final point is--and I hear the frustration
22 about the paperwork. I had a prior career. You probably
23 heard back in July when we talked about the paperwork issue,
24 it became quite irritating to deal with tax workpapers, and
25 tax workpapers being the be-all and end-all, when that was

1 not really what the IRS was auditing or the taxpayer was
2 proving to determine the return. It became a source of
3 irritation and a lot of time and money frankly was wasted
4 chasing squirrels.

5 On the other hand, the taxpayers that I've
6 represented over the years that had bad workpapers tended to
7 have issues in their return. It was not a coincidence.

8 MR. SMITH: And I guess I'm not saying
9 documentation is a bad thing. You have to have your
10 programs documented. You have to be able to survive the
11 human element of this where you're going to have people
12 retiring and new people coming in and there needs to be
13 compliance programs, and documented processes and
14 procedures.

15 I'm saying there's a difference between
16 documentation and what we call "administrative minutiae."
17 There is a difference there. And I'm not standing here
18 saying we shouldn't have to write any of this down. If we
19 do it, we do it; and if we don't, we don't. I'm just
20 saying, when you're looking for documentation, I think
21 there's a line that is often crossed into what frustrates
22 the auditee.

23 COMMISSIONER SPITZER: Now, John A. Anderson, you
24 must have a lot of rules, regulations, and standards that
25 you'd like to dispense with?

1 (Laughter.)

2 COMMISSIONER SPITZER: You just named me three.

3 MR. JOHN A. ANDERSON: Yes, sir, Commissioner, I
4 certainly would.

5 I would like to back up a little bit and first of
6 all compliment what Gerry Cauley did with his list. I think
7 that's a tremendous thing. He came up with a list, and then
8 he published it, and he asked people to give comments on it.
9 And I'm sure that this is the kind of thing that will
10 continue into the future and the list will be different.

11 COMMISSIONER SPITZER: It's three pages.

12 MR. JOHN A. ANDERSON: Absolutely.

13 COMMISSIONER SPITZER: Even I can read it.

14 (Laughter.)

15 MR. JOHN A. ANDERSON: Absolutely, Commissioner,
16 even I was able to read that, yes, sir.

17 I would also like to underscore what Mike has
18 been saying about the documentation. What our people say
19 sometimes is, why can't you just--some of these really minor
20 things, why can't we just fix them there and then move on?

21 Now if it's a repeating problem, if it goes on
22 and on, then that's something different. But they've been
23 complaining that they can't even--if it's just a lack of a
24 phone number, or a lack of whatever it is, fix it and do it
25 right there and then move on. And it's extremely

1 frustrating for an industrial company, you know, to have to
2 go through all the hoops they have to go through on this.

3 But I appreciate your concern. I appreciate you
4 bringing that up, and like I said I think what Gerry has
5 done is really important to try to highlight it, and then
6 seek comments on what he came up with.

7 COMMISSIONER SPITZER: But are there issues that
8 you think we could--

9 MR. JOHN A. ANDERSON: Well the main issue that I
10 keep hearing over and over--

11 COMMISSIONER SPITZER: It doesn't have to be a
12 standard, it could be just a concept.

13 MR. JOHN A. ANDERSON: I don't know. I'll have
14 to go back and find out about specific standards. The main
15 thing that I got back from them was there was the
16 documentation only kind of thing just kept coming up, and
17 that seems to be what they got hit with more. That was the
18 main thing.

19 I have not asked my members about which
20 standards--oh, they got very concerned when they thought
21 that the netting behind the meter. I mean, one of my
22 companies has a 300 megawatt generator, and they consumed
23 290 megawatts of it on a regular basis, and hardly ever put
24 any through the meter. And yet, if a proposal says then
25 you've got to be treated as a generator owner and a

1 generator operator because it's 300 megawatts and not 10,
2 that's of great concern. Those kinds of things are of great
3 concern to us.

4 The demand response, which I mentioned.

5 COMMISSIONER SPITZER: Mike?

6 MR. CARTER: Commissioner Spitzer, first of all I
7 think Gerry's list is the right list.

8 COMMISSIONER SPITZER: Okay.

9 MR. CARTER: But you alluded to something that I
10 think can't be put into necessarily this list, but it sort
11 of goes at your issue about the tax records.

12 It's not just about documentation. It is about
13 the culture that a CEO establishes in his organization, just
14 like it is in relationship to safety. And so just because
15 we have a training program doesn't mean that we have an
16 effective training program. Just because we have a document
17 doesn't mean that we did effectively whatever it was that we
18 said.

19 And I think that in these audits, if we have the
20 right people coming in, I think it is much like what INPO
21 does. They know whether the culture is right in an
22 organization. I certainly know it as a CEO that we have to
23 create that culture.

24 So if there's anything that--I don't know how
25 NERC actually does this, but I think it is incumbent upon

1 the CEOs that operate transmission systems to make sure that
2 they make this a priority in the organizations. And I can
3 assure you that my folks know it is a priority.

4 COMMISSIONER SPITZER: Any other comments?

5 DCPSC CHAIRMAN KANE: Yes. Looking at the list
6 from the point of view of the state regulator, I think those
7 eight priorities almost parallel the kinds of things that a
8 state regulator looks at in terms of the distribution system
9 in the intrastate arena.

10 I think one of the things, however, that we
11 struggle with--and it may be the context in which all of
12 this comes up--is that there are so many other players now
13 that are putting requirements, putting standards, putting
14 other kinds of things in that are going to affect
15 reliability. I'm thinking about the EPA regulations that
16 are coming in, the increasing number of Smart Grid
17 deployments, which is mentioned here. You know, state RPS
18 requirements. The distributed generation and the push for
19 distributed generation particularly at the local and at the
20 urban level, and the impact of that.

21 And then the NIST standards, the Department of
22 Energy Cyber Security Standards, and the kinds of standards
23 that states are coming up with for the operation of local.
24 Some recognition of both coordination and consistency, and
25 avoiding conflicts between standards so that the utilities

1 and the customers don't get caught in the middle.

2 MR. CAULEY: Commissioner, I would like to just
3 follow up on Mike Smith's comment because I think it is
4 really an important one to note.

5 The difficulty we've had to this point is there
6 are so many things that have to get done, sort of moving
7 this very broad front that's inclusive of a lot of
8 activities. So what he points out is an example of an
9 opportunity to be more efficient, or skinny down to
10 something that is not providing as much value.

11 I would note in the November Compliance
12 Conference, Chairman Wellinghoff asked me when we would have
13 the administrative citation done, and I said January. And
14 he wanted to know which year. But we did get the first
15 batch in in January, and we think that is an opportunity to
16 sort of skinny down the administrative portion of this.

17 But I think more to Mike's point, if we feel like
18 a lot of administrative paper checking is not helping
19 reliability, then it's an example of something that we can
20 kind of funnel down while we figure out which of the things
21 we're doing that we need to run ahead of the pack.

22 It's sort of we can't do all 50 things at once.
23 We need to figure out which wind down, and maybe not go
24 away; we're not going to stop doing audits. We're not going
25 to stop checking procedures. And in fact, from what we

1 heard today, I hear it on the other side about checking
2 details and making sure the documentation is there.

3 So as sort of NERC being in the middle, we're
4 hearing it from our need to be rigorous in our audits, and
5 make sure we don't leave ourself exposed to any assurance
6 risk; at the same time, we're hearing this is not helpful
7 for reliability. And what we've got to do is find the right
8 spot in that middle to make sure we are checking things that
9 are important but don't undermine our obligation to doing
10 the checking.

11 So I think that's an example he's pointed out of
12 an area that we should go back and look at some of the other
13 areas and say is something marginally not helping with
14 reliability as much? Can we skinny that down, while we take
15 the front runners, the things that really can lead the pack
16 here in the next couple of years, and promote them as a more
17 accelerated process?

18 So it is more of a management process than
19 anything else.

20 COMMISSIONER SPITZER: One last point. And,
21 Mike, you raised this about what is the right number for
22 reliability, how many 9s, we know we can't get to 100.

23 Chairman Kane, you said that the District has
24 reliability metrics?

25 DCPSC CHAIRMAN KANE: We do.

1 COMMISSIONER SPITZER: And that is based on SADE?

2 DCPSC CHAIRMAN KANE: Yes, we do. They were
3 establishing our electric quality of standards in 2005 in
4 our rules, and they were based on sort of where the company
5 was at that time and what kind of increased improvement we
6 were looking for.

7 We have recently, last fall, set up a working
8 group to review those standards, number one; to review both
9 which standards should be used, or are there other standards
10 besides SADE, KADE, that are consistent in the industry;
11 what the benchmarks should be; and should we measure it in a
12 different way?

13 And so that is all undergoing review now with
14 this working group. They will report to us in May. We also
15 had--our staff did a report on what performance standards
16 many of our neighboring states, about a dozen states in the
17 area, were using. And then some comparison of the
18 performance of our company against some of those standards.

19 COMMISSIONER SPITZER: We had a similar docket in
20 Arizona. You might not be surprised that, due to the
21 geography, they're somewhat different. And we had
22 cooperatives that sought and received waivers to pursue
23 their own reliability, based on their resource mix and costs
24 and benefits, in a different manner, which was accepted.

25 So I guess my question, starting with Mike, and

1 maybe anyone else, with the SADE, SAFTE, AND KATEY, you had
2 numbers. Is it possible to create numbers and then have a
3 regime where you come in at the right number, and you use
4 your resources, and you know your customers, you get to
5 those numbers in the way that is most efficient for your
6 utility and for your customers.

7 MR. SMITH: I mean the way I look at it is, I
8 look at what we're trying to do here with the Bulk Electric
9 System is to prevent cascading outages. And of course
10 you're going to say: Well what's a cascading outage? Or
11 what level of outage is that?

12 Well I think, you know, even in this simple
13 three-page report that Gerry is giving to us, there's an
14 illusion to a definition there where we look at the Bulk
15 Electric System as a series of dominoes. And if you have a
16 fault in one domino, it's better not to kick into the
17 neighboring dominoes and start a triggering of the totality
18 of the dominoes falling. And it's about our ability to
19 quickly isolate incidents in what's call here, in
20 parenthetical phrases, a "zone of the Bulk-Power System" and
21 prevent it form faulting or transferring into adjoining
22 facilities.

23 I think those are the kind of things that we need
24 to be measuring. And I'm not sure that we're going to be
25 able to get to a SADE or SAFTE definition that's good and

1 populous areas of New York City and other places that have
2 the same standards for rural parts of Iowa, or Idaho, or
3 something. I think you need to look at have we done things
4 to protect the Bulk Electric System? And are we isolating
5 that outage?

6 And to me, that's the definition of what we
7 should be striving to do. We are going to have outages. It
8 is not going to be 100 percent. But where you have that
9 outage, did you control it? And did you isolate it? And
10 those would be the things that I would be looking for. And
11 probably the simplest definition to me is: Let's keep
12 ourselves off the CNN, or the Drudge Report.

13 (Laughter.)

14 MR. SMITH: If we're hitting that, we've got a
15 problem.

16 COMMISSIONER SPITZER: Gerry, and then Lonnie,
17 and then Kevin.

18 MR. CAULEY: I think NERC is coming into a new
19 era in terms of our ability to collect and analyze data. I
20 think one of the speakers earlier mentioned the generator
21 availability database that's been around a long time. We've
22 just introduced a transmission availability database, and
23 the demand side.

24 And so what it will do is give us hard data on
25 performance: number of outages; it will give us key words

1 on what caused it. We've also introduced a system of five
2 categories of Bulk-Power System outages 1 through 5,
3 depending on the magnitude of that impact, and we have
4 criteria about what defines each of those.

5 So I am a little more optimistic that we can
6 start scoring ourselves in terms of Bulk-Power System
7 reliability performance. Maybe not at the same--it's not
8 measured in customer outage hours, but there are other
9 tangible measures, and I am hopeful that we are going to be
10 able to derive those, beginning in 2011.

11 And the interesting thing about having those
12 measures is when you see higher scores in some regions, or
13 some issues, we can say: Why are those happening? What's
14 the cluster of reasons and causes we're seeing those things
15 happen? And that can drive the priorities in our programs
16 going forward.

17 So I think we're going to get better at that. I
18 anticipate a year from now, if we have a similar conference
19 like this, I want to be able to come in and give a historic
20 trending and scorecard about how well we're doing in Bulk-
21 Power reliability. We're just now starting to get the data
22 that we can do that kind of analysis.

23 COMMISSIONER SPITZER: Lonnie?

24 MR. CARTER: Commissioner Spitzer, I think
25 there's a--first I want to make clear that I think having a

1 specific model or standard to determine what cost is
2 reasonable to make sure you have a reliable system is
3 probably not the best way for us to look at this, because it
4 implies to me that we're going to take judgment out of the
5 equation. And I believe that we're going to have to use
6 judgment in making this determination.

7 To be specific, what do I mean by that, we on our
8 system have a number of large industrial customers. Some
9 are willing to pay more than others to make sure that they
10 have additional equipment to serve them, either dual fees, a
11 backup transformer, a different scheme of relaying, and so
12 that's an example of where we need to let--you know, in some
13 cases we're going to need to let the customer make the
14 judgment about how much money gets spent on that item.

15 At the same time, I would point out that we, this
16 group, FERC and NERC, may come to the conclusion that
17 there's a certain threat that's out there that we have to
18 address. We just don't have a choice in addressing it
19 because it's so critical to the infrastructure of the
20 system.

21 So I am a little bit reluctant for us to sit here
22 and think we can find this happy standard that we can all
23 live with in all parts of the country. So I believe we're
24 going to have to use some judgment and trust the judgment of
25 all of us that are involved.

1 MR. BURKE: I think I would just be reiterating
2 something that's been said already, but even in Con Edison
3 we have different standards with our Public Service
4 Commission between our underground network system and our
5 overhead, more radial systems, but even they're not quite
6 "radial." And we also own Orange and Rockland Utilities,
7 and the standards there are different.

8 And they have been set over the years by the
9 Public Service Commission and the utilities by looking at
10 what the customers have been paying, and what level of
11 reliability is satisfactory to them.

12 So I think even when we look at the Bulk-Power
13 System I think it is important to include a reference to
14 what are the customers willing to pay? We have more
15 transmission in Manhattan than we have in the Bronx, for
16 example. So there's levels of reliability that you would
17 see that would be different, even just within New York City.
18 And I think it will take some work across the country, but I
19 think that we can develop some standards, and then measure
20 people against those standards.

21 I think it is going to be more difficult at the
22 distribution level where there are a number of outages, so
23 you can really look at, well, how did you do this year
24 compared to the standard?

25 I think for the transmission standard it might be

1 more--you might have to look at it over the course of a
2 decade because we rarely have problems where we lose
3 customers because of problems on the Bulk-Power System.

4 COMMISSIONER LaFLEUR: Thank you. Commissioner
5 Norris?

6 COMMISSIONER NORRIS: To have five minutes of
7 question is a little bit anti-climatic.

8 (Laughter.)

9 COMMISSIONER NORRIS: But I'll go forward. Let
10 me push a couple of things to this afternoon's session so we
11 can get to the next panel. A couple I'd like to be
12 answered, though.

13 Let me ask, maybe I'll start with you, Gerry.
14 It's in follow up to the discussion that Marc led you on
15 with regards to these priorities. And then we'll have some
16 discussion about, as Kevin said, how you take stuff off the
17 list.

18 Is there a process that would be helpful for you,
19 NERC and the industry, to sign off on this? And also ask
20 for a similar list of things that would be tabled? Because
21 I know since No. 693 and other Orders that we have put out
22 the list of standards developed is getting onerous.

23 What I don't know is how much. I mean, I know
24 Alan and the Standards Development team are constantly under
25 pressure to get all of these things done, but what's the

1 best way for us to take that pressure off?

2 Does it need to be some form of sign-off on the
3 top priorities, and a list of things that we're okay with
4 you tabling for a year?

5 Now I know there are risks in that, because then
6 as soon as we table one of those, sure as heck that's what
7 causes an outage. But we've got to make those decisions.
8 If we don't make priority decisions and make cost and value
9 decisions, then we are not doing our job.

10 So I ask you, Gerry, is there a process by which
11 we can be helpful to free you up to do the most important
12 work?

13 MR. CAULEY: Well, Commissioner, I think you have
14 suggested the outline for that. I do want to repeat a
15 comment I heard from a couple of others that that set of
16 eight priorities, or that memo is a snapshot. And I think
17 to be really effective we have to be able to have an
18 adaptive and situational ability to set priorities, so
19 something may come in as we go forward.

20 But that aside, I think your suggestion would be
21 helpful. I think if we were able to propose a timeline
22 other than at an instant in time here's our priorities and
23 we should stop doing this, and we should start doing more of
24 this, I think if we could submit a proposed plan several
25 years out in terms of how can we get all of these really

1 important things done, but we want to do these first, and we
2 want to put less emphasis on these now until we get some of
3 these early things done, I think that would be a good
4 approach.

5 And I think to the extent that the Commission
6 could give us some leniency on some of those things that
7 are--maybe even some things that are out there now that
8 we're working on, and track these top issues, I think that
9 would be very helpful. Because right now I can tell you the
10 industry and NERC, we're trying to do too many things at
11 once and I think we're running the risk of not doing many of
12 them very well. And I think that would be a helpful
13 approach.

14 COMMISSIONER NORRIS: Okay. Good. Well I would
15 be amenable to seeing that list of what we can work on
16 setting aside for you and get the important work done.

17 I was going to ask this of Gerry and John Q.--
18 yes, John, go ahead.

19 MR. JOHN A. ANDERSON: One thing I think that
20 would be helpful is for you all--and I mean both you and the
21 staff--to look very carefully at the prioritization tool,
22 and give your very candid opinions back. But hopefully
23 you're going to come out then and support it.

24 And what that's going to show is some are of much
25 higher priority than others, and I think we can start moving

1 in that direction. So I really think it's important for you
2 all to do whatever you have to do to where you can feel
3 comfortable buying into this concept, and I think it's a
4 very positive move.

5 COMMISSIONER NORRIS: Good. Thank you, John,
6 that's kind of what I was alluding to. I think we need to
7 give you feedback on this, not just from the people that are
8 reporting to you but from us as well.

9 Now I'll ask, since we have several sectors of
10 public and co-op and investor-owned power and consumers
11 here, I was going to ask this of Gerry and John Q., but
12 maybe I'll do it of you first and give them a chance to
13 respond.

14 I'm sure in the back rooms of NERC meetings and
15 other meetings you all have that occasionally the word
16 "FERC" is taken in vain--

17 (Laughter.)

18 COMMISSIONER NORRIS: --so I'm asking you to tell
19 me today, what is it we do that is helpful, you can share
20 that, too, or what are the most important things, changes
21 that we might make that would enable this relationship to
22 work better, and standards to develop more judiciously and
23 expeditiously?

24 And then also, from your standpoint as industry,
25 you can tell this to Gerry and John, or you can tell it to

1 us, what maybe perhaps you can do that would make this
2 process work better. So this is kind of getting to that
3 role question I talked about in my comments this morning.

4 MR. SMITH: I think from my perspective, I think
5 we could all come at this with a more positive attitude
6 about what role we all play in this, and the value that each
7 of us bring.

8 My inclination--and maybe it's just me--but my
9 inclination is to believe that when Gerry starts putting
10 these standards through this performance-based, risk-based
11 approach and starts streamlining those standards, that he's
12 going to be challenged on that.

13 We're going to try to support that, but I just
14 feel like FERC is going to challenge: Why are you
15 streamlining this out? Why are you streamlining that out?
16 And I need to get away from that perception of that's what's
17 going to happen, yet that's what I feel is going to happen.
18 And I hope it doesn't, but I think it will.

19 And if we can do this and not have that happen, I
20 would be very happy. So I think I echo some of John's
21 comments about we hope that ya'll come at this and support
22 it. It has to happen. We've got to get this streamlined
23 prioritization.

24 And I also am a little bit concerned as to
25 earlier we were talking about this effort to streamline

1 these, what I call "parking ticket violations." And there
2 was a little bit of comedic levity there about what year are
3 we going to get to that; we're not laughing about that.

4 I mean, I don't know why that has taken so long,
5 and why it continues to take so long. And it's something
6 that has to happen. And there is a frustration that that
7 seems to be just the way it is. So I think if we can break
8 through those, this will be much more successful.

9 Now from our perspective as an industry, we need
10 to appreciate the differences that you bring up between--you
11 know, documentation is important. You can't be cowboys out
12 there doing it and saying I'm not going to write. We don't
13 need to do in that direction where we fight all
14 documentation. What we're trying to do is get to the
15 relevant documentation.

16 And then back to Gerry's comments earlier about
17 somehow insinuating that there's an aversion to audits,
18 we're not--I'm not averse to audits. I think audits are
19 good things to occur to make sure entities are doing what
20 they need to do. Yet there's some perception that we as an
21 industry are going to try to do whatever we can do to avoid
22 audits. I don't think we need, as an industry, to be giving
23 that perception, either.

24 You need to have a culture of compliance, and you
25 need to be able to go through audits successfully. And that

1 needs to be there.

2 MR. BURKE: I would think one of the things that
3 FERC should continue to do is focus on the national
4 standards for reliability. If I think back in my time on
5 the planet, I can think of three times when there were
6 basically system-wide blackouts in New York City--you know,
7 '65, '77, and the most recent one.

8 One was caused by Con Edison, but the other two
9 were caused by people elsewhere. We're all in this
10 together. Our systems are interconnected. An issue in one
11 area can spread to another area. So I think it is important
12 to have system-wide standards.

13 We are talking today about how you prioritize
14 those standards, and I think reasonable people can differ on
15 those issues. But I think that is one thing that I would
16 encourage FERC to continue to focus on, and you have been
17 focusing on that, because I think we all know the importance
18 of reliability.

19 If I would think about what FERC could do a
20 little bit differently that might be helpful, I think
21 perhaps maybe a little bit more deference to NERC's
22 decisions. Now when NERC takes some positions, we'll
23 disagree, right? But I think anybody who has managed, you
24 know, larger organizations as they've moved up in their
25 career, they realize that at some point in time you have to

1 let the people who are reporting to you, doing things for
2 you, exercise some judgment.

3 And I think in some cases we just have to be
4 careful that we don't try and replace NERC's judgments with
5 our own individual judgments, or with the judgment of FERC.
6 There might be a couple of reasonable ways of approaching
7 that standard. And I think if any of those reasonable
8 approaches came before FERC, I would encourage FERC to say:
9 We'll approve that and see how it works out. It might have
10 to be adjusted later on.

11 As opposed to then saying, well, I think we can
12 change this little provision in it and make it a little
13 better, and make this provision a little bit better.

14 So I think a little bit more deference to the
15 expertise that resides in NERC. We have the same issue. I
16 know sometimes in our organization people say, well, gee, we
17 didn't like this decision. But they considered it, very
18 professional people, industry-wide, and let's move on.

19 MS. BROWN: If I was going to pick any single
20 word, I think it would be "collaboration." I strongly urge
21 you to set the tone to facilitate the opportunities for
22 collaboration between federal, state, and provincial
23 regulators.

24 Conferences like today, and the people that
25 you've invited to speak, and the topics that you've

1 selected, are important. Let's be realistic. FERC is the
2 big guy on the block here. You all will set the tone for
3 others. And you have the ability to facilitate those
4 conversations occurring.

5 MR. JOHN A. ANDERSON: I was going to pick up on
6 what Roberta said. You had the conference in July. You
7 have one now. I would really encourage you all to do this
8 kind of thing right here--different people on it. You don't
9 need to have the same people. But do it at least a couple
10 of times a year.

11 I think it will bring--and I'm going to go back
12 to Commissioner LaFleur's saying about the breaks. You
13 know, the breaks are important time periods, the hall
14 conversations and that sort of thing, but I think many times
15 they become a more true way of trusting things.

16 So I also commend you all for going to NERC
17 meetings. You've been very good at that. I encourage you
18 to continue that. All of these things help the dialogue,
19 help the ability to understand what is going on.

20 I am pretty impressed with what NERC is doing
21 overall, and I think you will be as you get more and more
22 involved with them.

23 COMMISSIONER NORRIS: I think most of you are on
24 the third panel, so I will follow up on some of the cost
25 questions you had this morning. But just a quick follow up

1 with you, Kevin.

2 Order No. 693 says that if we propose something,
3 FERC, in terms of a standard, that we will accept something
4 that is equally efficient or effective. You just mentioned
5 cost. Does cost come into that analysis?

6 MR. BURKE: I think cost comes into everything we
7 do. We are asking our customers to pay for a certain
8 service, and my first boss told me we deliver power in
9 megawatts, energy and megawatt hours. And third was the
10 knowledge that when you flick the light switch, the lights
11 are going to come on--you know, the reliability.

12 But I think we can't focus on cost and
13 reliability independent of each other. We have to look at
14 where do we get the most bang for the buck? And as I said
15 before, we've been working with the Public Service
16 Commission in New York and looking at programs that we
17 instituted in response to issues that we had that didn't
18 meet our customers' standards of expectations, and saying
19 that we agree that we shouldn't be doing these things
20 anymore. We've gotten most of the benefit out of it, and
21 perhaps we should stop doing them. And that's cost based.

22 COMMISSIONER NORRIS: Do you think in the
23 standards development, is cost part of the discussion of
24 meeting that efficient and effective standard?

25 MR. CAULEY: Well I think historically there's

1 been an implicit cost consideration by saying we operate the
2 grid to an n minus 1 situation. So there's sort of a long-
3 standing, for decades, acceptance that that's the standard
4 for balance between cost and reliability, and also the once-
5 in-10-year loss of load for supply of generation.

6 I think beyond that we don't have specific cost
7 analysis. But I can assure you, if I propose something
8 that's sort of unreasonable with regard to cost, and we'll
9 take the Alert on right-of-way clearances, we hear about it
10 a lot. So I think implicit in the comment, discussions, and
11 the feedback, if we're doing something out of line with
12 respect to cost, that we do hear about it.

13 There may be--I think if we can better quantify
14 our reliability performance in the future, as I've
15 suggested, I think we should also be able to get broader
16 understanding of the value and the benefits that we're
17 producing from that information.

18 What I would hope we don't get into a situation
19 of doing is trying to do the accounting style project
20 justification that's typically done on a, you know, do you
21 add a line or do you not add a line? Because I think that
22 would really frustrate our process.

23 But in terms of incrementally what's the greatest
24 value of the next thing we could do for reliability? What's
25 the next greatest benefit? I think we should have those

1 discussions and try to align our cost impacts with benefit
2 as best we can, yes.

3 DCPSC CHAIRMAN KANE: I think the states would
4 feel more comfortable if there was more of a cost/benefit
5 analysis in that standards' setting process. Perhaps not in
6 the explicitly--trying to put a value on reliability, but I
7 know at the state level when we have a project, or in our
8 case a continuous improvement plan, a reliability plan that
9 comes in from the utility, that there is an actual
10 cost/benefit analysis done.

11 We did it with our Smart Grid, our Smart Meter
12 installation for example. It had to hit 1.0 or more to be
13 federal funds. So that did it. But I think that there
14 would be some more objectivity in it in terms of weighing
15 the cost versus the benefit.

16 And the other is a results-oriented approach,
17 which I think gets into the benefit, too. When we look at
18 standards, it's not did you meet the standards? But what
19 caused the problem? And what are you going to do to prevent
20 it in the future? And how will this standard help prevent
21 it in the future, rather than just meeting the numbers.

22 And I think that that could build some better
23 confidence and acceptance of what the standards are, and the
24 necessity for them.

25 MR. BURKE: I would just like to add one thing to

1 what Gerry said about the N minus 1 design. Well generally
2 we have a N minus 1 design for supplier to distribution
3 substations in our service territory, except in Manhattan
4 and parts of downtown Brooklyn where it is N minus 2.
5 Because the customers expect that level of reliability, and
6 I think they value that reliability. And the cost would be
7 higher if we were to extend that route to the rest of New
8 York City. And I think that that's one of the things that,
9 you know, we would have to consider if we were to change
10 that, and we haven't proposed changing that. And I think,
11 you know, cost is a factor.

12 Would it enhance reliability? It would, to a
13 very small amount. We lose our network customers a handful
14 per thousand every year. They wouldn't see much of a
15 benefit for it. And those are the kinds of ways we would
16 take cost into account.

17 MR. JOHN Q. ANDERSON: Commissioner Norris, I
18 don't think you got an answer from Gerry or me, but on your
19 question of the FERC relationship, what can FERC do and so
20 forth, I had just a couple of thoughts.

21 I think from a Board point of view, looking at
22 the relationship with FERC and what you all do that affects
23 us and so forth, I'll start out by saying I think it has
24 been a really dramatic process going through the learning
25 between FERC and NERC over the last three years, let's say.

1 It started out very rocky I think because we just, neither
2 of us knew the roles. Neither of us particular--I'll be
3 honest with you, I don't think either of us particularly
4 liked the framework when it first started out; it just
5 didn't seem natural, and we really evolved into that. And I
6 have really appreciated both you as Commissioners becoming
7 more involved, and knowledgeable, and willing to engage with
8 us, and the staff, too. Staff has been tremendous to work
9 with.

10 And so two things I would say.

11 First, is directives. And the second will be
12 kind of a trust or collaboration.

13 In the directives area, in general I think that
14 you know this, and you've heard this from us before, but I
15 think you and the staff need to recognize they are very
16 powerful. In fact they are, because they are law to us
17 basically, and we have to do them. And second, they are
18 very powerful just because we know that to not do them, or
19 to fight against them would be all kinds of problems.

20 And so I would just urge you to continue being
21 very thoughtful about using that tool as a way to
22 communicate to us. It is necessary sometimes I'm sure, and
23 you'll have to use it, but I think we're starting to find
24 that there are other very effective ways that are less
25 formal that you can affect us and have an influence on us,

1 and get your point of view into the process well.

2 And so I would encourage you there to be very
3 cautious in using the directives; that when you use them,
4 it's necessary. And the way they're written, they are right
5 and the unintended consequences are minimized.

6 The second point goes to what I think Kevin said,
7 and a couple of others, about trusting the NERC process and
8 so forth. Part of this I think has to do with remembering
9 that the industry, or the stakeholders that we talk about,
10 it's not just the utilities, and it isn't just the engineers
11 that work, and the people that have to spend the money, for
12 example.

13 Our stakeholder process involves all of the
14 sectors that are affected by this industry. So there's a
15 big, natural check-and-balance process built in. When we
16 say we've got industry buy-in, or when you say we're going
17 to kind of delegate this, or we're going to trust industry
18 or the stakeholders to do this, again it's not just trusting
19 the utilities, do they want to spend money on something,
20 because that sometimes seems like a conflict of interest.
21 But we've got users that are very small. We've got users
22 that are large. We've got transmission owners and
23 operators. And then we've got the generators. We have the
24 marketers, and we have regulators.

25 All of them have full power to be involved in our

1 process of determining the priorities, working on standards,
2 working on the approval process that we go through. And so
3 I would urge you to be as trusting as you can. And if you
4 don't trust enough yet, figure out what it's going to take
5 to get more trust. Because we're going to be very open to
6 foster that collaboration.

7 So those are the two areas I would say that form
8 a FERC point of view it's been getting much better. And I
9 think we can continue together to make it much more
10 productive in terms of reliability.

11 COMMISSIONER LaFLEUR: Thank you, Commissioner
12 Norris.

13 I have a specific question that I think picks up
14 on Commissioner Norris's question, and also what John Q.
15 Anderson just said.

16 I also read last night the draft new standard
17 process, which I think is a good proposal, and I note--and
18 of course I understood why--that there's a very high adder
19 for any regulatory directive that comes from FERC. I
20 believe 100 points if it's within 12 months, which of course
21 I think it appropriate. But it does strike me that with the
22 hundreds of projects that you have pending, a lot of the
23 FERC directives are going to get to the top of the list.

24 And I guess in the spirit of open communication,
25 my question is: Do they all deserve to edge out what

1 they're going to edge out in terms of improving reliability?
2 Or should there be a process where, as John Norris was
3 teasing out, you--not without a discussion and approval--but
4 can say here's the ones we're going to do first because we
5 think they have the highest impact on the Bulk Electric
6 System, and here's a timeline we propose for the others, and
7 would you approve that?

8 Because we live in a very iterative world, where
9 we look at an Order, we look at the standard we're looking
10 at, and we might feel those directives are important, and
11 presumably they were all felt to be important at some time
12 when they were voted out. But we don't necessarily see the
13 pile of them that's then accumulated and whatever is being
14 prioritized out by working on them.

15 So I just want to throw this out for thoughts.
16 And I would welcome some sort of process, if we need to take
17 a snapshot as you go into this process of what the backlog
18 is in what's there, and what we should be doing. I'll throw
19 that out for thoughts.

20 MR. CAULEY: Thank you, Commissioner LaFleur.

21 I did want to kind of go back to Commissioner
22 Moeller's question earlier: Is this the process we're using
23 for prioritizing?

24 I did want to clarify that the document that
25 you're referring to is something that came out of our

1 Standards Committee. It's a method for weighing a number of
2 different factors in terms of what we should proceed with in
3 the standards. I don't think, in and of itself, it is the
4 decision tool that NERC is going to use. I think it is a
5 good input; it's a good analysis tool; but I think at the
6 end that input, and among other inputs in terms of
7 discussions with the Commission, what really are the
8 priorities, and how do we sequence them, I think is more of
9 the organic leadership decision. It's not like a tool pops
10 out and says this is the answer, that's it.

11 But I think John had mentioned that the
12 collaboration and consultation I think really is the secret
13 to that. I've had a number of discussions with senior staff
14 in the past in terms of, yes, you have hundreds of
15 directives in front of you, but really you should focus on
16 the ones that are most important. And I think we appreciate
17 that.

18 But I think we could go that one step further and
19 just say: Before we do a really big directive on
20 initiative, do we all agree on what the priorities are? I
21 mean, because we will have our list, and mine is driven more
22 by known, existing gaps in our real operations every day
23 that cause customers to go out. I'm really worried about
24 that. And some day when we've solved those problems, there
25 will be other priorities that we can go after.

1 But if the Commission then has priorities that
2 maybe don't line up with that, I think the way to resolve
3 that is to have the conversation and really try to
4 understand that. And I think that is the approach that I
5 would suggest. Is it leadership and consultation that I
6 think is the answer.

7 MR. SMITH: I would just say, and add to what
8 Gerry said, I think there is an expectation that there is
9 some level of transparency that is going to come from this
10 process, as well as to when we do look at things from a
11 performance basis, or a risk basis.

12 I think you would be interested if a FERC
13 directive was not rising to the top, what was it about that
14 FERC directive that is holding it down? And would be very
15 open to that, and not just say, dang it, it's a FERC
16 directive, go do it. You'd want to know why--how is that
17 being displaced? And what's displacing it?

18 So I think the transparency of this process is
19 really going to be beneficial to everybody.

20 COMMISSIONER LaFLEUR: Well I think that's right.
21 And just as you have said, your resources are not unlimited.
22 We also want to be working on the things that are going to
23 help reliability the most, obviously. And that's why I
24 think some sort of planning process where you know what the
25 big things are that we're trying to accomplish together over

1 the next couple of years, where it's not just kind of
2 reacting to the deadlines of each filing I think is as, not
3 this document but the other document, the eight items, sort
4 of begins to tease out that sort of prioritization.

5 The last question I will ask, I have still been
6 thinking a lot about the relationship between "adequate
7 performance" and "excellence," that I think Roberta first
8 mentioned. And I think--I know there's something really
9 intrinsic in the standard writing process. If you're
10 writing a standard to which you're going to be bound and be
11 penalized if you don't meet it, there's a tendency to write
12 that differently than a goal, you know, an aspirational
13 objective. I mean that's just natural.

14 And I think you might see some of that reflected
15 back in some of our review of the standards where you see a
16 lowest-common-denominator, or kind of pushing. And I am
17 just asking, beyond the standards' process, which should be
18 a minimum to which people are willing to be held, and there
19 should be real consequences if they don't meet that, and it
20 should evolve over time, just as distribution standards
21 evolve over time as new things come up, and as performance
22 hopefully improves over time. Are there other ways to bring
23 out the excellence that I think we all aspire to, or should
24 aspire to?

25 I mean, some forms of state regulation that I've

1 been familiar with have a penalty and a bonus system. Or
2 you look at J.D. Power where they rank the top quadrant in
3 customer service in the industry. Or different levels of
4 LEEDs certification. I don't know if this is something the
5 Forum might do, or is there another way we can get at this?

6 MS. BROWN: If I can volunteer, I think one of
7 the most important things that you can do, and other
8 regulators--I mean, who sets public policy are state,
9 provincial, and federal regulators--be very clear about what
10 is the minimum baseline level of performance. And that
11 permits us to be more granular in particular areas.

12 You heard my colleagues refer to it, where in
13 urban areas you may choose to have, and pay for, a higher
14 level of performance. John Anderson talked about, and
15 Lonnie Carter talked about industrial customers making
16 economic choices about redundant feeds, about automatic
17 switchover. They make a value judgment.

18 Over time, public policy tends to increase as
19 society has changed. But if you are very granular about it,
20 you all are the reflection of public policy in your area and
21 direction for us. Be clear and then customers can make
22 choices there.

23 Reading The Washington Post, one sees that some
24 customers in this area have made choices about generators.
25 That's a granular choice a customer made about where it was

1 worth it to spend money.

2 So if you set a baseline, customers will make
3 choices. Listen to them.

4 MR. BURKE: I think the issue of the standards
5 shouldn't be set at the limit at which we are comfortable
6 being measured, because I think that's too low. So I
7 wouldn't want to get a sense that that's where--because
8 people would set a limit where they'll never get a penalty.

9 What I think we want to set the limit to is so
10 people on a national basis get the level of reliability that
11 the customers need and expect. And I think so that one
12 region does not affect, have an adverse impact on adjacent
13 region. Like I said before, our customers are willing to
14 pay for and expect more reliability than perhaps in other
15 parts of our service territory, and I think it is very
16 logical. We have subways, we have high rises in some parts,
17 and in other parts it's one-family homes. Levels of
18 reliability should be different if people are willing to pay
19 different things for that.

20 So I think that implication I think might be a
21 little bit low, but I do think, you know, that the
22 Transmission Forum will help raise the level of reliability.
23 When people get together and they are open-minded, and we
24 were talking before about the peer reviews, and Mike was
25 talking about how, you know, they came to his utility, well

1 not only did he benefit from it, but the people who were on
2 the peer review teams from other utilities benefited from it
3 because they wound up talking to other experts from other
4 utilities in a way that they're not being defensive at all.
5 They're not trying to explain what they did.

6 So I think there is a lot going on that we can
7 improve, but I think the standard should not be viewed as
8 the lowest-common-denominator. It may be appropriate at
9 some point in time to say, well, gee, here's the standard
10 we're going to set. If there are some people who
11 traditionally have not been there, maybe give them some time
12 to get there before it becomes a violation. I think that
13 might be--

14 COMMISSIONER LaFLEUR: I don't think the lowest-
15 common-denominator was the goal.

16 MR. BURKE: Right.

17 COMMISSIONER LaFLEUR: I think that's been a
18 criticism of standards sometimes coming back that, without
19 the kind of metrics that Gerry was talking about, it's not
20 intuitively obvious except from your judgment where it fell
21 on that standard of lowest-common-denominator to challenge
22 standard.

23 DCPSC CHAIRMAN KANE: Looking at the analogy in
24 distribution, our statute in the District says that it is
25 our responsibility, and this was enacted by Congress in

1 1913, that there's "adequate" electric service.

2 And yet we've just issued an Order, well over a
3 year ago now, for our distribution company to come in with a
4 plan to move their performance to the top quartile. You've
5 got a big gap between what's adequate and top quartile. And
6 how do you define "adequate."

7 We had an undergrounding study done, because
8 everybody said, well, that's the solution. Put it all
9 underground. \$6 billion to put the less than half of the
10 District system that's still above ground under ground.

11 And then we did the cost/benefit analysis of
12 doing say the parts of the primary, parts of the secondary,
13 and you could really get it down to, to put everything
14 underground is \$240,000 like per household to do it, because
15 that's where it is.

16 But if you wanted to get a better standard where
17 you maybe had prevented 50 percent of the outages, or 60
18 percent of the outages that were caused by over-ground,
19 excuse me, above-ground, you could get the cost down to like
20 \$35,000.

21 So it's not a simple answer saying you've got
22 "adequate" and you've got "excellence," but setting that
23 standard, the "adequate" standard at a level that's
24 acceptable and reliable and affordable.

25 MR. JOHN A. ANDERSON: Just--I'll be brief. I

1 know we're over time, but I really think this is a critical
2 part of the discussion right now. And I missed Chairman
3 Wellinghoff's question just before we broke for lunch. He
4 said, what are the most important things?

5 I think this kind of a discussion coming up to
6 what is an adequate level of reliability that we all can
7 agree to? Is extremely important. But also the tradeoff
8 with cost. And as both Lonnie and several others have
9 mentioned, my members vary all over the place on that.

10 I have some members--I have one member, Intel,
11 that can't stand a single outage at all. They have dual
12 feeds. They have dual substations. They have a room full
13 of batteries. They've got backup generation. They've got
14 the whole thing.

15 I've got other members that are perfectly willing
16 to shut down hundreds of megawatts in a matter of two
17 minutes, you know, this kind of thing. You've got to let
18 the customers decide what level they're willing to pay for.
19 And I think that is the critical one.

20 But we first need to get down and get some
21 agreement about what is adequate across the board. And I
22 can sympathize with your idea that you don't want it to be
23 the least-common-denominator, but at the same time every
24 time you go off of the least-common-denominator you're
25 incurring cost. And those things could be, as was just

1 heard by Chairman Kane, that can be a very, very big cost
2 very quickly.

3 MR. CAULEY: It's a very good question,
4 Commissioner. We just completed a strategic planning
5 process involving the Regions, and staff and the Board, and
6 one of the conclusions we came out with is we need to go
7 back and re-look at the issue of what is an adequate level
8 of reliability for the Bulk-Power System.

9 I thought I was going to have to have a hard time
10 selling it around, but it seems like it seems to be getting
11 some traction. But I think part of the answer to your
12 question is: If we keep trying to creep up performance
13 through the standards, I think we are going to get some
14 pushback from the industry. You alluded to that.

15 So if I write this in here this way, then I am
16 going to be under compliance later on. I think we need a
17 solid foundation of a description of what is an adequate
18 level of reliability, and drive our standards to that.

19 I think the ERO, whether it includes work by the
20 Transmission Forum or not, but I think just as a general
21 principle we can strive for excellence in reliability at the
22 same time as we provide assurance that we will have
23 compliance with the minimum standards.

24 I think those rules are compatible, and I think
25 they are complementary. We just sent seven goals for the

1 next few years to the Board to look at our business planning
2 and strategic planning. And within those goals are, to
3 develop concepts such as you suggested of recognizing best
4 practices and publishing them out.

5 I think there needs to be some kind of process,
6 not just to find the bad behavior and the bad actors that we
7 want to correct and incent that through penalties, but if
8 somebody is going above board and delivering value not just
9 to their own stakeholders but to the whole industry of a
10 breakthrough in reliability, why not give them some kind of
11 credit that they're doing something beneficial for
12 reliability?

13 So I think that's got to be integral with what we
14 are as the ERO.

15 COMMISSIONER LaFLEUR: Thank you so much. You
16 have been a great panel. We are going to take, not really a
17 break but to change panels and move to panel two. Thank you
18 so much.

19 (Pause.)

20 We are going to bring this back into session. We
21 are trying to resume here with panel two. Good afternoon,
22 everyone. We will now move to our second panel where a
23 group of panelists will address views regarding the emerging
24 issues of the Bulk-Power System that we should address.

25 I just wanted to clarify on the agenda for this

1 conference a long list of questions that we've put out. We
2 did ask about electromagnetic pulse. I wanted to explain,
3 because there have been a couple of questions about that.
4 We certainly intended geomagnetic disturbances caused by the
5 sun, as well as the manmade disturbances of the type that
6 Congressman Franks spoke about this morning.

7 I want to start by introducing our panelists,
8 another great group. I'll go from right to left. First,
9 Randy Vickers, who is the Director of the United States
10 Computer Emergency Readiness Team, or CERT, which is in the
11 National Cyber Security Division of the Department of
12 Homeland Security. Welcome.

13 Avi Schnurr, the President of the Electric
14 Infrastructure Security Council.

15 Ron Litzinger, the President of Southern
16 California Edison, who is here on behalf of SoCal Edison, as
17 well as EEI.

18 Steve Wright of Bonneville Power. He is the
19 Administrator and Chief Executive Officer there.

20 Steve Whitley, the President and CEO of New York
21 ISO.

22 Ed Tymofichuk, who is the Vice-President of
23 Transmission at Manitoba Hydro. Thank you. I don't know
24 whether you or Mr. Litzinger win the--I guess Ron probably
25 traveled further, but you both traveled quite a way to be

1 here. Ed is also the outgoing Chair of the NERC Members
2 Representative Committee.

3 And our returning guests, Gerry and John are
4 still with us.

5 We will start with Mr. Vickers.

6 MR. VICKERS: Good afternoon. I would like to
7 thank you for this honor to speak with the Commission today.
8 Some of the things that I will definitely talk about is
9 definitely the emerging threat. And I choose that word very
10 carefully, but the emerging threats to our critical
11 infrastructure.

12 Threats to the private sector and private
13 infrastructure are a very serious matter, and DHS as well as
14 many others in government and industry take it very
15 seriously. So let's talk about some of the things that we
16 see.

17 This morning in our daily update there was a
18 non-energy sector organization that had an event where an
19 adversary through their remote access to a SCADA system
20 actually was able to authenticate, change the language on
21 that system to a non-English language, create accounts, and
22 potentially manage that system. And it wasn't a Stuxnet or
23 any other thing, it was just a simple system.

24 And initial reports from this organization say
25 they're still running Legacy Windows system, a Windows 3.X

1 system that had basic modules that allowed them to Internet
2 work this capability for remote access, and then allowed
3 them to be able to use simple authentication, user name and
4 password, and authenticate.

5 So the threat is very real. It's not just about
6 the large threats like Stuxnet that bring in a large-scale,
7 zero day against more robust Windows system, more modern
8 Windows systems, and then are able to then have different
9 types of payloads and actually talk to the PCIs of the
10 various systems.

11 And then we have things where it may not be
12 directed directly at control systems, but because of the
13 interconnectedness that we are facing with our systems, both
14 control system and admin networks at our plants and other
15 industry organizations, but things like conficker that
16 happened approximately two years ago that had multiple
17 payloads, that can be transmitted not just through actual
18 wire-to-wire connection, but thumb drives.

19 We have--anything that allows for automated
20 startup, or auto run, a CD--we don't think about CDs. We
21 understand thumb drives, but we don't think about CDs being
22 put in a system to transfer data and potentially having a
23 file, a writable CD.

24 So those are critical things that we need to
25 understand that not only affect our administrative networks

1 and those types of nonoperational networks, but affect our
2 control system networks, and our operational networks.

3 So how does DHS, and what is the role that DHS
4 plays in support? We are not a regulator. We will never
5 attest to be any substitution, or anything over a body such
6 as this. But through relationships set up in Homeland
7 Security Presidential Directive No. 7, where we work with
8 sector-specific agencies and other regulatory bodies in
9 helping mitigate threats and activities.

10 So in 2004, DHS set up the Control System
11 Security Program which was designed to protect critical
12 infrastructure, providing expertise, tools, and leadership
13 to owners and operators of control systems to help reduce
14 the cyber risk.

15 And in doing so, they also created the Industrial
16 Control System Cyber Emergency Response Team. They work in
17 parallel and in partnership with the US-CERT. They have a
18 lab out at Idaho National Labs that looks for
19 vulnerabilities related to control systems and SCADA
20 systems. They can test certain configurations against
21 certain vulnerabilities and develop mitigation strategies to
22 help do that.

23 Well we don't focus on just one sector. But to
24 enable a large--the ability to share information broadly, we
25 support things like the Cross-Sector Cyber Security Working

1 Group, the Information Sharing and Analysis Centers, and the
2 National Council of ISACs, all tied back to the National
3 Infrastructure Protection Plan and the National Response
4 Plan that are associated with that.

5 So to defend our networks, not just our
6 government networks, it is critical that coming together in
7 groups like this and sharing information and understanding
8 and looking at the different standards that have been
9 discussed today on helping establish cyber security as a
10 very prime aspect in conversation in day to day activities.
11 It should not be a second thought, but a primary thought.

12 Thank you.

13 COMMISSIONER LaFLEUR: Thank you, Mr. Vickers.
14 Mr. Schnurr.

15 MR. SCHNURR: Yes. Thank you.

16 First of all, let me say that I think events like
17 this are extremely important. Of all the different
18 agencies, regulatory groups in the U.S. Government, what
19 you're doing and what FERC is doing is probably the most
20 critical across the board to everything that happens in the
21 United States. We cannot really get anything done without a
22 reliable energy supply.

23 So I think this is a very important conference,
24 and I wanted to thank you, Chairman Wellinghoff, and thank
25 you, Commissioner LaFleur, all the Commissioners, and

1 Commission staff for inviting me to be part of this
2 important conference.

3 I would like to spend the few minutes I have here
4 today talking about EMP. I hope I can add a few
5 perspectives beyond what Congressman Franks discussed this
6 morning. But let me begin by trying to characterize the
7 problem.

8 As Congressman Franks said, EMP comes in two
9 categories. There is natural, and malicious EMP. And in
10 1859 there was a massive solar flare. What happened was
11 that there were brilliant Northern Lights that went all the
12 way to the Equator. The telegraph network was burned out
13 all over the world.

14 There was a similar event that was nearly as
15 large that occurred again in 1921. Now based on the recent
16 National Academy of Sciences work--it was a study that was
17 sponsored by NASA--they concluded that events like this
18 happen at least once per century, based on the research that
19 has been done.

20 Given that, if we try to get some kind of idea of
21 what that means probabilistically what we're going to face,
22 what that means is it is very unlikely that we will go more
23 than a handful of decades without experiencing this kind of
24 very severe space weather.

25 It's less than a 50 percent chance that we will

1 experience--that we will not experience this kind of an
2 event over the next say 30 years. The conclusion of the
3 study was particularly unsettling, and the conclusion of the
4 study was that the result of these kinds of large coronal
5 mass ejections are severe ground-induced currents at a level
6 which significantly exceed the design margins of the large
7 transformers that are used to distribute power in the grid.

8 What that means is that many of these
9 transformers, if they're not protected, will fail. They
10 will be destroyed. The other aspect of this, natural EMP,
11 so in upper atmosphere--I'm sorry, malicious EMP--in upper
12 atmosphere tests in 1962, both the United States and also
13 the Soviet Union found that by setting off a nuclear warhead
14 above the atmosphere they could create an effect that was
15 very similar.

16 Actually, the Soviet Union did their testing over
17 their own land mass, over Kazakhstan. So as you can
18 imagine, they had some very dramatic effects.

19 Since that time, what has happened is that our
20 Electric Grid has become many orders of magnitude more
21 sensitive than it was during the times of those early tests.
22 The consequence of that of course, I think as most people
23 here know, in the United States and in the Soviet Union, and
24 eventually in other countries as well, certainly here in the
25 U.S., many billions of dollars, hundreds of billions of

1 dollars were spent on this subject, protecting U.S. weapons
2 systems against such threats.

3 And in fact what eventually happened is there
4 became a profession in its own right, EMP Protection. Now
5 where are we today? Where do we go from here?

6 I thought it might be useful to step up and try
7 to take a very high-level perspective here. What will it
8 take to solve this problem? And I think just to introduce
9 this idea, whenever you deal with a predicted crisis there's
10 always two kinds of approaches. You can either be proactive
11 or reactive.

12 And in the political world where decisions are
13 made, it is almost always easier to simply wait. Once
14 disaster strikes, it brings with it the energy and urgency
15 to drive a massive recovery. Recovery is the easy choice.
16 In the real world of course, recovery from a major disaster
17 is complex, difficult, and expensive. In the real world, it
18 is always easier to be proactive. Prevention is easier.

19 So I would say this: EMP is a game changer. If
20 we don't learn to merge these two worlds, life as we know it
21 will be over. We have built all the infrastructures that
22 support our lives and our society on the same vulnerable
23 electric foundation. If we don't protect this foundation
24 and it breaks, our lives and our society will be shattered.
25 This time, recovery will not be possible.

1 The next severe space weather event, when it
2 comes, if we have not protected the Electric Grid, will
3 destroy between 300 and 1,000 transformers. That will leave
4 approximately 130 million people without power. And I think
5 it's important to be clear here. If either natural or
6 malicious EMP destroys or disables a substantial portion of
7 the U.S. Electric Grid, replacement of most of the
8 transformers will take up to 10 years or longer.

9 We cannot survive even weeks without the Electric
10 Grid, and without the food, the water, the transportation,
11 communication, medical care, and all of the other
12 infrastructures that depend on it.

13 In the entire history of the United States, I
14 believe this situation is completely unprecedented. And I
15 believe that's the reason why Congressman Franks actually
16 came this morning to speak. We have at this point two
17 Congressional Commissions, the Department of Energy, the
18 Department of Homeland Security, NASA, the National Academy
19 of Sciences, and FERC all now predicting a disaster of
20 breath-taking proportions. And unless the Pentagon, the
21 former Soviet Union, and all of these government agencies
22 got this wrong, if we do not take basic steps to protect
23 ourselves in time, it will be the end of our society as we
24 have come to know it.

25 Now let me be very specific. Based on the work

1 of six different U.S. Government agencies, vulnerabilities
2 of our electric infrastructure have made natural and
3 malicious EMP an existential threat.

4 Nations that prepare in advance will survive
5 without catastrophic destruction. Nations that do not, will
6 not.

7 On a more positive note, I am happy to report
8 that the United States is no longer alone in dealing with
9 this in addressing these issues. The work that was done
10 here in the United States really over the last five or six
11 decades, but especially in the last 10 years, on
12 infrastructures is beginning to have international impact.
13 And as a result, for example, the United Kingdom has now
14 built concerns and efforts to address severe electromagnetic
15 threats into their basic new security plan, and in fact the
16 new national security strategy that has been published by
17 the new government in the United Kingdom now includes severe
18 space weather and severe electromagnetic threats.

19 The context in which that occurred was in the
20 United Kingdom. In London there was a summit meeting that
21 occurred on September 20th. The secretary of state for
22 defense in the United Kingdom spoke, and this has kicked off
23 a new international framework which will now continue into a
24 summit meeting that will occur on April 11th this year in
25 Washington, D.C.

1 I think that may be an opportunity to begin
2 transferring some of the information. There were several
3 discussions this morning, several comments about the need to
4 begin providing some of the emerging threat information to
5 private industry. And I think, although this is a
6 government summit, there will be provision for industry to
7 be involved.

8 So I would like to finish with just a few words
9 on the practical aspects of infrastructure protection
10 against this threat, or this set of threats. The process
11 will certainly require close cooperation between government
12 and industry, there's no question, as everything we've
13 talked about today.

14 Beyond that, all the different government
15 stakeholders and regulators. There will be specific
16 hardware that can be implemented to deal with part of this
17 problem, including blocking devices to put on ground lines
18 of transformers. But in addition to that, there will be
19 training programs that will be necessary to help make it
20 possible for existing teams at energy providers to know what
21 can be done to protect their facilities and their systems.

22 The process will likely begin with prototyping
23 and testing, and then move on to phased prioritized
24 implementation. But with all the work that has been done,
25 we can now begin defining that process, and it is unlikely

1 to be more than cents per kilowatt hour.

2 One last thing I think that should be said. I
3 said at the beginning that in the political world recovery
4 almost always trumps prevention. This is not true in
5 private industry. Private industry, in order to be
6 profitable, in order to be reliable, inevitably finds ways
7 to find experts who can predict events in advance and takes
8 those into account in their work plan and in their business.

9 And I think there is a tremendous opportunity for
10 private industry here in the United States which really has
11 become a model to the world in its inventiveness and the
12 reliability of the systems that have been established to
13 take this on as an important issue. And I think we saw that
14 in some of the comments from the panel this morning,
15 discussions of anticipating and preventing known risks is
16 business as usual in the power industry already in looking
17 for guidance and help with emerging threats.

18 So with that comment, I would like to thank the
19 Commission once again.

20 COMMISSIONER LaFLEUR: Thanks very much, Avi, and
21 I should have thanked you also. I don't know whether you
22 came from Israel or Los Angeles, but I know you came a long
23 way to be here, and thank you for your championship.

24 Mr. Litzinger, whether on that or another
25 emerging threat, we look forward to your comments.

1 MR. LITZINGER: First of all, I would like to
2 thank the Commission for holding this conference on
3 reliability issues, and also for inviting me to speak.

4 Our company shares what I know is your commitment
5 and the industry's commitment to reliability for our
6 customers. My remarks today focus on the emerging
7 challenges to the reliability of the Bulk-Power System that
8 we see we will face in the next decade. I will highlight
9 four:

10 The need for holistic regulation;

11 The integration of significant penetration levels
12 of renewable resources;

13 The cyber security issues posed by deployment of
14 the Smart Grid; and

15 Wide-area situational awareness.

16 I will cut my remarks a little short, and then I
17 will add a couple of comments on the EMP issue as well.

18 With regard to holistic regulation, I will use
19 potential EPA regulations in an illustrative manner to touch
20 on that key issue.

21 There are many environmental regulations that are
22 out there that pose potential reliability impacts on the
23 Bulk-Power System. First and foremost, a concern for us is
24 Section 316(b) of the Clean Water Act, which could mandate
25 cooling towers. And then we also recognize, though not as

1 big of an issue in California, the Clean Air Transport Rule,
2 the maximum available control technology rule for hazardous
3 air pollutants and coal ash designations.

4 As we recognize, these can potentially change the
5 fuel mix. And any time you're changing the fuel or the
6 resource mix, that can have an impact on grid reliability.
7 There is a wide range of variability on these regulations,
8 and our concern is that they're acted upon in a piecemeal
9 fashion.

10 A good example of this is, as California examines
11 the one-through cooling technologies, it could potentially
12 shut down a significant portion of gas generation, which
13 we're going to need even more so now that we are faced with
14 the integration of a large number of renewable resources.
15 And so that I think is one of the clear examples that we
16 think regulators need to holistically assess the collective
17 impacts on the electric grid and the compatibility with
18 other policy objectives, rather than going one regulation at
19 a time.

20 At our company, like you heard from the first
21 panel, we focus on that balance between rates, reliability,
22 and policy. And we encourage FERC to play an essential role
23 in this process, working with the other agencies to ensure
24 that that holistic analysis takes place.

25 Renewable resources are being developed on a

1 large scale in California. We are under a mandate to obtain
2 33 percent of the energy we sell from renewable resources.
3 That presents two major challenges. First, you are all
4 familiar with the need to streamline transmission siting and
5 licensing. And then second, the output of renewable
6 generation is often variable, and that will require large-
7 scale investment in devices to stabilize voltage, improve
8 ride-through capability, and also the importance of backup
9 resources to match the variable output with the variable
10 load. These can include fossil generation and energy
11 storage and demand response programs.

12 Again, we need to coordinate all of this through
13 the policy-making process. We also see technology as a key
14 player. And we are looking to using Smart Grid technologies
15 to help us be able to deliver more of that renewable energy
16 to our customers with improved reliability.

17 With Smart Grid, we are greatly expanding the
18 communications between intelligent devices, and this
19 increased reliance puts ever more focus on the important
20 area of cyber physical security as well as data privacy
21 threats.

22 We encourage continued development of the SIPs
23 standards to help us in this regard. We would also note,
24 because the cyber threats are sophisticated and rapidly
25 evolving, there is no single technology or set of standards

1 that can guarantee our response. And so we encourage that
2 policies be flexible and adaptive.

3 With regards to situational awareness, we think
4 technology again will help us and we are actively doing work
5 with the Phaser Measurement Units to improve wide-area
6 monitoring and wide-area control to aid with the broader
7 interconnection issues.

8 On EMP, I will touch on that. Our focus is
9 primarily on the natural. Our view is, the malicious that
10 was mentioned earlier, the industry is going to need the
11 help of other agencies such as Homeland Security, or
12 Defense to aid us in that. But with regards to natural, it
13 is real. There have been events recently even in California
14 where it is less susceptible to those types of events.

15 We have had a transformer hum in 1991 as a result
16 of a solar flare. So we are sensitive to it. We are
17 participating in the NERC task forces on that issue. And
18 this year we are going to be examining what we can do with
19 regards to shielding and installing the by-passable
20 capacitors on the grounding legs of our transformers in
21 response. Again, keeping that balance between rates,
22 reliability, and policy in mind.

23 Thank you.

24 COMMISSIONER LaFLEUR: Thank you very much. Mr.
25 Wright?

1 MR. WRIGHT: Thank you for the invitation to
2 share my views today. I was here in July, and I've
3 described the need for at least what I thought was a need
4 for a more collaborative approach from a FERC, NERC, and BES
5 participants, and offered you some suggestions.

6 I will say that since that time we're encouraged
7 by the progress. We have seen a fair amount of good work
8 done by FERC and NERC in particular, but we also believe
9 that much more needs to be done.

10 With the time I have today I am going to focus on
11 three issues that I raised in July: Setting priorities;
12 encouraging excellence; and improving communication.

13 I believe this responds to the Chairman's
14 question earlier about what are the highest priority things
15 that we should be focused on.

16 From our perspective, the area that most cries
17 out for attention is defining a framework that will allow
18 priorities to be set in a more transparent manner. Current
19 discussion tends to be about the specifics of standards and
20 the occasional focus on high consequence events through
21 things like the NERC Alerts.

22 Yet there has always been, and there will always
23 be, tradeoffs between risks to reliability and cost. We
24 lack a conceptual framework that allows a cogent comparison
25 of the level of cost and reliability risk that would be

1 extremely useful for establishing priorities.

2 Such a conceptual framework would also aid in
3 engaging the public in a discussion about the level of
4 reliability that they are willing to pay for.

5 It sometimes seems that everything that could
6 create a reliability event is a priority when customers
7 would, we think, be better served if we used explicit
8 criteria to identify and then focus on the highest risk,
9 highest consequence events first. But we must have an
10 evaluation methodology that allows us to make such a
11 comparison.

12 Lacking such a methodology, there are less
13 sophisticated methods which could be better utilized to
14 guide us for now. For example, simple evaluations to
15 identify matters that create a high risk of a cascading
16 outage would help to separate wheat from chafe for
17 establishing near-term priorities.

18 This reflects the facts that drove the law: that
19 an event on a neighboring system can have devastating
20 reliability consequences for a party that is not in control
21 of its destiny.

22 The translation of a known problem, the hurried
23 adoption of vague standards a few years ago, into more
24 specific standards is another area where progress is being
25 made but much more is needed.

1 Even with expert help and good intentions, BES
2 participants continue to find themselves attempting to
3 interpret the standards and can find themselves at risk of
4 sanctionable determinations despite the best of intentions.

5 This problem is exacerbated by a lack of
6 priorities within the standards relating to level of risk to
7 reliability, leaving audit teams likely to pursue any and
8 all perceived violations with equal vigor.

9 Let me now turn to the establishment of an
10 institutional structure that encourages this drive for
11 excellence rather than mere compliance with standards
12 culture that has been discussed earlier today.

13 I think due to industry's interest in this
14 opportunity and the encouragement of the FERC Chair, the
15 North American Transmission Forum is now up to participation
16 representing about 85 percent of the peak load within its
17 footprint. But there are very significant issues on the
18 horizon as the Forum is now formulating its strategic plan.

19 Addressing the issues of the Forum's scope and
20 function, and particularly its relationship with FERC and
21 NERC, will be critical to the ultimate success of the Forum.
22 I cannot understate the importance of the need for a
23 dialogue that assures FERC, NERC, and the Forum are on the
24 same page.

25 For example, standards can be developed in a

1 manner that makes it more likely the Forum will be
2 successful in its goal of striving for excellence, or vice
3 versa. And, Commissioner LaFleur, I think that gets to the
4 specific question that you asked earlier.

5 With respect to communications, we would note
6 that there is a greater engagement of FERC with NERC, and
7 vice versa, and this technical forum is also an example of
8 improved dialogue that's occurred since last July.

9 And while there has been progress since the July
10 conference, the trust level among FERC, NERC, and BES
11 participants we believe continues to make it difficult to
12 get to a good public policy outcome. An extraordinary
13 amount of collaboration, comity, communication, and trust
14 among regulators, quasi-regulators, and industry is key to
15 establishing the unique regulatory structure put in place by
16 the Congress.

17 Today there appears to be an inordinate focus on
18 who will be held accountable for a reliability event, rather
19 than a sense of working collaboratively and progressively to
20 improve reliability in a cost-effective fashion.

21 Getting to the right culture is going to take a
22 commitment from the top. We believe something out of the
23 ordinary will be needed to successfully pull this off. We
24 have filed a proposal with the Commission suggesting a forum
25 to increase strategic, high-level communication. We would

1 not argue that this specific proposal is the perfect answer
2 and would be pleased to work to refine the proposal with any
3 party that is interested in improving collaboration,
4 communication, and trust.

5 I am certainly prepared to discuss this further
6 as part of the third panel, or wherever it would be
7 appropriate today.

8 Let me just say that we all share responsibility
9 for a reliable electric power system, and we must work
10 together to find an integrated strategic solution to these
11 critical public policy issues. And again, I really welcome
12 the opportunity to be here today, and I applaud you for
13 continuing this dialogue.

14 If I could add one other quick comment, I just
15 want to apologize because it was my cell phone that went off
16 earlier. So I apologize to the Commission and to John
17 Anderson because it went off during his presentation, and I
18 will just tell you that I think it may be the cell phone
19 gods exacting retribution because I've chaired a lot of
20 public meetings and certainly felt an intolerance for cell
21 phones going off in the middle of meetings I was chairing.

22 So my retribution has now been served. Thank
23 you.

24 (Laughter.)

25 COMMISSIONER LaFLEUR: Well thank you, very much.

1 Mr. Whitley?

2 MR. WHITLEY: Thank you, Commissioner LaFleur,
3 and I want to thank the Commission for the opportunity to be
4 here today to discuss the important issues before us here.

5 Reliability is the core of what we do at the New
6 York ISO, and all of the ISOs, and we welcome the
7 opportunity to discuss emerging issues that we see that the
8 FERC, the NERC, the Regional Reliability Organizations, the
9 ISOs, the other reliability authorities, asset owners, and
10 other stakeholders can work on collectively to identify and
11 address.

12 This is really an exciting time in our industry.
13 How we address these many issues before us, while
14 maintaining our top reliability priorities, will require a
15 commitment for all of us to continue to communicate well and
16 learn from each other. And today's forum is a great way to
17 do that.

18 I certainly want to echo and say that I
19 appreciate the comments provided by the first panel today.
20 I think you saw really a common theme by what folks had to
21 say, and we certainly support the NERC's efforts to
22 establish this prioritization process that they're doing
23 right now. We think that is fundamentally important, and we
24 totally support it.

25 Now getting to the issues that keep me up at

1 night as I look forward down the road. We already have a
2 lot of wind resources in New York, about 1300 megawatts, and
3 another 7000 megawatts in our queue. So the integration of
4 intermittent resources, energy storage technologies, and the
5 role of demand response are challenges that the NYISO is
6 addressing today and will continue to address as technology
7 is developed.

8 The NYISO's competitive market structures are
9 designed to encourage innovation. We have seen this happen
10 in the robustness of our demand response programs which have
11 developed really tremendously over the past 8 to 10 years.

12 Also the development of new technologies such as
13 the flywheel projects on the battery storage projects that
14 are being put on our system today. And internally with the
15 innovative integration of wind generation and our own
16 dispatch process, using the software that we have.

17 And then tomorrow, looking at integration of
18 electric vehicles while meeting our requirements to balance
19 control area performance.

20 These are the issues that are coming right at us.
21 In particular, we are concerned with the ability of
22 balancing areas to integrate wind and these other
23 technologies while maintaining existing and improved control
24 performance and frequency responsiveness.

25 In New York, like California and many other

1 regions of the country, we also see challenges from
2 potential unit retirements and aging infrastructure. In New
3 York we're closely monitoring the issue of nuclear
4 relicensing and emerging environmental regulations and how
5 those both impact operation of the system, but also planning
6 the system for the future.

7 We are doing a 20-year study of New York today of
8 the infrastructure. By the middle to the end of this study
9 most of the transmission assets in New York will be nearing
10 90 years of age. So pretty much you're looking at
11 replacement of the grid. And so we're working with the
12 transmission owners to see how can we do that wisely? How
13 can we look for ways to upgrade the capability of that grid
14 on existing right-of-ways to integrate the wind on our
15 system to the load centers and eliminate congestion on the
16 system, while always maintaining reliability.

17 Current critical infrastructure protection
18 standards form a good basis for cyber protection programs,
19 but like other speakers have said this alone isn't adequate.
20 This is a dynamic area, and we need to be fast on our feet
21 in communicating emerging requirements and our response to
22 those. I think the industry has done a really good job on
23 that to date.

24 How Smart Grid applications impact residential
25 and commercial consumer behavior will have to be closely

1 analyzed as those technologies evolve. We need to develop
2 better tools to understand and accurately forecast these
3 behaviors as we modify our planning and operating processes.
4 Certainly I believe that all resources that serve a
5 reliability function must comply with appropriate standards,
6 the appropriate standards. So that means demand response
7 and other assets that we begin to use to balance the system
8 need to meet certain standards.

9 We support the work that NERC, FERC, and the
10 industry have done in the areas we have discussed today.
11 While we don't see emerging concerns that aren't being
12 addressed, we do encourage all the parties to continue to
13 work together to coordinate the efforts to identify threats
14 to reliability and promote best practices.

15 The Events Analysis Working Group is a very
16 positive attribute that we have at NERC to do that sort of
17 thing, and we are very encouraged by the work of the North
18 American Transmission Forum, as discussed today, that's
19 providing a much needed service here.

20 So, bottom line, those are the things that are
21 keeping me up at night. I really appreciate the opportunity
22 to participate and look forward to working together with you
23 all to improve reliability. Thank you.

24 COMMISSIONER LaFLEUR: Thank you very much.

25 Mr. Tymofichuk?

1 MR. TYMOFICHUK: Good afternoon, Chairman
2 Wellinghoff, Commissioners, staff, and all:

3 Some of my message has been stated many times
4 over today, so please bear with me. My name is Ed
5 Tymofichuk and I am Vice President of Transmission at
6 Manitoba Hydro.

7 Manitoba Hydro is a Canadian Crown Corporation
8 utility that owns and operates electric generation, mostly
9 hydro, transmission, and distribution facilities in
10 Manitoba. I am appearing today on behalf of the Canadian
11 Electricity Association whose members account for most of
12 Canada's generating capacity and high-voltage transmission.

13 I am the outgoing Chairman of the NERC Member
14 Representatives Committee, and currently the Board Chair for
15 the Midwest Reliability Organization.

16 In February, 2010, if you had asked how I
17 pictured my term at the helm of the MRC, I could not have
18 predicted the significant developments which were to follow.
19 However, I am encouraged by the progress made since last
20 March in strengthening cooperation and collaboration in the
21 setting of and addressing the most critical priorities for
22 the Bulk-Power Electric System.

23 I am also encouraged by FERC continuing to
24 facilitate this kind of discussion. These discussions help
25 build respect and reinforce trust within the reliability

1 community. I thank the Commission for ensuring that the
2 Canadian industry is represented at this forum, as the
3 integration of the North American Grid means that
4 reliability and security cannot be achieved in isolation.

5 Moreover, CEA welcomes FERC's reaffirmation in a
6 September 2010 Order of its commitment to work together with
7 governmental authorities in Canada and Mexico so that the
8 ERO can truly operate on an international basis.

9 CEA remains supportive of the standards setting
10 model envisioned in the Federal Power Act and in the
11 agreements that NERC has entered into with governmental
12 authorities in Canada. At the heart of these frameworks is
13 the key principle of active, effective participation by
14 North American industry experts and stakeholders in the
15 standards' process.

16 Canadian governmental authorities rely heavily on
17 this model in accepting NERC's standards. We must always
18 look to improve the timeliness and flexibility of the
19 process, and NERC continues to make good progress with the
20 support of FERC, authorities in Canada, and industry.

21 NERC's two recent examples of a quality review
22 process and the forthcoming standards prioritization tool
23 are excellent advancements. But CEA remains concerned at
24 FERC's hands-on approach, which we believe impedes the
25 ability of NERC and industry to address reliability

1 priorities in the most effective manner.

2 More standards is not a measure of more
3 reliability. Instead, we must focus on core standards that
4 are most critical to reliability. Solutions should be
5 developed in a collaborative and coordinated manner, but
6 also in deference to the established principles behind
7 standards development approval.

8 We encourage forbearance by FERC to be a pillar
9 in this oversight role. While CEA strongly supports NERC,
10 we recognize that many challenges remain. I would like to
11 provide a quick Canadian perspective on several of these
12 emerging issues.

13 As others have noted, integrating renewable
14 resources and Smart Grid technologies will present
15 challenges over the coming decade and beyond. Utilities in
16 Canada continue to invest in addressing these challenges.

17 For example, many CEA members are working to
18 improve the accuracy of forecasting for intermittent
19 generation, and many remain proactive in supporting the
20 integration of national and international standardization on
21 Smart Grid technology.

22 Other challenges going forward include obtaining
23 regulatory approvals for new rights-of-way to build
24 infrastructure necessary for reliability, as well as
25 training a future workforce to operate and maintain a much

1 more sophisticated grid.

2 Cyber security is another issue. While strong
3 SIP standards are important for ensuring the cyber security
4 of the grid, robust protection will entail a host of other
5 requirements. For example, the sharing of actionable
6 information between government and industry regarding
7 imminent cyber threats is critical.

8 Because our grid is international, information
9 sharing and close coordination must occur between government
10 authorities in Canada and the U.S. Along with robust SIPs
11 standards, this will go a long way in strengthening
12 protection against cyber threats and vulnerabilities.

13 While threats from deliberate electromagnetic
14 pulse attacks raise complex questions, CEA members are not
15 certain that such threats represent a reliability concern,
16 per se, given that an EMP attack could inflict damage well
17 beyond the scope of electric reliability.

18 Industry needs government to take leadership and
19 to provide guidance. The consensus, and an international
20 one at that, needs to be reached on the tradeoffs in making
21 massive investments to achieve system resilience against an
22 EMP attack and addressing other pressing priorities.

23 I would distinguish this aspect of EMP from
24 geomagnetic disturbances whose effects are seen in the
25 reliability domain. On this, I echo other panelists

1 thoughts on NERC's critical infrastructure strategic
2 roadmap, and concur that it represents an aggressive plan to
3 understand GMD risks and to develop effective solutions to
4 manage them.

5 I applaud NERC's recent Severe Impact Resiliency
6 Task Force. I believe it will pay big dividends.

7 Finally, with respect to other emerging issues,
8 CEA would draw attention to the long-term potential effects
9 of climate change. Mitigating the future effects of
10 shifting weather patterns on factors ranging from lake
11 temperatures to annual rainfalls and water levels may be a
12 significant challenge for many Canadian utilities. We
13 believe it may soon be necessary to begin assessing the
14 potential reliability impacts of climate change itself.

15 In conclusion, CEA looks forward to continuing to
16 work with NERC, FERC, Canadian regulators and authorities,
17 and other industry stakeholders in pursuing mutually
18 beneficial solutions for addressing risks and achieving
19 priority goals. A good dose of discipline will be necessary
20 to stay the course, and continued communication and
21 collaboration should be viewed like mortar between bricks,
22 which provide strength and confidence.

23 I thank the Commission for its attention and
24 would be happy to answer any questions.

25 COMMISSIONER LaFLEUR: Thank you, Mr. Tymofichuk.

1 Back to Mr. Cauley.

2 MR. CAULEY: Thank you, Commissioner LaFleur.

3 As I mentioned this morning on the first panel,
4 there are major distinctions between conventional risks to
5 the Bulk-Power System where we can measure actual
6 performance and determine opportunities to improve, and
7 emerging risks where we are left to imagine scenarios that
8 might occur and prepare to avoid or mitigate the
9 consequences.

10 I would like to discuss several of the categories
11 of such emerging risks, and how I believe they should be
12 prioritized.

13 The first category, and the one I assign the
14 greatest priority to, among the emerging risks includes
15 coordinated physical and cyber attacks intended to disable
16 elements of the power grid or deny electric service to
17 specific targets such as government or business centers,
18 military installations, and other infrastructures.

19 These threats differ from conventional risks in
20 that they result from intentional action by adversaries and
21 are not simply random failures or acts of Nature.

22 It is difficult to address such risks through a
23 traditional regulatory model that relies mainly on mandatory
24 standards, regulations, and directives. The defensive
25 barriers mandated by our standards will make it more

1 difficult for those seeking to cause harm to the grid,
2 frustrating ordinary hackers and copper thieves, but may not
3 be completely effective in stopping the determined efforts
4 of adaptable adversaries supported by nation states and more
5 sophisticated terrorist organizations.

6 The most effective approach against such
7 adversaries is to apply resiliency principles as outlined in
8 the National Infrastructure Advisory Council, or NIAC,
9 Report on the grid delivered to the White House on October
10 2010. I was fortunate to serve on that Council, along with
11 a number of industry CEOs. Resiliency requires proactive
12 readiness for whatever may come our way.

13 It includes robustness--some would say
14 redundancy; the ability to minimize consequences in real
15 time; the ability to restore essential services; and the
16 ability to adapt and learn.

17 Examples of the NIAC team's recommendations
18 include:

19 A national response plan that clarifies the roles
20 and responsibilities between government and industry;

21 Improving sharing of actionable information by
22 government regarding threats and vulnerabilities;

23 Cost recovery for security investments that are
24 driven by national policy;

25 And a strategy on spare equipment with long lead

1 times such as electric power transformers.

2 NERC is moving forward with a number of actions
3 to complement our mandatory SIPs standards and provide
4 enhanced resilience for the grid, including a joint
5 partnership announced last week with the Department of
6 Energy and NIST to develop comprehensive cyber security risk
7 management guidelines for the entire grid from the meter to
8 the Bulk-Power System.

9 Continuing our proactive outreach with government
10 agencies to translate classified threat information into
11 unclassified actionable information for industry, such as
12 Alerts we issued in 2010 on Aurora mitigation, Stuxnet
13 malware, and a VPN tunneling vulnerability.

14 In 2010 we successfully piloted a program to
15 conduct on-site cyber security sufficiency reviews and will
16 continue that program in 2011.

17 We are developing a North American Cyber Security
18 Exercise to prepare for and test a national response plan.
19 We are working with the Department of Defense to assess
20 worst-case scenarios and ensure that the essential
21 requirements for national security can be addressed.

22 We are working with vendors and industry to
23 demonstrate enhanced physical security systems to be applied
24 at our substations and power plants.

25 Let me turn now to a second category of emerging

1 risks which has been discussed today that I also consider
2 urgent because of potential consequences to physically
3 damaging power system equipment and controls, that of
4 geomagnetic disturbances caused by solar flares.

5 We will be convening, NERC will be convening a
6 panel of industry experts at a conference in April this year
7 to validate some near-term cost-effective actions that we
8 can take to better prepare the North American Grid for
9 large-scale interference with the Earth's magnetic field.
10 We will be leveraging on our experience mitigation
11 strategies completed in Canada and the Northeast to mitigate
12 these risks after the 1989 Quebec disturbance.

13 NERC will issue an alert with a specific set of
14 near-term actions and a timetable for responses.

15 I would digress from my prepared remarks just
16 briefly after Congressman Franks' comments this morning, and
17 some of the other panelists talking about other aspects of
18 EMP, some of the intentional aspects. I think they raise
19 important questions for us.

20 In terms of a nuclear blast at 400 kilometers
21 over our homeland, it raises really questions about the
22 roles and responsibilities between government and industry.
23 I don't believe that that is a defensible threat from a
24 civil industry perspective.

25 The other intentional EMP event, such as

1 interference at local substations and so on, could be raised
2 as a reasonable credible threat. But then again it raises
3 the question of priorities relative to cyber security and
4 physical attacks. I think physical attacks, in my view, are
5 much more likely and promising. If I was going to go out
6 and do some serious damage, that's the approach that I would
7 use, so I think it raises questions about priorities.

8 I think certainly the GMD, the solar flare, issue
9 is important and ahead of us, but I think we need to better
10 understand the other issues. So I will close there and look
11 forward to your questions.

12 COMMISSIONER LaFLEUR: Thank you, Gerry. Mr.
13 Anderson?

14 MR. JOHN Q. ANDERSON: Thank you, Commissioner.

15 Well there's no doubt that from a NERC Board
16 point of view we are looking out at the 10-year horizon.
17 And over that horizon, the North American electric industry
18 will face a number of significant emerging reliability
19 issues. We're sure of that.

20 Many of these issues will stem from changes to
21 our bulk electric and distribution system that provide many
22 potential benefits to users, owners, and operators. But
23 they change the system in ways that will require new
24 reliability thinking, standards, and analysis.

25 We also face emerging issues that aren't new but

1 have taken on newly elevated significance as the risks and
2 consequences are deemed to be higher than previously.
3 Geomagnetic disturbances is an example of that.

4 Now the NERC Board strives to provide a balanced
5 policy approach to guide NERC management and industry
6 participants. Considering the level of risk that the new
7 issues represent, gauging the speed of emergence for the new
8 risks, and setting the general criteria to be used in
9 developing the options for ensuring reliability in the face
10 of these emerging issues. But in order to provide the right
11 level and direction of policy guidance, the emerging issues
12 need to be well researched and understood.

13 The NERC Board each year directs that a long-term
14 reliability assessment, including emerging issues, be
15 developed. For example, the following emerging issues were
16 identified in NERC's 2010 long-term reliability assessment:
17 A changing resource mix; integration of new technologies;
18 and preparedness for high-impact, low frequency events.

19 At the Board level we also direct that more
20 detailed and specific assessments be developed for the
21 highest risk issue areas. Each of the three areas I just
22 mentioned has been the subject of a special NERC study,
23 reviewed and approved by the Board to give a factual,
24 analytical basis for addressing emerging issues that will
25 impact reliability. An example is NERC's report on high-

1 impact, low frequency event risk to the North American Bulk-
2 Power System.

3 Although there is a wide range of threats labeled
4 "high impact/low frequency," the greatest effort is being
5 directed to possible events that could debilitate the Bulk-
6 Power System for extended periods, such as widespread
7 coordinated physical cyber attacks or geomagnetic
8 disturbances.

9 From a Board level, we strongly support not only
10 the effort but the timing for addressing the GMD issue. On
11 the broader topic of cyber security, the Board approved the
12 Critical Infrastructure Strategic Roadmap and the Critical
13 Infrastructure Strategic Initiatives Coordinated Action
14 Plan.

15 The Roadmap gives a prioritized framework to
16 develop protective and mitigating solutions that will
17 enhance the resilience of the Bulk-Power System. The Action
18 Plan details the technical committee action to address these
19 priorities.

20 In summary, the NERC Board is actively providing
21 guidance and support for the many ways in which NERC must
22 react to emerging issues. We believe that the ongoing
23 dialogue we have with the Commission and with our Canadian
24 counterparts is greatly assisting the entire effort to focus
25 on the right emerging issues.

1 Through these dialogue, we believe that practical
2 and timely new standards or other approaches can be
3 developed in time to maintain reliability as the impacts
4 from the emerging issues become real.

5 Thank you.

6 COMMISSIONER LaFLEUR: Thank you, Mr. Anderson.
7 I will now turn to my colleagues for questions and
8 discussions on any of the topics that were raised by this
9 panel. Mr. Chairman?

10 CHAIRMAN WELLINGHOFF: Thank you, Commissioner
11 LaFleur. Now I get to apologize for my cell phone.

12 (Laughter.)

13 CHAIRMAN WELLINGHOFF: I had it off in the
14 morning. I don't know how it got on, but, Mr. Tymofichuk, I
15 apologize during your presentation that that went off.

16 Let me see if I can first understand something,
17 because I heard the Congressman's presentation this morning,
18 and I understand he was I guess primarily focusing on this
19 event of a high atmosphere detonation that could cause an
20 EMP event.

21 But my understanding--and this is what I want to
22 get from the panel here--is that the same type of effect
23 could be produced by these geomagnetic disturbances,
24 depending again--they could be equally widespread depending
25 on how big the geomagnetic disturbance is versus I guess how

1 big the bomb is. I mean, am I wrong? Are they identical?
2 I got some sense that there seems to be some sentiment on
3 the panel that they're different things that should be
4 treated and addressed differently.

5 So if I could have whoever would like to address
6 that and clarify that for me? Avi?

7 MR. SCHNURR: Yes, thank you, Chairman.

8 There are similarities and differences. So if
9 there is a nuclear EMP, a malicious nuclear EMP attack,
10 there are three different kinds of pulses that emerge. The
11 two that are most relevant people refer to as E-1 and E-3.
12 E-1 is a very prompt, very, very fast pulse, a very high
13 spike. E-3 is a much longer term pulse.

14 The E-3 pulse is basically the same kind of
15 ground-induced currents that you see from a geomagnetic
16 disturbance. So in this regard, what you could say is,
17 basically half of the problem from a malicious attack would
18 be resolved by anything that's done to resolve the natural
19 solar event.

20 The other half of the attack, which would be this
21 very prompt, very sudden pulse, is different. Incidentally,
22 it's not only a nuclear EMP attack. Non-nuclear devices,
23 circuits which are designed to do this, which are available
24 that are actually catalogue items--I could show you
25 pictures; people sell them for various reasons, testing and

1 so forth--could do something similar.

2 But this is a very prompt pulse. And for that, I
3 think mostly what would have to be done is training.
4 Because you would have to go through and power substations,
5 and there would have to be a plan for how to minimize the
6 impact on a substation by making some changes in the
7 configuration. So there would be different approaches to
8 deal with these two different effects.

9 CHAIRMAN WELLINGHOFF: Okay. Anyone else on the
10 panel have any comment on that?

11 MR. CAULEY: Mr. Chairman, I think there are, as
12 was mentioned, some similarities in the effects. And I
13 think that's why we think there's also benefit by focusing
14 on the phenomenon that we know will occur from time to time
15 to varying degrees, which is the solar magnetic
16 disturbances. Because taking actions to protect transformer
17 equipment and some of the control systems will get inherent
18 benefit for some of the malicious types of attacks.

19 So I don't discredit the possibility of these
20 other attacks taking place. I mean the nuclear blast one, I
21 wake up every day and assume there's not going to be a
22 nuclear blast in the United States, and I hope that doesn't
23 happen in my lifetime. So we have to say what is the role
24 of government to deal with that kind of an attack? And if
25 that happens, we're in a worse situation.

1 But I think pragmatically there will be benefit I
2 think from taking an aggressive position on the solar
3 magnetic disturbance, to harden our controls, and harden the
4 transformers and equipment that might be susceptible, to
5 have some ancillary benefits on some of the more malicious
6 attacks.

7 CHAIRMAN WELLINGHOFF: And, Gerry, I got the
8 impression from your testimony, and I don't disagree with
9 it, I think you are correct here, but at least in the cyber
10 attack side you seem to indicate that the regulatory model
11 is not necessarily the best one to address those issues.
12 And I assume you'd probably have the same position with
13 respect to the EMP?

14 MR. CAULEY: No, I guess, even as I was thinking
15 about those words I was fearful that it might come across
16 the wrong way. So I'm not saying that the regulatory model
17 is not helpful. I think the standards provide a solid base,
18 and they give us a lot of benefit.

19 But the problem is, it's a moving adversary.
20 It's a changing and adapting adversary, and we can keep
21 coming out with better and better standards, but as long as
22 we're sitting there taking the shots, that's what I meant by
23 the limitation.

24 So what I meant was, it doesn't take us all the
25 way. And I think to get the rest of the way we need to

1 operationalize our response. We need to understand what the
2 enemy is thinking and doing, what kind of threats are
3 emerging on a month-to-month basis, how do we prepare if we
4 find new information? How do we get it out to the industry?

5 So it was more than the traditional operating and
6 planning standards where we're talking about sort of a
7 static situation. We have to have this additional layer of
8 operational response capability that goes above the
9 standard.

10 So I just meant that they're limited in how far
11 they can take us, not that they are inadequate.

12 CHAIRMAN WELLINGHOFF: Go ahead, Steve.

13 MR. WHITLEY: I certainly agree with Gerry's
14 comments there about government's role and the industry's
15 role. We do things in the control room when we know things
16 are coming at us to posture the system to get ready for
17 them. And solar magnetic disturbances are one of those.
18 We're exposed to those in the Northeast. We have procedures
19 to basically go off of economic dispatch and unload the
20 transformers by picking up generation on the low side of all
21 the transformers across the system to have more margin.

22 When we have a big thunderstorm coming in New
23 York City, we do a very similar thing to unload the system
24 so that there's more local resources and have more margin.
25 So we can do those things for something that we can have a

1 forecast and information that things are coming.

2 But on the other area, on these terrorist kind of
3 attacks, that's a different story and I think some of the
4 techniques will be helpful, but I think we need guidance
5 from the government on how to protect beyond that.

6 CHAIRMAN WELLINGHOFF: In that regard, as to the
7 role of industry and the role of government and the
8 respective ways to address these issues, I guess I would
9 like to then ask questions of the three asset owners here,
10 Mr. Tymofichuk, Steve Wright, and Mr. Litzinger.

11 What now are you doing beyond either NERC
12 standards or rules in the area of cyber and this EMP in
13 general? And then secondly, how would you see the role of
14 an entity such as the one that's now formed and moving
15 ahead, the North American Transmission Forum, in helping you
16 further be able to address those two issues of cyber and
17 EMP?

18 Mr. Tymofichuk?

19 MR. TYMOFICHUK: Thank you, Mr. Chairman.

20 In Manitoba Hydro we have in our system a two
21 bifold HVDC system that terminates at a Alberta station just
22 outside the City of Winnipeg.

23 Quite a number of years ago we collaborated with
24 the University of Minnesota to actually measure GIC currents
25 in the neutrals of transformers. That was done for a number

1 of years, and has provided a lot of data for research and
2 academics to study and deal with.

3 I don't believe it's being monitored currently
4 but there's no reason that some other collaboration to go
5 back to that and refresh the data and gather new data could
6 happen. Thank you, Mr. Chairman.

7 CHAIRMAN WELLINGHOFF: Mr. Wright?

8 MR. WRIGHT: I think basically at this point what
9 we're trying to do is learn as much as we can from as many
10 people as we can. And so are actively involved in the NERC
11 process on GMP in particular and trying to get as much
12 information from others about what risks are and risk
13 mitigation mechanisms there are.

14 I think the Forum is a great example of it.
15 Because what will happen in that process is there will
16 always be a concern about how far do we go with a standard.
17 We're dealing with a lot of standards coming at us, and a
18 lot of cost. And so there's always this concern about how
19 far are these standards going to go, and how much will it
20 cost us?

21 Whereas the Forum is a more open conversation.
22 It's one in which people are less worried about, well, if we
23 have this conversation, is immediately going to translate
24 into a new standard and a new cost for us? And it's more of
25 what are the right things to do across all the way from

1 protection to resilience strategies that one can adopt.

2 CHAIRMAN WELLINGHOFF: Thank you. Ron?

3 MR. LITZINGER: I think I'd like to emphasize
4 sort of two points, or re-emphasize points made earlier.
5 One is the need to be flexible and agile in these types of
6 situations, set aside sort of operating and technical and
7 engineering concerns, just general business resiliency which
8 at our company we're spending a lot of time on.

9 We realize that you cannot be prescriptive and
10 deal with every situation. Even for the earthquake, which
11 in California we consider ourselves very prepared for, we
12 recognize that you've got to give managers and executives
13 and operators the flexibility to react to the situation as
14 is. And I think there's a lot of analogies carrying over
15 from those natural types of disasters to what we're talking
16 about today.

17 The second point I would like to emphasize is
18 just the need to learn as much from your colleagues as
19 possible and adopt best practices and, you know, sort of rob
20 shamelessly.

21 On the cyber security issue, AEP and Lockheed
22 Martin have the partnership with the Cyber Security
23 Operations Center. And Lockheed Martin was brought in as a
24 partner because they bring a lot of expertise of the defense
25 industry into the cyber security field. And so we are

1 members of that--have joined, and are supporting that effort
2 such that we can learn from it as well.

3 And then with the GMD issue, as I had mentioned
4 earlier, we are actively involved with NERC task forces on
5 that to learn what we can, see what we can do, and just
6 learn as much about, you know, these new areas that come up
7 and challenge us all of the time.

8 And then we also belong to the North American
9 Transmission Forum. We're very supportive of that effort
10 because when we get beyond standards and you go for
11 operational excellence, as you were discussing in the first
12 panel, the fact that NATF has adopted the INPO model, and
13 you look at what INPO has done for the nuclear industry, it
14 is a great model to follow. And that is why we are very
15 engaged in that forum as well.

16 CHAIRMAN WELLINGHOFF: Thank you. Thank you,
17 gentlemen, I appreciate it. That's all the questions I
18 have.

19 COMMISSIONER LaFLEUR: Commissioner Moeller?

20 COMMISSIONER MOELLER: Thank you, Commissioner
21 LaFleur. In the interests of time, I will condense myself
22 to one statement and then one question.

23 The statement is: If there are things that we
24 need to be doing on this general subject of looking forward,
25 let us know. Let the five Commission offices know. It kind

1 of builds on John Norris's question from earlier. But it
2 sees to me that I was quite heartened by a lot of your
3 testimony that you are looking out at the kind of
4 issues--there still are a lot of things to grapple with, but
5 that you are cognizant of them and we will be hearing more
6 about a 10-year outlook, and the immediate threats.

7 The question is a little more challenging. It
8 strikes me that, outside of the cyber and the EMP threats,
9 and Mr. Litzinger hit on it, we've got two sets of issues
10 coming at us. Eight or nine significant rulemakings
11 targeted at fossil fuel plants that primarily hit coal, but
12 as you mentioned I think 20 percent of the baseload capacity
13 in California is at risk through 316(b). That's coming on
14 us.

15 It's probably going to be harder than people at
16 EPA realize to maintain reliability.

17 The second is that it's not insurmountable, but
18 the challenges of variable generation are hitting just about
19 every part of this country, with the exception of the
20 Southeast. You're dealing with it in New York. Steve's
21 dealing with it in my home in the Pacific Northwest.

22 And there are engineering solutions to some of
23 these problems, but I guess what I would like to ask Gerry
24 and John is, is there a proper role for market solutions to
25 some of these problems?

1 It's no secret that we at the Commission
2 considered perhaps creating markets for new types of
3 products that enhance the reliability of the system. And
4 since this world is driven largely by engineers, and those
5 of us who are more economists rather than engineers always
6 try and I think want to make sure that there's an
7 opportunity for market solutions to be considered as well.
8 I would just like your reaction to that, and if the rest of
9 the panel wants to comment, they're welcome to.

10 MR. CAULEY: Thank you, Commissioner Moeller.
11 That was part of the topic I lopped off so I could spend
12 more time on EMP.

13 I think NERC's role is one of assessing the
14 future impacts of the shifting resource mix and integration
15 of renewables and new technologies. And the point I wanted
16 to make was, I think it is just part of our business. This
17 should not be anything that is new, or shocking, or any sort
18 of urgent crisis that's upon us.

19 I just see this as a long-term prospect of
20 integration of new technologies and renewable resources.
21 And that's how we take it. And we've done a number of
22 studies sort of looking forward. If we have some of this,
23 the new resources and technologies, what do we have to do as
24 an industry? What has to be done to prepare that? What
25 plans have to change? How do we deal with reliability

1 issues?

2 I view our role really as two pieces--and then
3 I'll get to your final question. One is, as we change the
4 generation and load mix and its characteristics, we need to
5 make sure that we have it modeled well, we understand it, we
6 know how it behaves, and it fits within our reliability
7 models and we can determine that reliability will continue
8 to be assured.

9 The second thing we need to do as NERC gets more
10 to your question. And I recall back, because I was involved
11 with Open Access, creation of OASIS, and we asked ourselves
12 how do we deal with all these ancillary services, of voltage
13 control, and regulation, and things like that, when we no
14 longer have a bundled control area that's managing all of
15 that sort of internally?

16 And we figured out these definitions of terms of
17 "ancillary services," and we figured out how they could be
18 bought and sold. And I think we're just entering the next
19 frontier for that. So now we have different kinds of
20 resources, different characteristics that we're looking for,
21 and I think the markets will provide the solution. And what
22 we need to do is define the reliability requirements to make
23 that happen. What are the essential services for these new
24 resources? How do we define the terms? And how do we
25 define how to model and measure that?

1 And I think the markets will deliver on those
2 services.

3 MR. JOHN Q. ANDERSON: Commissioner, I think it
4 is a very timely question because we're facing a lot of
5 challenges in introducing things like variable generation
6 in, and there will be a lot of costs associated, and they'll
7 fall one way or the other depending on decisions that are
8 made about the standards.

9 You mentioned economists and engineers. But I
10 think I would also add politicians to that. Because if it
11 were just economists and engineers, we could get to some
12 what you might call logical, or economic--

13 (Laughter.)

14 MR. JOHN Q. ANDERSON: --or technical answer
15 using logic only economists and engineers would decide. But
16 if you put political logic in, then we've got a different
17 logical outcome that will come. And so from a NERC point of
18 view, I think you asked could economics, for example,
19 supplement engineering solutions to handle emerging issues,
20 like let's say variable generation? And I think the answer
21 would definitely be yes, absolutely, economics could.

22 The problem is, if you start introducing
23 economics in and don't consider the political and policy
24 decisions that are basically--ultimately will be taken as a
25 given, you will be off trying to again go toward logic and

1 economists and engineers would get toward.

2 I think that would be very feasible, and in some
3 ways it would be easier and would be more familiar for a lot
4 of the people in the industry who deal with that.

5 What we at NERC try and do is remain very
6 neutral, if you will, on the political or policy questions.
7 So that we--as a Board I try and make sure that we
8 consciously don't let ourselves drift into personal beliefs
9 of Board members, and so forth, so that we're trying to
10 slant toward one answer, or give Gerry guidance that would
11 move it toward one answer that might be influenced by
12 political beliefs. But we really would prefer to take a
13 given, a requirement that renewable resources be introduced
14 at a certain level. Now how do we address the reliability
15 issues?

16 And there, economics to me have to be part of the
17 political answer. Because engineering and economics, left
18 to their own devices, will reach answers that I'll bet
19 wouldn't get to the policy questions that certain
20 politicians want to have as the outcome.

21 So that's my point. We can't really address that
22 and won't be prepared to. Should economics be introduced,
23 we can say, yes, it could be a tool, but we need that policy
24 given so we don't start substituting our own politics in, if
25 you will.

1 MR. WHITLEY: I just wanted to comment from the
2 ISO's perspective. I think all the ISOs have been very
3 proactive in trying to address some of these emerging issues
4 coming at us, like the renewables, the transmission issues,
5 and the balancing of storage and ramping issues that are
6 coming at us.

7 I mentioned the innovative products we've put
8 into our market to attract storage resources. And we're
9 also working with all of our neighbors around New York's
10 borders and throughout the Northeast and Midwest to address
11 seams issues, scheduling on our interfaces through much
12 faster ramping on schedules to better enable the balancing
13 of the system to meet some of these emerging issues that we
14 have coming at us.

15 MR. TYMOFICHUK: Mr. Chairman, may I go back to
16 solar-induced currents? I may have inferred by referencing
17 our DC system the measurements and the study done between
18 Manitoba Hydro and the University of Minnesota was on the DC
19 side. In fact, it was measurements taken on the neutral of
20 downstream power transformers. GICs are DC in nature, and
21 too much of DC current entering a transformer is like a fox
22 entering a hen house, not very good things happen. The core
23 becomes saturated. Heating occurs. It creates harmonic
24 currents, and all of these things add to the overall heating
25 and possible ultimate destruction of the transformer.

1 cascading outage. That part should be guaranteed, and that
2 becomes a mandate. And then from there you have the
3 opportunity to use markets to be able to allow customers and
4 generators to decide the level of service that they want to
5 receive.

6 COMMISSIONER LaFLEUR: Thank you--

7 MR. LITZINGER: I'm sorry, I was just going to
8 add, going back to my role a year ago as the president of
9 our competitive generation company, that tried to look at
10 investing in ways to provide renewable power and firm it up,
11 that the markets for ancillary services are in their infancy
12 and really don't support that investment.

13 We tried and tried, and struggled, and so I
14 encourage you all to work on that.

15 And the other caution I would throw out, on the
16 conventional generation I think we probably can get to
17 market type solutions fairly quickly. But on some of the
18 more advanced technology, I think it is going to be a
19 struggle for people to develop that under a market-based
20 approach because of the costs involved.

21 COMMISSIONER LaFLEUR: Thank you. Commissioner
22 Spitzer?

23 COMMISSIONER SPITZER: I'll just have one
24 question. I know we're running a little bit behind.

25 It was reflected in the EMP discussion. You had

1 the protocols with regard to the solar flare, and then a
2 determination that with regard to the malicious the solution
3 required a more broad-based governmental approach,
4 government taking the lead.

5 From a process point of view, given that we don't
6 know what the next challenge is going to be, is it a good
7 thing? Is it wise that we have a formalized process where
8 the NERC Board might consider, you know, malicious versus
9 solar flare, other threats? The degree to which NERC takes
10 action or declines, should that be a formalized process?

11 Maybe starting you guys, and then whoever else
12 wishes to comment.

13 MR. CAULEY: I think it could be. I mean, in
14 terms of we talked about communication and consultation. I
15 think it goes two ways. So I think it would be important.
16 I know Joe and some of his folks place a high degree of
17 value on intentional EMP acts, and I think we have made a
18 conscious choice in the last six months to focus on GMD and
19 not on intentional EMP.

20 So I think your--I don't know how far we need to
21 go in terms of formalizing, but I think certainly
22 communicating, putting on the table other than hearsay or
23 something like this verbally in a meeting, that we probably
24 should do a better job of informing you of things we have
25 chosen not to do.

1 But I think if we get back to the earlier panel,
2 we had a discussion I think in response to Commissioner
3 Norris's, if we had this sort of let's work out what the
4 priorities are and lay out a multi-year progressive plan
5 regarding that, I think we could put that on the table that,
6 yes, it may be important, but we're not going to immediately
7 respond to that.

8 MR. JOHN Q. ANDERSON: I would just add that I
9 think that's a very provocative idea. Because I think it's
10 kind of a mutual roles there. I think we would have the
11 role to provide the information, which we would do through
12 our studies about what are the likelihoods, what are the
13 impacts, how much is the overlap; and then maybe have a
14 recommendation on where NERC ought to focus its resources,
15 to the extent we could choose one or the other.

16 And that ought to, as Gerry said, maybe
17 informally be brought for Commission input so we understand.
18 Because you all then have policy considerations that we may
19 not have taken into account that are important, or may be
20 more important from a national policy point of view, and we
21 need to be responsive to that.

22 COMMISSIONER SPITZER: And there may be bilateral
23 communications with the stakeholders.

24 MR. JOHN Q. ANDERSON: Absolutely.

25 COMMISSIONER SPITZER: You would have input, one

1 way or the other.

2 MR. SCHNURR: Yes. I'd also like to comment
3 briefly. I think some of the comments that have been made
4 point out something very important here. Which is, that
5 when it comes to malicious EMP it's going to be important to
6 have some government input into the process. And in this
7 case some regulatory input into the process.

8 I think the same is true on cyber security. When
9 it comes to natural effects, we understand that of course
10 industry has an obligation to try to understand what the
11 natural environment is and deal with it.

12 When it comes to cyber security, we have the
13 rather unusual reality that we're asking private industry to
14 take on a responsibility which normally we would say is say
15 the Defense Department, a national security responsibility.

16 The reason industry is doing it is because that's
17 where the action is. That's the only place that you can
18 really effectively provide that defense. If we talk about
19 non-nuclear EMP for example from trucks that are driven up
20 and down highways near power plants, it's hard for me to
21 understand where that differs in a strategic sense from say
22 a cyber attack.

23 It would be in many ways easier than a cyber
24 attack. It could be far more devastating. So how do we
25 deal with these areas where, from a state point of view, or

1 a federal point of view we say, well, we certainly don't
2 want to risk the American population if something like this
3 occurs. On the other hand, it's normally a government
4 responsibility but an area that we would expect the real
5 work would have to be done down in industry.

6 So it does seem like an area that dialogue is
7 going to be required. And I would say a good area for input
8 from the government into the process.

9 MR. VICKERS: I would agree. Now I'm going to
10 come at it from the cyber security, more of the cyber
11 security perspective than the GMD perspective.

12 One of the things, I think it's a mutual
13 responsibility. It's not--even within the Federal
14 Government, DHS doesn't manage Department of Energy, or
15 Department of Education, Department of Justice networks; but
16 we do provide actual information so they can now decide
17 where their risk is, and how they want to apply that.

18 And that would apply to the critical
19 infrastructure and private industry. And one of the things
20 that we are actively pursuing and actively doing is ways to
21 share that information. And I will use a real-world
22 example.

23 As many of you know, the Wall Street Journal
24 article from the weekend regarding the financial sector, as
25 part of that, and part of the analysis, and part of the

1 understanding of what's occurred in that investigation, is
2 there are indicators and other type of information that
3 hopefully is actually across greater sectors in the
4 financial sector.

5 So as a matter of fact, as of today we are
6 sending out those types of indicators across the critical
7 infrastructure, through the Information Sharing Analysis
8 Centers, and other forums that can be used to share
9 information. And I believe it was one of the key points
10 that was brought up earlier, that the government, as well as
11 industry, has to find mutual ways to share information.
12 It's not about just the government collecting all this
13 information through its defense mechanisms, through its law
14 enforcement mechanisms, or other type of mechanisms, intel,
15 and sharing that. It's also about what the critical
16 infrastructure and what industry can learn and share back.
17 Because we're all susceptible. We're all interconnected.
18 And so I think the key aspect ties back to how do we share
19 information?

20 And some of that can be pushed through regulatory
21 processes, and the enforcement of those regulatory
22 processes, but we also know that they have to be worked
23 across the whole sector, and all the constituents.

24 If you look at something like FISMA for the
25 Federal Government, the initial FISMA failed miserably

1 because there wasn't that mutual discussion on how it was
2 developed and how those things came about.

3 So I think from a regulatory perspective we have
4 to--I have to agree with Mr. Litzinger, we have to be
5 flexible and agile because cyber security is an asymmetric
6 environment. It's not a conventional environment, and we
7 have to be able to allow the organizations to understand
8 their own risk and minimize that risk with the oversight of
9 whether it's regulatory bodies or some other body to ensure
10 that they are protecting themselves, which then in turn
11 protects others, which then in turn protects the national
12 security.

13 So I think there's got to be a lot of dialogue,
14 as well as potential regulatory oversight and policy.

15 COMMISSIONER LaFLEUR: Thank you very much.
16 Commissioner Norris?

17 COMMISSIONER NORRIS: Thanks. Since you've all
18 volunteered to be cyber security experts today, I will ask
19 you a cyber security question.

20 We hear two different design philosophies. One
21 appears to be the defense-in-depth, which is the upfront,
22 prevent cyber attacks from happening. The other appears to
23 be building up resiliency and the ability for a quick
24 recovery.

25 Are those a one-or-the-other? Both? Is one more

1 dominant, or have a greater impact? I want to get your
2 sense on how we should look at those as proposed solutions.

3 MR. VICKERS: I'll take a stab at that from the
4 outside, not as actual execution. So defense-in-depth I
5 think is critical because it allows for the ability of
6 multiple groups to make this a strategic issue, meaning it's
7 not relying on one organization or one group to be able to
8 do it because it becomes cost prohibitive.

9 If you can share that across, whether it's the
10 government providing a certain level of parameter type
11 activity within like what we do in the Federal Government,
12 or a way to share information so we can get information and
13 share it back and vice versa, but I don't think you can
14 eliminate the resiliency piece because those things go hand
15 in hand.

16 There are aspects of the information that can be
17 shared that's done to that dense-in-depth that can then also
18 be tied back to, once again I keep harping on that risk
19 management issue of where you can invest and what you can do
20 to maintain that stable environment to be preventative.
21 Because sometimes defense-in-depth tends to be reactive.

22 We put things in place after we know about
23 something. Resiliency will allow you to be preventative to
24 the greatest extent you can. And you even have to add back
25 the recovery piece. As mentioned earlier, the long lead

1 time for those--you know, having in stock the long lead time
2 items, and things like that.

3 So all of those things go hand in hand, and that
4 is the perspective--at least Randy Vickers' perspective, on
5 that, where I don't think you can eliminate one; you've got
6 to figure out--one might be more important, but I don't
7 think you can eliminate any of those.

8 MR. CAULEY: Commissioner, I think in the
9 conventional world that we've been in, I think the defense-
10 in-depth approach should be dominant, because the risks are
11 known and understood and we can architect barriers to things
12 happening that we know, and can anticipate, and we can
13 design that.

14 I think in the cyber and other malicious type
15 activities, physical attacks, I think we have to use both.
16 So you don't want to completely lay down and say, well,
17 we're only going to be responsive once we see what happens.
18 I think we need to elevate the barriers sufficiently so we
19 don't end up with the day-to-day intrusions and just routine
20 stuff.

21 We want to make the barriers high enough so that
22 we're not just dealing with the ordinary run-of-the-mill
23 issues. Somebody has actually gone to an extraordinary
24 effort to make something happen, but can we design and
25 anticipate every bad thing that might happen? The answer

1 is: No. Because some people are willing to put in much
2 more resources into making that happen.

3 So that's where the resiliency piece comes in.
4 We have to not say, whoops, you got me, and now we don't
5 know what to do; I think we have to prepare for that. So I
6 would say in the emerging area of intentional attacks, it's
7 got to be a blended approach.

8 In the traditional engineering and operating
9 world, I think defense-in-depth against known risks is the
10 effective approach.

11 MR. TYMOFICHUK: I would like to go back to the
12 flood of the century in 1997 in early April. From Fargo,
13 North Dakota, Grand Forks northwards into Manitoba, into
14 Lake Winnipeg, and so on.

15 What really aggravated that flood was a late
16 blizzard snow storm, ice storm in North Dakota that took
17 down Mancota Power's transmission lines to a large extent,
18 distribution systems. But in addition to that, it knocked
19 down public and private radio and television transmitters.
20 And this lasted for days.

21 So the customers and the people in the region did
22 not know how extensive the damage was, when's the power
23 going to come back on, and there's a flood on our back side.
24 So there are many lessons to be learned from that, and I
25 certainly from experience would speak a bit to taking those

1 lessons and building them into resiliency that can work.

2 And the way it can work is mutual aid agreements
3 between utilities that help each other. This has gone on
4 for years, and I'm sure there are many utilities that have
5 formal agreements for that.

6 One of the things that we need to work on is to
7 have an agreement that people can cross borders with
8 equipment, construction equipment, and materials unimpeded,
9 or literally in real time. A hold up at the border can
10 cause a lot of devastating consequences that we really don't
11 want.

12 Thank you, Mr. Chairman.

13 MR. WHITLEY: I also want to agree with the other
14 speakers that you need both because you've got to assume
15 that, because cyber security is ever changing, you're just
16 not going to be 100 percent protected. There's always the
17 chance that some way something's going to happen. So you
18 have to build in redundancy and resiliency in your planning
19 and your infrastructure to do that.

20 MR. LITZINGER: We make a slight distinction.
21 Our defense-in-depth really focuses in four areas, and a
22 portion I guess you would characterize as resiliency.

23 We've got our perimeter defenses, both physical
24 and the network. And then the interior defense, which you
25 can think about as a portion of your resiliency, that if

1 something gets in can you isolate it and mitigate it and
2 keep it contained?

3 And then we have a data protection element that I
4 won't go into. But once you've done that, which is what
5 we're calling defense-in-depth, we go to our broader
6 business resiliency and recovery. So I almost liken this to
7 a natural disaster where you get it stabilized, and then you
8 switch more to a process where you're very flexible in how
9 you're going to recover.

10 MR. WRIGHT: I'm going to give a little different
11 answer than other folks. So you might have noticed that my
12 statement was a little different than others, and that it
13 really didn't say specifically here are the emerging issues;
14 it was more about how do you address the emerging issues
15 that are coming on.

16 It wasn't because we don't have them; we have a
17 whole bunch of variable energy resource issues in the
18 Northwest. But I think my bigger concern is, it is very
19 difficult for any of us to develop the expertise around all
20 of these issues, around cyber security, around GMD, EMP, et
21 cetera. At least I will admit I'm not smart enough to
22 develop that expertise in all those areas.

23 The thing that I worry about more is, are we
24 creating a structure so that we can understand where to set
25 our priorities? And those priorities should be based on a

1 simple evaluation of likelihood of event times consequence
2 of event, and an evaluation of mitigation alternatives,
3 using the best expertise that's out there in the country.

4 And if you've got that kind of structure, then it
5 allows you as these emerging issues come up to be able to
6 place them.

7 I think one of the problems that at least I face
8 with capital allocation in my own organization is sometimes
9 if you don't have a really strong structure, the people who
10 come forward with the most passion are the ones that get the
11 money, as opposed to maybe it being allocated in the most
12 objective fashion.

13 So that's the reason why my comments were more
14 focused on what's the structure that we have here in order
15 to be able to address these issues? And let's make sure
16 that we've got that set up in the most objective way
17 possible so that we can deal with these issues. Because
18 they're going to come up. Gerry's list of the seven or
19 eight issues is the right ones for today; it might be
20 different a year from now. How do we deal with those things
21 as they come in?

22 COMMISSIONER LaFLEUR: Thank you. In the
23 interests of time, I just have one rather narrow question
24 for Mr. Cauley with all this very broad discussion.

25 You talked about the work that NERC is doing

1 specifically on GMD that you'll be pulling some things
2 together in April and probably putting out an Alert. I
3 guess my question is: Looking first of all specifically to
4 adding capacitors, resistors, to transformers, some of the
5 first steps that you might take against any of these
6 threats, it strikes me that, would that not be a good
7 subject for a standard when we look at hurricane standards,
8 and fire prevention codes, this almost seems more standard
9 friendly than a lot of the other behavior standards that we
10 try to write. Because we're really looking at what kind of
11 engineering requirements do you put?

12 And I know there's been a lot of discussion on
13 what's an Alert, what's a standard, so I wonder your
14 thoughts on that.

15 MR. CAULEY: I think it could be the subject of a
16 standard. I think, as you suggest, it does lend itself to
17 setting certain requirements.

18 When we came through our planning process and
19 identified this as a key priority for us, one of the things
20 we started assigning people and resourcing it, and the
21 natural tendency is to go off and do this engineering study
22 that takes a year to figure out, you know, what's the right
23 thing to do. And I think there is a long-term perspective
24 on this, when you start talking about spending millions of
25 dollars. We need to really assess how best to do that

1 upgrade of equipment, and whether there should be a standard
2 applied as well.

3 I think what I was trying to do is grasp some
4 early victories in terms of some low-cost, quick-hitting
5 things that we can do in the early stages of months in terms
6 of being prepared if 2012 is a peak storm year, that we have
7 done some reasonable low-cost, low-hanging fruit type
8 action.

9 So I think initially that is our approach, to
10 find the low-hanging fruit and put that out through a heads-
11 up to the industry. But I think in the longer term, it's a
12 fair question. My answer, if I had to do it today, would be
13 I think it is suitable for a standard.

14 COMMISSIONER LaFLEUR: Well thank you. Thanks
15 for that perspective, and I think you are right that there's
16 both short term and long term elements.

17 One of the things I read on this topic was one of
18 the studies that came out in 2004 that I've talked about
19 that said if we start now we can really make progress in
20 three years to harden our system.

21 Well now it is four years since it would have
22 been three years after that. So if we start now, you can
23 fill in the rest.

24 Thank you very much to this panel. We are going
25 to go to our third panel and move forward. Thank you, very

1 much.

2 (Pause.)

3 All right, we are going to try to ask people to
4 take their seats. All right, we are going to welcome back
5 our--we are now going to go to a blended panel of some of
6 the folks who have been with us for panels one and two.
7 Welcome back everyone.

8 Obviously this is a final panel of the day. We
9 do know that we are running behind schedule, but we may go
10 over. We won't go past 5:30, but just to make sure we give
11 this the time, or as much of the time as it deserves as we
12 can.

13 The purpose of this panel is really to be more of
14 just a discussion to discuss what steps we should take going
15 forward to act on what we have talked about so far today,
16 and what processes are necessary from here on to address the
17 discussions of priorities and the emerging issues we've
18 talked about.

19 We hope to get your insights on the next steps
20 that you recommend that we take, and whether NERC or other
21 participants in the system have the necessary resources to
22 address the things we have talked about, or adjustments we
23 need to make; whether the processes that NERC, the
24 Commission, and others have in place are adequate or need to
25 be addressed to address the reliability issues and

1 priorities that we've talked about today.

2 And we are going to dispense with going down and
3 making statements and go right into the discussion. And,
4 mixing it up, I will go to my colleague, Commissioner
5 Norris.

6 COMMISSIONER NORRIS: Thank you, Commissioner. I
7 will ask a couple, to make sure we all get a round here and
8 we'll see how long we last.

9 Let me first, John Q., follow up with you. You
10 made a comment earlier about directives, there could be
11 different ways of doing that. And I also learned from this
12 reliability discussion over the last year that, surprisingly
13 enough, engineers have different opinions on what is the
14 right approach or not.

15 And so how do we get the value of the FERC and
16 the FERC engineers' perspective in your process if it isn't
17 through a directive or an Order? What are some other
18 avenues by which we can share in the expertise and the
19 development of the standards process?

20 MR. JOHN Q. ANDERSON: Well I doubt there's an
21 exact answer for that, or a set process. Because I think
22 it's going to vary a lot depending on the type of standard
23 we're dealing with and the situation.

24 I think in general that what we have seen is that
25 the process works smoothest, and I think fairest, to all the

1 parties, but also deals with that issue that there will be
2 differences of opinion, and we need to get to one standard
3 eventually.

4 And so some of the mechanisms are, and Joe has
5 been very good working with NERC on this, has been the, what
6 I would call the predirective steps that can be taken. In
7 other words, the pre-standard steps. FERC has the means to
8 participate early on. Joe and his office send people to be
9 part of that process.

10 We have worked--it was bumpy at first in fact
11 because some of the industry participants saw a FERC person
12 walk in the room and thought, oh, shoot, everything they say
13 is going to be it, because, you know, that's what they're
14 telling us, if you don't do it my way then the Commission
15 will slam you down. Well we've really worked on that. I
16 think Joe has worked with his people, and we've gotten our
17 industry participants to understand that that is just not
18 the case. That is really not the way it is supposed to be.

19 So that is one step, is that early input as a
20 participant and letting us know where the concerns are. And
21 believe it or not, even though we have worked on those
22 misperceptions, it still is given heavy weight when the FERC
23 staff and engineers come in.

24 Secondly, I think that the orders or directives
25 that come out may need to reflect input that wasn't accepted

1 in the drafting process, but the directive itself can be, as
2 I said earlier, the directive is a powerful tool. And I'm
3 not advocating don't use it, but when it is used try and be
4 very thoughtful. And I think the engineers can help you to
5 not prescribe. And we have already talked a lot about that.
6 But to raise the concern in the directive, and to say this
7 doesn't look complete enough to us. We don't accept this
8 exactly the way it is; add more consideration of these
9 factors in.

10 So I think that is where you've got to get
11 working with the Office of Reliability to be crafting the
12 role that those engineers play so it's not directive in
13 telling us how to.

14 So I don't know if that answers your question. I
15 don't think there is any easy way here to do it.

16 And the final thing I would say, Commissioner, is
17 that I think it is going to take judgment on the
18 Commission's part to react to your engineers. Because the
19 votes are never 100 percent. And when you defer to your
20 engineers and let that be reflected in a directive, it
21 essentially overlays or almost countermands the weight of
22 the industry's engineers. And that may have been 50
23 engineers or specialists there.

24 So it is a delicate balance, because we don't
25 want to be saying you can't listen to them because there's

1 only two of them, and we have 50 that know, so we always
2 win. But on the other hand, you do have to realize as a
3 Commission I think, even with passionate fighting by some
4 engineers in the Reliability Office, they still are only
5 engineers like the many engineers that have already been
6 over this and the vast majority voted, two-thirds or more
7 voted in favor of the standard.

8 So you have to be careful about countermanding or
9 overriding that, because some engineers in the NERC staff--
10 so it's a delicate balance; no obvious answer that. That's
11 my view on it.

12 COMMISSIONER NORRIS: Anybody else want to add?
13 I appreciate it. All I would do is just encourage the
14 conversation up front.

15 MR. JOHN Q. ANDERSON: Absolutely.

16 COMMISSIONER NORRIS: Like you have mentioned.

17 MR. JOHN Q. ANDERSON: That's the answer, yes.

18 COMMISSIONER NORRIS: And give everyone a seat at
19 the table and make it a good, robust discussion at that
20 level. I think that can hopefully reduce some of the
21 conflicts down the road. Yes?

22 MR. SMITH: I guess I would maybe jump into this
23 with a question to your question, as opposed to an answer.
24 And that is: If we talk about where we're heading with this
25 ERO model and into a better prioritized analysis of what are

1 truly the objectives with regards to reliability, and what
2 are the highest priorities that we should be focusing in on
3 with regards to our standards efforts, whether they be
4 looking at existing operations, or emerging trends, and we
5 do that successfully, where would these directives be coming
6 from that are not concurrent with that?

7 Because what you would be saying with those
8 directives is, while you're doing all this prioritization
9 and while you're identifying all of these things to improve
10 reliability, you're missing something that you need to move
11 to the front of your efforts. And we as the FERC are
12 directing you to do that.

13 That's the way I understand "directives," and I
14 just want to know why our process at NERC is missing that;
15 why you have identified something here that we as a
16 collaborative entity across all aspects of industry are
17 missing in our work. I don't--I guess if we're going to be
18 successful, I would hope there's not a lot of that. And if
19 there is, I'm confused as to what it is and why we are
20 missing it.

21 COMMISSIONER NORRIS: Let me speak to that,
22 because I think John Q. was trying to narrow the frequency
23 of those happenings. Gerry?

24 MR. CAULEY: I was just going to help you,
25 Commissioner, by trying to answer a little bit.

1 (Laughter.)

2 COMMISSIONER NORRIS: I'm always willing to defer
3 to help.

4 MR. CAULEY: I think there will always be room
5 for directives. I think the Commission has a different
6 mission than us. It has a common focus on reliability, but
7 it has a regulatory oversight role. And we are the
8 implementers in the ERO.

9 So I can imagine from time to time the Commission
10 would, from a policy perspective, or a set of priorities,
11 give us an objective, or an issue to deal with. And when we
12 ask ourselves, you know, what are the priorities, I have
13 hundreds of stakeholders I ask the question of, and they're
14 not all--they're not all of the same opinion.

15 I'm looking at the other John Anderson--

16 (Laughter.)

17 MR. CAULEY: They're not all of the same opinion,
18 and I think sometimes we need this sort of kick in the butt
19 to have some charge that we have to take after. So I think
20 to John's point, if we can have the dialogue on priorities,
21 what it is we think we need to do next, and what we think we
22 need to tone down for now, once in a while we will not have
23 an agreement. And if we need a directive to resolve that, I
24 think that's the role of the Reliability oversight.

25 COMMISSIONER NORRIS: Thanks. Yes, I think it is

1 to break logjams, but I think there's different levels.
2 There's a directive to develop a standard, but then there
3 are also directives of what the standards should be. And
4 drawing some distinction between those I think is I think
5 where you were going, John A.

6 MR. JOHN A. ANDERSON: And I would really like to
7 look forward, rather than looking back as much. To me
8 there's been a significant change, a very positive change in
9 the relationship between FERC and NERC from the July
10 conference that we had here. Perhaps starting in March,
11 let's go back in to look at that, but I mean I think we all
12 know that, and I think we are working together.

13 And I at least have a very positive attitude that
14 we are moving in the right direction. That doesn't mean
15 there aren't going to be bumps. Of course there will be. I
16 agree with everything that Gerry and John Q. just said
17 about, you know, if you need to do a directive, you do.

18 But I think Joe and his people have bent over
19 backwards recently trying to find out what is going on with
20 us, what the stakeholders are doing, and responding in very
21 positive ways. I really commend him that way.

22 COMMISSIONER NORRIS: Steve Wright, I want to
23 follow up because I think you raised I think the overarching
24 point here in your notes, and that is: Do we have adequate
25 processes in place to empower people to do the work they

1 want to do? And that is, to develop these standards and
2 make the system more reliable.

3 You work in that first panel, so I want to give
4 you a chance. Did we talk about a process enough? What
5 would you identify as the top process that remains to be
6 kind of discussed here, or figured out?

7 MR. WRIGHT: Well, so first of all I agree with
8 John's comment from a moment ago, that a lot of progress has
9 been made in the last six, eight months. Again, lawyers
10 compliments to FERC and NERC for that progress that has been
11 made.

12 In July I suggested I thought it would be good to
13 create some kind of a forum that created a smaller group,
14 maybe more at the CEO level. And in December we actually
15 filed a proposal to say this is what we're talking about
16 when we put that together.

17 Maybe I'll just take a second to describe why I
18 think that might add value here. Again, I want to be clear
19 that I'm not convinced, myself, this is the perfect
20 proposal; it's just a sense that there's a need that's out
21 there.

22 Number one, this is a really unusual structure.
23 I am not a big believer in shared accountability. To be
24 honest with you, in my organization I tell people that
25 shared accountability is no accountability. But honestly,

1 what happened here is we set up a structure that has shared
2 accountability. And so we're trying to figure out how to
3 make that work.

4 And we did it that way because it actually made
5 sense. Reliability is an expertise that's spread around the
6 country. It's a lot of people who know a lot of different
7 things, and it really is probably the best model. But this
8 takes a different way of thinking about how you accomplish a
9 mission when you have that shared accountability.

10 I think that a concern for me right now is that
11 it almost appears to me as if we think about standards as
12 the only tool in the toolbox. And I don't think it is. I
13 mean, I think this whole discussion that has gone on about
14 the North American Transmission Forum, and trying to get the
15 Strive for Excellence, there are ways to accomplish the
16 reliability mission that we all want that don't just rely on
17 standards.

18 Now that mission, the Strive for Excellence
19 mission, is one that really is driven by the industry. And
20 so there is a role here for industry in terms of moving the
21 Forum together. There's a role here for NERC in terms of
22 identifying key issues, standards; and there's a role here
23 for FERC ultimately in a regulatory.

24 But I think there would be value in having a
25 discussion in which--a discussion takes place in which the

1 parties come to the table as peers, as opposed to a FERC
2 table, or an MRC table, or some other table.

3 The folks would come to the table as peers and
4 talk about, so how are we going to accomplish this
5 reliability mission and get--again, this is my perspective,
6 and if others disagree that's fine--but get away from the
7 worrying about who is going to be held accountable for the
8 next outage. And is my organization going to be held
9 accountable? And focus more on how are we going to
10 accomplish this together? How are we going to get this
11 reliability mission accomplished, and make these tradeoffs
12 and these balances between costs, et cetera.

13 The final point I'll make is just, I said it in
14 July and I still feel it today. I don't think there has
15 been enough conversation nationally about the tradeoff
16 between reliability and cost, so that consumers understand.
17 Because there is a tradeoff there. And ultimately we are
18 talking about accomplishing a public service mission.

19 The only way you can do that is if the public
20 understands that tradeoff and buys into it. And I think
21 getting these three parties together to talk about how are
22 we going to have this conversation--with customers,
23 consumers, ratepayers, voters--about that reliability/cost
24 tradeoff and an understanding of that is something that we
25 need to do together, as opposed to one group taking the lead

1 on that.

2 So that is the thought.

3 COMMISSIONER NORRIS: Good, because the cost is
4 my last question I wanted to get out on the table. You set
5 it up, Steve. That is, we have accountability comments and
6 it is hard because everyone feels responsibility but there
7 is lack of singular accountability, and we all worry about
8 making the wrong decision.

9 And I think that has created an uneasiness with
10 talking about costs. How do you analyze that? I think
11 Betty Ann made some comments earlier, but I think your
12 detail on costs in my mind is probably not achievable in
13 this construct. Yet, if we don't have an open, public
14 discussion about costs, then sure enough the one thing we
15 decide not to do, even though it made sense, then goes wrong
16 and we'll be back to square one in terms of this lack of
17 accountability.

18 So how does cost enter the equation? Right now
19 in my mind cost enters the equation when I see a standard
20 rejected at NERC. So, okay, there are some costs involved
21 here, but is the rationale filtering up? Are we able to
22 decipher what the cost analysis was? Because it really
23 isn't presented. No one wants to talk about we're not going
24 to do it because it costs too much.

25 How do we get that on the table? And how do we

1 make good, general judgments about cost without burdening
2 ourselves with the kind of level of cost specificity I don't
3 think we can get into in this sector?

4 DCPSC CHAIRMAN KANE: Right, because you're not
5 conducting a rate case. You're not looking at it in that
6 same kind of almost formulaic way, although I must say,
7 even for a state commission we get into things like Smart
8 Grid, like Smart Meters, like some of the other newer things
9 that are coming, two-way communication, those standard old
10 cost/benefit analyses don't work, and how do you put a price
11 on increased notification of outages, which you'll get with
12 Smart Meters?

13 You're guessing. How do you put a price on what
14 you are going to achieve with energy efficiency by having
15 better information to a customer about their usage on an
16 hourly basis? So you have to do some estimates and some
17 guesses. It's not the same thing as if--you know, we can
18 say, you put in a Smart Meter and you could eliminate X
19 meter readers. There is a dollar value to that. But there
20 are a lot of judgments, and social judgments called, so
21 that's--but I think there is some, I'll use the word
22 "expertise" among the state commissions that could help in
23 this, too.

24 And I wanted to make two suggestions. I know
25 that FERC has had technical conferences in conjunction with

1 NARUC on other issues. And because really the interaction
2 and the intersection with the consumer is with the state
3 regulatory commissions, perhaps at one of our NARUC
4 meetings, committee meetings or annual meetings, a
5 collaborative kind of technical conference where you have a
6 lot of commissioners there and you could really get into
7 more of a discussion of, you know, how do you value? How do
8 you do cost/benefit analyses when you're not talking about
9 things that have really quantifiable price tags all the
10 time? There are social benefits. There are societal
11 benefits that have to be in there, too.

12 The other thing I was going to say earlier is, in
13 terms of accountability, one of the things it's hard to
14 wrestle with too is, from what I see, and one of the things,
15 it's not just FERC and NERC. You've got the Department of
16 Energy, which has now started a collaborative process on
17 cyber security, which includes NIST, which includes some
18 others. You've got Homeland Security. You've got a lot
19 more players in there that are also going to say this is the
20 standard you should have, this is what the reliability
21 should be.

22 And so it makes it harder even to quantify it.
23 But we would be very happy to help in that process.

24 COMMISSIONER NORRIS: Kevin.

25 MR. BURKE: I think some of the quantification

1 is difficult. In some cases we've been able to do it by,
2 if we can compare here are some changes we want to make to
3 the system, with here's the relative benefit in terms of
4 reliability and either customer outages or risk to a
5 particular part of the system.

6 Where we can do that, then we can look at, okay,
7 how much do we invest in a program? And what benefit is
8 that going to give? And maybe I say I'll install 100
9 devices. What's the benefit for the first 20? What's the
10 benefit of the last 20? And we actually try and develop
11 curves and look at the marginal benefit with the marginal
12 cost, and then compare that to different projects.

13 I don't even know how I would start that on a
14 national basis. I mean, it's challenging enough within one
15 company. And then trying to balance that, as the Chair
16 said, with respect to the impact on customers.

17 But at some point in time you can say, well, gee,
18 here's a program, like I was saying before, that maybe we
19 should stop because the marginal cost compared to the
20 marginal benefit is not proportional to another project I
21 have underway. Or, that I think my distribution system
22 reliability is adequate and the customers are reasonably
23 happy with that level of reliability, so we should try and
24 maintain that level of reliability and not continue to drive
25 the reliability, or number of outages lower and lower.

1 MR. CAULEY: I think, just following up on
2 Kevin's remarks, I think it is difficult in the Bulk-Power
3 System to do that. But I had an MBA professor once who said
4 the real world is messy, to make sense of it. And I think
5 that's what we need to try to do.

6 If nothing else, I think there's inherent value
7 in just describing the reliability benefits of the work that
8 we do. Why should we just take it for granted that we have
9 an assignment, we're going to go do some work; it's just
10 because we have to do it. I think we should do a better job
11 of describing, communicating the value that we have.

12 Now if we've done a sufficient job in describing
13 the benefit of a more rigorous program that we might do in
14 cyber security, then why can't we lay these proposals side
15 by side and just do a subjective but competitive bidding
16 on which is going to give us the most benefit for the amount
17 of effort and cost that it's going to take.

18 So I think we can get part way there. I think
19 the reliability performance data that we're going to be
20 working on in the coming years will also give us more
21 concrete data in terms of the amount of outages that we're
22 seeing caused by certain factors, and can we eliminate those
23 factors as common causes that we're seeing and get a little
24 more quantified.

25 So I don't think we'll ever get to the threshold

1 value that's done at the retail level of here's what it
2 costs, here's the benefit, and do a zero sum sort of benefit
3 analysis, but I think if we have 30 things to do, and these
4 5 seem to give us greater value for the effort, I think we
5 can do that kind of analysis.

6 COMMISSIONER NORRIS: John?

7 MR. JOHN A. ANDERSON: I have two things on it.
8 One, I think that you're exactly right on looking at some of
9 the votes, that some of the votes have to do with people
10 thinking that it costs, or whatever. I can assure you that
11 when a standard is under development people look at it and,
12 at least my companies look at it and say what is this going
13 to cost me? And it's going to get their attention, and they
14 are going to be much more involved for ones that cost them
15 something than for ones that don't.

16 I mean, the definition of the "Bulk Electric
17 System" right now has really gotten the attention, and we've
18 got not only one on a drafting team, but several people
19 going to the meetings. I mean, you see the active
20 participation.

21 But that's not a very good way of doing it,
22 either. I think Gerry really hit it right. I mean, if NERC
23 can go down and try to help on that, it will be of great
24 benefit. And I think that NERC will. I think that's
25 something that's important to do.

1 My second thing that I really wanted to comment
2 on started with, and I can't help but comment a little bit
3 on my good friend Steve's proposal. Since July 8th was when
4 I think we had it before, and I believe, Mr. Chairman, you
5 and I had a couple of exchanges on that.

6 What I'd like to do first is to thank Steve very
7 much for changing the way I heard it in July and the way I
8 read his filing in December. It is quite different. And he
9 did listen to the concerns that I had and made significant
10 changes, and I thank him for that very much.

11 What it is now, though, it looks like is just
12 almost a subsector of the MRC. And it seems to me that the
13 first thing we ought to be trying to do is get the MRC to
14 deal with some questions that Steve has raised, which are
15 very good questions, before we set up with a new
16 organization.

17 And if the MRC is incapable of doing that, then I
18 think we ought to look very seriously at whatever else we
19 need. But I just respectfully will disagree that the MRC--i
20 think the MRC can do that, and I just think we need to put
21 it on the table and try to go that route first.

22 MR. SMITH: And I will second that. As an MRC
23 participant and hearing the description of what we were
24 looking for there, that's my intention for the MRC. And if
25 we're not doing that, then we need to get to where we need

1 to get to with regards to that organization.

2 I think that is an ideal forum for the
3 participation of all of the various segments of industry
4 that have representation there. We have the entire NERC
5 Board of Directors at those meetings. We have tremendous
6 FERC participation. It is supposed to be a strategic
7 committee talking about strategic and emerging issues at
8 NERC. It is not a check-the-box kind of basic business kind
9 of committee. It is dealing with real issues.

10 And if the sense is, no, it doesn't, then
11 something is wrong with the MRC, and that's where it needs
12 to be addressed. If we create something else, I don't know
13 what the purpose of the MRC is. And I believe it would
14 wither up and go away.

15 MR. TYMOFICHUK: Thank you. I'm not making these
16 remarks as the outgoing Chairman of the MRC, I'm making them
17 as my experience as the vice chair and chair in the past two
18 years. I believe we've made tremendous strides at the MRC
19 with the quality of membership around the table, the policy
20 discussions, particularly those on request from the Board of
21 Trustees, and other topics.

22 So I have a great deal of concern that another
23 venue, another direction could undo some of the good work in
24 the last little while. And I have a lot of faith in the
25 incoming vice chair and chair as we go forward.

1 Thank you.

2 COMMISSIONER LaFLEUR: I guess the Chairman is
3 going to close, so we will go next to Commissioner Moeller.

4 COMMISSIONER MOELLER: I just wondered if
5 anybody--

6 MR. TYMOFICHUK: If we're closing, I would like
7 to make a couple of short--

8 COMMISSIONER LaFLEUR: Sorry, no, we're not
9 closing yet, I'm sorry.

10 MR. TYMOFICHUK: Oh--

11 COMMISSIONER LaFLEUR: I was just explaining why
12 my order, but we will thank you. Sorry.

13 COMMISSIONER MOELLER: I would just offer to any
14 panelist if they have another question of another panelist.
15 And if not, then I will yield my time.

16 (Laughter.)

17 MR. CAULEY: I won't do that, but there was a
18 good question I think that is unanswered in terms of how do
19 we proceed going forward here, and I would like to just
20 offer some thoughts there and touch on a couple of points.

21 I think you say how do we, after three or four
22 years, get to the point where we seem to have this confusion
23 over priorities, and sort of are we driving in the right
24 direction?

25 I think we have a lot of well intentioned people

1 who have done exactly what they thought was the right thing
2 for reliability. We have a lot of directives that came from
3 staff that are very specific, around specific changes to the
4 standards.

5 We have a lot of issues that we're trying to deal
6 with in parallel, and I think everyone is trying to do the
7 right thing.

8 I think on the NERC side, we probably have taken
9 in the last few years, while everything that's in front of
10 us is the ERO, we're obligated to do. So we have to do it.
11 And we have to figure out how to do that. And I think we
12 have kind of built that into our planning process.

13 And I think what's happened through this enhanced
14 dialogue that we've had in the past six to nine months is
15 really maybe a maturation of the discussion and the dialogue
16 that perhaps we can actually break free of we have to do it
17 because that was our understanding of our job to say, well,
18 what really is going to be important for reliability?

19 And I think we have to have a meaningful process
20 to do that. One is the one that's discussed here by Steve.
21 Another suggestion I would put on the table is the
22 opportunity to continue this kind of a conference but maybe
23 in a little bit of a different style.

24 I'm sure that if we had a year from now an
25 assessment of what have we achieved, what are the big things

1 we have accomplished in reliability, and what are the big
2 issues ahead of us that NERC could come and make a
3 presentation along those lines. And I think the Office of
4 Electric Reliability, with an independent assessment using
5 their resources could do a similar assessment, and have that
6 as part of the conference. And then discussion on
7 priorities.

8 And I think what we would see is some different
9 alignments on the priorities, but an opportunity to discuss
10 and maybe get alignment.

11 I think in our business planning process--what's
12 ahead in the business planning process, I think if we can
13 have that annual opportunity, but maybe other opportunities
14 to just discuss the priorities and issues, and we could
15 communicate things that we don't think we can get done, or
16 diluting our efforts on more important things, if we had
17 that dialogue as we go through the year I think that would
18 be beneficial.

19 But I think then we need to look at our business
20 model and make sure that when we do our business planning
21 it's not, you know, can we do 80 things that we think we're
22 obligated to do? But what would be a smaller number of
23 things that we would have a meaningful impact on? And make
24 this really more a successful business enterprise that can
25 have more effective planning.

1 And I think we have reached that level of
2 maturation. When we submit a business plan, it is not just
3 a rubber stamp, yeah, NERC said they'll do all these things;
4 but we actually have some meaningful thought put into
5 prioritizing how we best spend our resources.

6 So I would put that on the table as maybe a plan
7 for going forward.

8 COMMISSIONER MOELLER: I just might point out
9 again, Ed, we particularly appreciate all the effort
10 everybody has put into here, but, you know, Ed, I think
11 maybe those of us maybe who grew up in the North are a
12 little more cognizant of our North American relationship,
13 and the North-South element. Certainly we are in the
14 Pacific Northwest. And the North-South nature of the
15 provinces, and how it impacts our grid.

16 So to all our friends in Canada, we are very
17 aware of it. Thank you for your participation. And
18 regarding your cross-border challenges earlier, I think we
19 would welcome Manitoba as the 51st State, if you--

20 (Laughter.)

21 DCPSC CHAIRMAN KANE: No, no, the District is the
22 51st State; 52nd State.

23 (Laughter.)

24 MR. TYMOFICHUK: When I see the language in the
25 future referring to "the State of Manitoba."

1 (Laughter.)

2 COMMISSIONER LaFLEUR: Commissioner Spitzer.

3 COMMISSIONER SPITZER: I am always quiet with
4 Manitobans because I don't know whether they're angry about
5 the Phoenix Coyotes, or not, but we'll get to that over
6 drinks some other time.

7 (Laughter.)

8 COMMISSIONER SPITZER: You know the discussion,
9 Gerry was talking about the formats and appropriateness of
10 gatherings, and I recognize the need for bilateral
11 discussions. And then adding other entities has the risk,
12 though, of making it ungainly.

13 But I had a little bit of a light go off. When I
14 got out to the elevator, I saw the leadership from FRCC, and
15 I had a very valuable meeting. I went down to Tampa, I
16 think it was in '07, and then they came up just recently,
17 and I always get very valuable input. Because I think,
18 Lonnie, you used the word "blocking and tackling." We get
19 an awful lot of very valuable insight from an oversight role
20 from the Regional Entities. But it's not formalized.

21 Nor has the relationship between FERC and NERC
22 been formalized. In fact, that was one of the problems.
23 There wasn't enough communication and, well, I'll just take
24 responsibility myself. Recent events caused an elevation of
25 importance, and I think that is true of all the

1 Commissioners. There had been a perception that this was
2 not a significant issue on the 11th floor, and I think we
3 have worked hard to change that perception by working hard.
4 And this is a manifestation of that.

5 The challenge is, you bring Regional Entities in,
6 they add to the discussion, it makes it more formalistic, as
7 we have formalized through conferences such as this NERC and
8 FERC. At a certain point, though, you get too many people
9 in the room and you don't want to replicate an MRC where
10 you've got the Regional Entities participating.

11 So what is the appropriate balance? And this I
12 guess goes into the question about how many times do we meet
13 a year? Who are the invitees? The dilemma of getting
14 granular without being so diffuse that we don't degrade
15 value and that people have to fly in from--I don't want FRCC
16 to come in from Tampa at great expense to talk for two
17 minutes. How do we handle that?

18 Maybe start with Gerry, and I'd certainly love to
19 hear from industry.

20 MR. CAULEY: Well I think, first off I think the
21 informal dialogues that have occurred in the last nine
22 months have been very beneficial, so I think to lose that
23 opportunity would be sort of sending us back a bit. Because
24 I think it's a lot of the individual conversations that a
25 lot of the insights develop from over time, and I don't know

1 the frequency but I would encourage us to continue valuing
2 opportunities to come in and speak with individual
3 Commissioners. And I think not just the NERC staff and
4 leadership, but also representatives from industry and so
5 on.

6 I think we should have a continuing dialogue on
7 reliability. So I think there's a place for that to provide
8 the insights needed.

9 I think the annual forum that I've proposed--I
10 think the workshops that we've had, the conferences we've
11 had, July, November, and now in February, have been
12 extremely beneficial. But I don't know that we necessarily
13 sustain the pace of doing one of these every three months.

14 I mean, we could do it. I'm in D.C. quite a bit,
15 so we can keep doing it. We need to be able to create the
16 value from these events, because they are a significant
17 investment of your time and industry's and everybody's.

18 So I think to me the timing on this kind of
19 event, looking at broad reliability priorities, is on the
20 once- or twice-a-year at most type of a level. And there's
21 a lot of work going on behind the scenes between me and Joe
22 and others to sort of work out, to see if we can get 90
23 percent of the way there on agreement on the priorities, and
24 then bring those in.

25 So that would be my response, Commissioner.

1 COMMISSIONER SPITZER: I know you want more
2 meetings.

3 (Laughter.)

4 MR. JOHN A. ANDERSON: Oh, yes, I want more
5 meetings. I really think these are very valuable, and I
6 think twice a year is a good number to pick. I agree with
7 Gerry that four times a year is kind of overdoing it. I
8 think twice a year. Because there's an awful lot going on
9 else--you know, other kinds of things that are going on
10 also.

11 And again, I mentioned earlier before, and I'll
12 say it again, I really thing that the participation of not
13 only FERC Commissioners but the FERC staff also at the NERC
14 meetings is extremely important. I haven't counted numbers,
15 but just my sense is that that's been picking up. There
16 have been more there. I think that is very, very valuable.

17 So you're getting that. And then on top of that,
18 each of us in our own ways, I mean, poor consumers can't get
19 anywhere near like the big utilities do, you know--

20 (Laughter.)

21 MR. JOHN A. ANDERSON: --but we all come in and
22 see you. And I think a blend of those kind of things gets
23 the kind of communication that is good, and so I recommend
24 about twice a year for this.

25 MR. TYMOFICHUK: I will ditto John Anderson's

1 comments. Thank you.

2 COMMISSIONER SPITZER: And you're not angry about
3 the Coyotes?

4 MR. TYMOFICHUK: No.

5 (Laughter.)

6 MR. BURKE: Twice a year sounds good to me, as
7 long as it's also supplemented with a lot of more informal
8 discussions. Because I think that's where you really get
9 better communications, and better understanding of what some
10 of the issues are on both sides.

11 It's always difficult to do that, you know, with
12 Orders and papers being filed, and things like that. So
13 better communications is useful.

14 MR. CARTER: I really can't add anything to
15 what's already been said. I wouldn't do it more than twice
16 a year. And I think this has been very helpful. You can't
17 beat good communications when you're trying to tackle the
18 kind of problems that we're trying to address. And we all
19 have a role in it.

20 MR. WHITLEY: I agree. This is Steve. I agree
21 with the same comments, about twice a year. But I think at
22 maybe that second meeting about a year from now it would be
23 good to have a progress report brought back up on, okay,
24 here were the top 8 buckets of things we were going to work
25 on. Here is what we accomplished. And here are the bottom

1 20 things that we have pulled out of the hopper and put on
2 the side.

3 And if we are all aiming toward that, I think we
4 can start making some progress. So just following Gerry's
5 leadership.

6 MR. WRIGHT: Well, so as the lone dissenting
7 voice, so we did file a different proposal. And I would
8 just say that our view was that, it's not that the MRC isn't
9 valuable; we think the MRC is valuable. We think that,
10 first of all, there would be value in a smaller table.

11 There's an awful lot of people at the table at
12 the MRC, and it's just hard to have a real dialogue when you
13 have a lot of people at the table.

14 Second, so we think there are some higher order
15 things with respect to, for example, not just what standards
16 are coming forward, but what is the relationship of the
17 Forum to standards? Where is that we're going to rely on a
18 Strive for Excellence and building that kind of culture
19 approach, as opposed to a standards approach?

20 And as I said in my earlier comments, standards
21 can be written in a fashion that it will eviscerate the
22 Forum; or it can be structured in a way, and actually really
23 support the Forum. It will make a difference in terms of
24 the way the standards are put together. And so a thoughtful
25 approach to having a conversation about that is needed.

1 And the concept of developing a strategy for how
2 we approach the public I think is necessary, as well. So I
3 heard my friend, John Anderson, say well those are good
4 tasks for the MRC to take on. And if there is not an
5 appetite for doing the Forum that we've suggested, then I
6 would hope at least that those issues would not get lost,
7 although I have to admit I still continue to think there
8 would be value in putting together a group like that.

9 COMMISSIONER LaFLEUR: Well, thank you very much.
10 I'm just trying to think of how we can get some of the
11 benefits that Steve Wright is talking about of the smaller
12 forum, because the problem is when you do try to--it's all
13 well and good to talk about just coming together like a
14 couple folks, but then pretty soon you're, if you invite
15 this one, you have to invite this one, and invite that one.
16 And I do think perhaps not a total answer, in addition to
17 the meetings everyone seems to think we should have a couple
18 of times a year, continuing to go to more of the meetings of
19 the REs, and pop in here and there where you really can be
20 like a peer because it's not at a table with microphones and
21 all, is one answer. But I'm not pretending that that's
22 responsive to your whole question. But I think we should
23 keep trying to be present in other ways.

24 I wanted to just talk a little bit about how we,
25 or invite comment on how we capture some of the progress we

1 have made today, in addition to having future meetings.
2 Because I think there was a lot of useful discussion about
3 the list that NERC had put together of the four standards
4 issues, and four emerging issues, as well as here and there
5 on the panels we talked about the standards development
6 process, if there's a way for you to propose a
7 prioritization of some of the outstanding directives, if
8 that would be useful.

9 I think I was one of the first to start talking
10 about priorities, and I want to just pick up on something
11 Gerry said. It certainly was not my perception that you
12 were driving in the wrong direction, but maybe that we were
13 trying to drive in too many directions and we didn't have a
14 clear, agreed upon list that we would come back to and say
15 here's what success looks like.

16 So I think in the comment period after this, if
17 people have process ideas, or ideas for even just writing
18 down some of the priorities, that would be useful. I mean,
19 you don't have to write down what you've already said, but
20 we know there's a lot of people on the video, in the
21 audience, and otherwise that we don't want to lose some of
22 the thoughts that came forward today so we can build on
23 those and not wait for six months.

24 With that, I just--I know Mr. Tymofichuk has
25 something he would like to say, and I want to ask anyone if

1 there is anything they want to add that hasn't been
2 captured, and then we will give it to the Chairman to close.
3 But if anyone--

4 CHAIRMAN WELLINGHOFF: Actually, before you
5 close, let me just go into something.

6 COMMISSIONER LaFLEUR: Okay, I'm sorry.

7 CHAIRMAN WELLINGHOFF: Thank you. This follows
8 up on Steve and the ongoing debate between Steve Wright's
9 idea and the discussion that John Anderson and Mike Smith
10 had.

11 I saw earlier, or heard earlier from many people
12 that some of the things that we're trying to do here is
13 foster best practices in industry education, operational
14 excellence, flexibility, peer review, and reliability.
15 These are things we all want to encourage and foster in the
16 industry.

17 I think John Q. was saying that these are a
18 number of things that NERC is taking up. And Kevin is
19 telling me that we are working, hopefully successfully,
20 towards formulating and creating a robust North American
21 Transmission Forum.

22 Without Steve's group that he's proposing, I'd
23 like to ask you all how you propose to clearly set forth
24 process, and delineation of functions between NERC and the
25 NATF? Because I think if we don't figure out how to do

1 that, we are going to have problems here, because we're
2 going to have one organization vying to do what the other
3 organization is doing, or both organizations doing the same
4 thing, and I think we ultimately have to figure out, if we
5 want to do all of this, you know, again it's accountability.

6 You know, if you don't have the accountability of
7 who is going to do something, then nobody is accountable,
8 and ultimately everybody is out trying to do it but nobody
9 is really responsible for doing it.

10 So if we could comment on that in relationship to
11 Steve's idea, which I think was a way to get there to
12 delineate those functions and set forth those separate
13 processes. If somebody has another idea? Because I don't
14 see one on the table before me right now, I'd like to hear
15 about it.

16 Gerry?

17 MR. CAULEY: Chairman Wellinghoff, I think I see
18 the questions separately but somewhat related, but
19 separately to start with.

20 As we've done our strategic planning the last few
21 months, we have come out with the need to not just be a
22 compliance organization and standards as our only business,
23 but to encourage operational excellence and be able to
24 recognize best practices and those kinds of things.

25 And what I'm very committed to is that those

1 things will help reliability. They will improve the
2 reliability performance of the entire industry, if we can
3 create this learning culture across the industry.

4 And the question is, is that a NERC role? Is
5 that a North American Transmission Forum? And in my view,
6 it doesn't really matter. I'm committed that it's going to
7 happen. And if we have to do it, we will do it. But I
8 really want to see the North American Transmission Forum
9 succeed and take on some of these responsibilities and
10 develop some of the best practices. Because I think
11 anything they can do to elevate the reliability performance,
12 the reliability game within the industry, I think that is
13 going to make our job easier and help us get more focused on
14 some issues.

15 So I don't see it as a competition. I see it as
16 really a role that needs to be filled and we need to sort
17 that out. So how do we do that?

18 We need to have the leadership of NERC, including
19 myself and the Board and other leaders, working with the
20 leadership of the Forum. There are some very senior folks
21 involved in the Forum. I know Billy Ball is very active. I
22 know Kevin, and some others, Terry Boston and others, are
23 very actively involved in that. And I think it is a
24 question of dialogue, of setting up the priorities.

25 So I don't think the success of the North

1 American Transmission Forum in taking on some of these
2 reliability improvement--Reliability Excellence initiatives
3 depends on forming another group.

4 I think it is really incumbent upon the NERC
5 organization and the Forum organization to deal with that
6 coordination. I don't want that to be translated as I
7 oppose Steve's proposal, because I think dialogue is good.
8 In fact, if we had another venue for dialogue, that would be
9 great. So I'm not making my comment--that's why I separate
10 the two. I think the dialogue and seeing us together is a
11 good thing, but in terms of the problem of the Forum and
12 NERC communicating and achieving the goals of Operational
13 Excellence, I think that's a leadership issue between the
14 two organizations.

15 MR. BURKE: I would tend to agree with what Gerry
16 said. I think, you know, in the past, and even earlier this
17 morning I laid out some of the differences between NERC and
18 the Transmission Forum, and I think that is going to evolve
19 over time as the two groups clarify what they're doing.

20 But I think at least for now, I don't see any
21 concern between the Transmission Forum trying to do what I
22 see as the core NERC role with respect to compliance
23 standards or issues. I haven't seen anything like that, and
24 I haven't seen anything that Gerry is saying that, you know,
25 we're going to be doing--the Forum is not doing audits.

1 They're not looking at it in terms of a compliance, and
2 check off the list, are you doing this, are you doing this;
3 but get in, bring some experts in, you know, talk to the
4 operators, what are you doing on different aspects. And
5 then also getting people together who can talk in a pretty
6 open forum about what are the issues that they're facing.
7 How do they address certain issues. And help develop some
8 best practices.

9 If at the same time NERC is out doing a series of
10 evaluations and comes across something that they think is a
11 best practice and should share throughout the industry, I
12 view that as a positive.

13 But I think it's going to have to evolve, as
14 Gerry said, between the leaderships of the two
15 organizations. I don't think we need a document at this
16 point in time specifying what those roles are. I think in
17 some cases we've had these conversations already, and I
18 think we'll see how it evolves. The Forum is continuing to
19 evolve.

20 CHAIRMAN WELLINGHOFF: Mike, you look troubled.

21 MR. SMITH: Well I'm perplexed at this concern
22 that somehow there's conflict or a challenge between the
23 Transmission Forum and NERC.

24 We are actively involved in both of those
25 organizations and are very proud of that involvement, and

1 feel that we get a lot out of our involvement in both of
2 those organizations. I've never had anybody in my company
3 or myself ever feel like, well, at some point we're going to
4 have to resolve this issue of who does that.

5 I mean, it was very--NERC championed the
6 development of the Transmission Owners and Operators Forum.
7 It was originally developed under your wing. And when that
8 baby was born and nurtured, you let it go, and now it's
9 maturing on its own. And I would hate to see us believe
10 now that it's out there that somehow there is a conflict
11 that we've got to resolve. That's the first I've ever heard
12 of it, and I don't think there is one.

13 CHAIRMAN WELLINGHOFF: Maybe I didn't hear
14 right, but I thought I heard John Anderson this morning talk
15 about functions, it sounded like functions that I thought
16 NATF was going to be doing.

17 MR. CAULEY: I think, just to clarify,
18 Mr. Chairman, we do anticipate that success of getting to
19 where we want to in five years or beyond really is achieving
20 a culture of reliability excellence, getting beyond the
21 minimum threshold of adequate reliability according to the
22 standards.

23 So we support that. We endorse that. to the
24 extent that NERC needs to take on activities to promote
25 that, we will. But I think to the extent that the Forum can

1 pick up those activities and run with them, that is all the
2 better for us.

3 So we are committed to the success of the Forum,
4 and it's not a subsidiary of NERC's. We can't tell them
5 specific things to do and a time line, but I don't think
6 there's any greater fan of success of the Transmission Forum
7 than us.

8 And I think when John was outlining some things
9 we hope to accomplish, it's more globally as the whole
10 enterprise, as the industry, we do believe in incenting
11 reliability excellence and positive behaviors. And the
12 question earlier about, you know, if people do good things
13 above and beyond, should they be getting credits, I think
14 that is going to be the success. Because running along
15 behind and whacking somebody with a stick once in awhile is
16 not going to get us to the level of reliability that we
17 contemplate we can get to.

18 So I think it is a shared role between the two
19 organizations. I think it is still not mature, so in terms
20 of exactly how much and what I think we still have to work
21 out, but I think that is a coordination issue.

22 CHAIRMAN WELLINGHOFF: Well we fully endorse and
23 agree that these activities need to be undertaken. I just
24 want to understand who is going to undertake them, and who
25 is going to be--

1 MR. JOHN Q. ANDERSON: Yes, I think you're right.
2 And Gerry is right, when I made those comments it was in
3 general we need from--from NERC's point of view, we are
4 going to make sure that there is a culture of excellence,
5 that there is a focus on how things are done, and not always
6 the stick, and so forth.

7 There is going to be I think a natural evolution
8 and a split to--I agree with what Mike said and with what
9 Kevin said, because the Transmission Forum, somewhat like
10 INPO is a private institution. It can be quiet. It can be
11 very open among themselves because it's not open to the
12 public.

13 At NERC we have pretty strict guidelines and
14 rules to be open to the public, and they're not exactly
15 Sunshine laws like you might have, but they're close. And
16 so there's that natural division of things that can be done
17 best on either side, and we are 100 percent supportive of
18 the Forum. As they said, we started it. It was under
19 NERC's wing.

20 And so I think my view would be that we let it
21 evolve. I see the potential for conflict or problems being
22 nil at this stage, and we let it evolve and see how it goes
23 and continue the informal discussions we have.

24 And then if anyone sees problems emerging, or
25 feels like there are crevices that aren't being worked on,

1 then we ought to raise those up right away and see what to
2 do about them.

3 CHAIRMAN WELLINGHOFF: So you don't anticipate
4 then the things that the Forum is intending to do to be part
5 of your business model at NERC?

6 MR. JOHN Q. ANDERSON: The things that the Forum
7 will do will be very crafted for what they can do best
8 inside there.

9 CHAIRMAN WELLINGHOFF: Right.

10 MR. JOHN Q. ANDERSON: To the extent we start
11 doing something that may overlap, informal discussion will
12 take place and we'll make sure we don't step on toes or
13 anything like that. So that's a good caution to raise,
14 though.

15 CHAIRMAN WELLINGHOFF: I'm not worried about
16 toes so much as budgets. I'm worried about costs and
17 efficiency for consumers, and to go to Chairman Kane's
18 point, to make sure that we can drive down costs for
19 consumers to do what we need to do to make sure that
20 reliability is functioning.

21 John?

22 MR. JOHN A. ANDERSON: I think Steve was before
23 me.

24 CHAIRMAN WELLINGHOFF: Yes, but he gets the last
25 words.

1 MR. JOHN A. ANDERSON: Oh, okay.

2 (Laughter.)

3 MR. JOHN A. ANDERSON: Well this isn't my last
4 word, I hope.

5 (Laughter.)

6 MR. JOHN A. ANDERSON: I think that John really
7 raised a point that is so true. We fought long and hard for
8 the legislation to make sure that it created a balanced--
9 fair, balanced, open, and inclusive organization, and we
10 have been very pleased with how most of that has come out.
11 And we want to make sure that it stays that way.

12 My members were somewhat concerned when the Forum
13 was first created, and it was in NERC. That was taken care
14 of completely when it was spun out. It started. That was
15 fine. I could see the need to start it, and it was spun
16 out. But to me the Transmission Forum is doing great work,
17 and we're supporting it, but it's not a fair, balanced,
18 open, and inclusive organization.

19 So what we see is a very bright line. For things
20 that are mandatory standards, that's a NERC job. For things
21 that are trying to do what the Forum is doing, that is their
22 job. And I don't see a conflict on that at all.

23 CHAIRMAN WELLINGHOFF: I see a similar bright
24 line. I just want to make sure we all understand what the
25 line is.

1 MR. JOHN A. ANDERSON: Okay.

2 CHAIRMAN WELLINGHOFF: Steve.

3 MR. WRIGHT: To the extent that my comments
4 started this, let me try to get it back on what I think is
5 the right level.

6 The concern I've got is not a Forum versus NERC
7 issue. Actually there are three parties here. It's FERC,
8 NERC, and the Forum. And I'll give you an example.

9 So the Vegetation Management Standard is one that
10 basically relies on what the practices are of the individual
11 utility, and that is what you are held to. So you develop
12 your standard and you go forward.

13 If that becomes the standard, then it's not
14 necessarily in the utility's interest to go define best
15 practice as their standard. So the way that a standard gets
16 written can have an impact with respect to whether in fact
17 you are encouraged to go off and adopt best practices.

18 That problem I think is a resolvable problem, so
19 I wouldn't say let's all go off and fix that problem. All
20 I'm saying is there's an interaction here with the way
21 standards are developed, and ultimately whether the Forum
22 will be successful and consequently it's three parties that
23 are involved in this conversation--FERC, NERC, and the
24 Forum--and it's thinking about those issues and how it will
25 evolve through time as this strategic plan is being written

1 for the Forum, and just the whole setup for this
2 institutional structure that I think is worthy of some
3 consideration.

4 CHAIRMAN WELLINGHOFF: I don't have anything else,
5 Cheryl. Thank you.

6 COMMISSIONER LaFLEUR: I wanted to ask folks on
7 the panel, I know that Mr. Tymofichuk had some things he
8 wanted to add, but to give folks a chance for anything that
9 hasn't been said, for any closing comments.

10 MR. CARTER: Thank you.

11 MR. BURKE: Thanks for your good discussion.
12 We've had a discussion on a lot of issues, and I think it
13 would probably be useful if in the informal discussions in
14 the past people could get back to NERC and indicate, you
15 know, acceptance of the priorities.

16 As I indicated before, when I ask our engineers
17 are these good priorities, they said yes. If I had asked
18 them to give me eight priorities, I might have gotten one or
19 two different. If I asked three engineers, I'd probably get
20 some slightly different sets. But I think it is important
21 that we move forward with what I think is a pretty good
22 list. And to get that sense back I think would be useful.
23 Maybe not in a formal process, but just in a sense of this
24 is a good list of priorities to move forward on.

25 COMMISSIONER LaFLEUR: As I said, I think we are

1 going to be taking comments--we will be taking comments
2 afterward, and we'll consider with staff whether there are
3 any questions we want to put out specifically.

4 MR. TYMOFICHUK: Two quick comments.

5 Earlier today Commissioner Norris asked a
6 question: Do we need a formal signoff process on the
7 priorities? Or for that matter, future priorities.

8 Whether it's a formal or informal signoff, I
9 believe NERC and FERC need to engage Canadian Governmental
10 authorities to sign on, if we're going to stay the course.
11 And if there's a course correction, another sign on.

12 And the other comment I want to make is really
13 for NERC. We heard Gerry Cauley today say that he's looking
14 at a 90 percent draft in short order, and I think that is
15 very commendable. I have spent time in my career in
16 standards in the CSA, Canadian Standards Association, the
17 IEC, and the NERC as well, and human nature is a funny
18 thing. When a first document comes out for comment, people
19 tend to not pay too much attention to it. You know, they
20 say, we'll wait for draft number two.

21 And then they might even wait for draft number
22 three, or the final ballot document. It's the same through
23 all those organizations, and others. So the challenge is
24 how can we get a document out at the first stage and people
25 start to chime in and buy in early. That would be more

1 efficient. It will get the process shortened, and we can
2 get to the races a lot faster.

3 Thank you very much.

4 MR. JOHN A. ANDERSON: I would like to make one
5 final comment. To me at least, NERC and FERC together have
6 plenty of resources, and tools, and procedures, and
7 processes to deal with the kind of issues that we've been
8 facing in the past. I call them traditional reliability
9 issues, for lack of a better term.

10 And it was just emphasized on the last panel, I
11 think we face some daunting tasks coming up. The
12 integration of renewables can have tremendous impacts on
13 reliability. And in fact I dig down into that thing and I
14 find that in one interconnection a loss of just 3 percent of
15 power can cause frequency to go down to 59.51 Hertz, and at
16 59.5 Hertz load-shedding comes and my members immediately
17 start getting--so we've got a big gulf of difference between
18 how much we can have out there.

19 The EPA regulations were mentioned, and that
20 causes real concern, especially if we lose a lot of
21 generators. The attempts to make the Grid smarter can cause
22 all kinds of privacy and cyber concerns. And who knows what
23 EMP and the other kinds of things like that are going to
24 bring.

25 What my concern is is that FERC and NERC may not

1 be the main players on some of these things. The debate up
2 on the Hill now is should Homeland Security be there, or
3 should Energy, or FERC be the kind of people that overlook
4 it. And I guess what I'd say is, we need to a good job of
5 making sure people know that the job being done is a good
6 job so that the responsibility isn't taken away.

7 And I don't think I'm just overly concerned. I
8 mean, I see a real debate on the Hill over say cyber
9 security over who is going to have jurisdiction. And I just
10 think that we can build on the kinds of things we are doing
11 here to make sure that the folks on the Hill know that
12 what's going on is a good job, and that you're up to the
13 tasks that are facing us. Because I think that there are
14 some people who don't think that we are up to the task. And
15 I think that would be a real disaster for all of us.

16 MR. WRIGHT: I guess the quick thought I would
17 leave is just I think we were given a huge responsibility by
18 the law in terms of trying to figure out how to make this
19 work. And the two places that I hope we will make
20 significant progress in the next year or two is being able
21 to explain the cost versus reliability tradeoff to the
22 public, and being able to develop a culture of excellence
23 across all of these organizations, between FERC, NERC, and
24 with the EES participants that focuses on trying to make
25 that happen.

1 I think if we are good at that, then we will be
2 viewed as being successful in implementing the law.

3 DCPSC CHAIRMAN KANE: Thank you. Well on behalf
4 of the States I want to thank you for the opportunity to
5 participate. Although our average consumer has no idea
6 about FERC or NERC, they think everything is done by their
7 local utility and that everything is our responsibility. We
8 certainly hope that this process does work, and that all of
9 the issues addressed can be worked out.

10 I will say also that NARUC does not support--does
11 not want to see a lot of new legislation, giving a lot of
12 new responsibility to other agencies, but does believe that
13 NERC and FERC and the industry should work together to
14 develop a national plan on electric reliability, including
15 cyber security vulnerabilities under existing authority
16 under the Federal Power Act, which I think does fairly
17 clearly also delineate what the role of the States are.

18 And so the only other thing I want to say is,
19 Commissioner Moeller, we're just about to announce that for
20 the second year in a row our commodity price under the
21 Standard Offer Service is going down.

22 (Laughter.)

23 COMMISSIONER MOELLER: Thank you.

24 MR. CAULEY: I just want to thank the Commission
25 for having the session today. I think each of the three now

1 that we've gone through in the past months, I've learned
2 quite a bit at each one of these, and today is no
3 exception.

4 I think we have at least the threads of ideas in
5 terms of process-wise how do we work better together in
6 terms of setting priorities, and we will take these back and
7 work on these.

8 We had planned to submit an updated standards
9 plan with priorities coming up soon in a few weeks in early
10 March. I think it is appropriate after this conversation
11 today to maybe broaden that to other issues and priorities,
12 and maybe take a bigger look at all the things that we're
13 doing in terms of prioritizing. But certainly today has
14 been very helpful in that light.

15 MR. JOHN Q. ANDERSON: Well just on behalf of
16 NERC, the NERC Board and staff and the whole organization, I
17 would really like to thank all of you for doing this.

18 Chairman Wellinghoff, we have over the months had
19 a lot of good contact with you. I know you were a supporter
20 of this, the first one, in putting this on. And
21 Commissioner LaFleur, the chair of this one, and working on
22 all the agendas and so forth, and have your staff available
23 to do that has been a big plus.

24 I also would like to thank you for the personal
25 time and involvement you have had in reliability and what

1 you've done through NERC. Each of you have been to our
2 meetings. Some of you multiple times. I think just about
3 everyone else from FERC around this table has been at
4 meetings, again multiple times in many cases. We really
5 appreciate that.

6 I think I can even turn behind me and, whatever
7 you call yourselves, back benchers, or--

8 (Laughter.)

9 MR. JOHN Q. ANDERSON: --puppeteers, maybe--

10 (Laughter.)

11 MR. JOHN Q. ANDERSON: Oh, sorry. You all have
12 been, many of you have been there, and so you have your
13 staff--I almost said your brains, but your staff there
14 observing and helping us.

15 But I know this takes personal commitment. You
16 all have your own priorities to set, and you've got a long
17 list of things, and reliability seems to have risen. We
18 appreciate that because we think it is important. It is
19 what we do. And your personal commitment to it means a
20 tremendous amount to us, and it has helped the working
21 relationship immensely. So thank you very much for this day
22 and for all the time and effort. And going forward I know
23 we're going to continue scaling the heights and doing a good
24 job.

25 Thank you.

1 COMMISSIONER LaFLEUR: Well thank you so much for
2 all those comments. We will think about Ed's comment about
3 how to involve the Canadian Government, the provincial
4 authorities at a future forum, or in other ways. So thank
5 you.

6 I'll ask my colleagues if they have anything to
7 add, or close?

8 COMMISSIONER NORRIS: I just had one thing that I
9 think falls from the questions you had, and just to
10 reiterate I think what John Q. said.

11 In the Forum and in the NERC discussions and the
12 FERC discussions, I too, Steve, think the Forum sounds like
13 a great venue for the transmission owners and operators to
14 get together and develop a culture and vet things in the
15 privacy of your own home. But I do think it is critically
16 important that the discussions about the standards
17 development process and our involvement at the NERC level,
18 and our involvement at the FERC level, be open, an
19 incredibly open process.

20 We are going to be about making choices. I think
21 we're going to take into consideration costs, and weighing
22 reliability, and benefits, and I just think for the value of
23 that process to reach the best decision, and in the self
24 interest the value of us being able to explain why we did
25 what we did, is very critical that this be done in a very

1 open fashion. So that it's a good, robust public record of
2 how we arrive at the decisions that we did.

3 Thank you all for your conversation today.

4 (Applause.)

5 COMMISSIONER LaFLEUR: Thanks to staff who did
6 all the work to put this together--Joe McClelland and his
7 team, but also Chris Young, Julie Greenison, Sarah McKinley,
8 and Jamal Hudson for making today happen.

9 And I don't know if you have anything to add?

10 CHAIRMAN WELLINGHOFF: I have no closing
11 remarks, other than again to thank you all. And, Cheryl,
12 you can close the workshop, please.

13 COMMISSIONER LaFLEUR: Thank you very much. We
14 will stand adjourned and look forward to your comments at
15 our future meetings.

16 (Whereupon, at 4:52 p.m., Tuesday, February 8,
17 2011, the technical conference in the above-entitled matter
18 was adjourned.)

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