



FERC's Reply to the 2003 Blackout

As a result of thorough investigation on the causes of the 2003 North American blackout, new regulation is proposed for approval by FERC.



THOSE OF YOU THAT HAVE BEEN following the Legal Issues column since the beginning of PAC World might remember last summer's article, in which we introduced the applicability and effectiveness of class action lawsuits as a means for redress in the event of a major power disaster. We presented this topic by analyzing the North American blackout of 2003, which impacted nearly 50 million people, and resulted in estimated financial losses of anywhere between 4 to 10 billion USD.

The blackout left in its trail many unanswered questions, and countless angry consumers, leading to a massive class action lawsuit, which found a culprit to hold liable, but did little to secure redress. One thing that remained certain was that further action had to be taken. While often such realizations lead to nothing more than hope for change, this instance turned out to be quite different.

Less than a year has passed, having kept a myriad of experts and regulators hard at work to devise a solution to the underlying failures, believed to have been at the core of the 2003 blackout. In the wake of the disaster the U.S. and Canada formed a bi-national team, or Task Force, responsible for conducting an investigation, and compiling a report, which identifies the fundamental causes of the massive outage. Following months of examination, the Task Force determined that "a substantial number of lines disconnected

when backup distance and phase relays operated under non-fault conditions." They further found that "the unnecessary operation of these relays contributed to cascading outages at the start of the blackout and accelerated the geographic spread of the cascade."

Ultimately what the Task Force, as well as NERC determined, was that a number of relays, although operating according to their settings, "operated so quickly that they impeded the natural ability of the electric system to hold together and did not allow time for operators to try to stop the cascade." The Task Force found that it was this "unnecessary" operation of the relays, which caused the eventual "geographic spread of the cascade." Further they held that once the cascade reached Ohio, it continued to spread further due to "dynamic power swings and the resulting instability."

Upon the completion of their independent investigations, both the Task Force and NERC set forth a set of recommendations aimed at

preventing such future disasters. As a result on May 21st 2009, FERC proposed for approval the Reliability Standard PRC-032-1 (Transmission Relay Loadability Reliability Standard, developed by NERC).

The Federal Energy Regulatory Commission has the authority to regulate the power industry and to impose mandatory reliability standards, as well as penalties, on entities engaged in the power market. If approved, the Reliability Standard PRC-032-1 will bind in such a manner the transmission owners, generator owners and distribution providers to whom it applies. Below are some key elements of the recommendations contained in the Notice of Proposed Rulemaking.

■ The Standard requires "certain transmission owners, generator owners, and distribution providers to set certain protective relays according to specific criteria to ensure that they detect only faults for which they must operate and do not operate unnecessarily during non-fault load conditions."

■ Under the Standard, "protective relay setting must provide essential facility protection for faults without preventing operation of the Bulk-Power System in accordance with established Facility Ratings."

We will continue to diligently monitor this matter, and will update you on any pivotal developments. ■

Biography

Iana is an American attorney, licensed to practice in the State of California. She received her B.A. from UCLA in 2001 with a major in Political Science, specializing in International Relations. In 2005 she was awarded the degree of Juris Doctor, from Loyola Law School. In 2009 she received her MBA from Ashford University. During her studies, Iana worked for Soft Power Int., where she became well acquainted with the engineering world. Upon graduating from Law School, Iana joined the Criminal Defense field, where she has devoted her talents to fight for her clients.