

SPP Staff appreciates the opportunity to provide input regarding the Draft Congestion Study. The following remarks have not been vetted with SPP members, and do not represent any approved official remarks on behalf of SPP's members.

Given the long lead times to get EHV transmission approved and constructed, DOE Congestion Studies need to look beyond 3-5 year horizons. DOE assessments regarding congestion need to go beyond reporting historical data and summarizing regional studies to reflect independent analytics based on more comprehensive systematic assessments which could be facilitated by DOE with key support by stakeholders of the bulk power system. It would seem appropriate for DOE to leverage EIPC/EIPSC modeling efforts, and/or other power systems modeling efforts such as NREL's ERGIS, to perform independent analyses to facilitate interregional planning among the Eastern Interconnection.

Figure ES-1 should remove transmission facilities in ERCOT that extend beyond the ERCOT footprint given generator leads in Texas and adjacent states for resources which are dedicated to ERCOT loads, as well as the extensive EHV developments in the Texas Panhandle that resulted from CREZ. Although most Canadian facilities shown on this map are part of the Eastern and Western Interconnections, only the Mexican Baja facilities are part of the two large North American grids covering the majority of the US which is the focus on the DOE Congestion Study.

Fig ES-3 is incomplete and outdated. SPP's existing footprint extends into the southern border of New Mexico and should be shown on this diagram. More importantly, queues are very volatile and subject to change based on needs, as well as technological advances. The latest open window for SPP Generation Interconnection requests included significant amounts of new (and renewed) requests for wind farm development in SPP, as well as significant solar developments in the southwest portions of SPP's footprint that are not shown on this map. The ERCOT transmission facilities shown on Fig ES-3 should be removed.

The following text in footnote 7 on page 18 of the pdf needs to be expanded from "In other regions, sufficient capacity already exists." to read "In other regions, sufficient capacity already exists or is being added based on approved plans."

The source for Fig ES-5 includes a link that does not appear to work.

On page 19 of the pdf, the following statement needs to be changed from "Because the gas plants are often sited closer to load centers than the capacity being displaced, transmission usage and congestion are reduced." to read "Because the gas plants are often sited closer to load centers than the capacity being displaced, transmission usage and congestion patterns shift."

The adverse reliability and economic impacts of the SONGS outage were mitigated to a large extent by the Sunrise Powerlink 500kV which provided very large benefits, well beyond expectations. The optionality and value of EHV transmission capacity is difficult to quantify given uncertainties, but the merits and payback of this enabling infrastructure must be noted to policy makers. According to WIKIPEDIA, SDG&E claimed "that the power line is necessary to support future growth of the San Diego region, and its economic benefits to the region will measure on the order of \$100 million per year. However, the project has been called one of the most controversial projects ever proposed." The merits of this project need to be reassessed in hindsight, and shared with

stakeholders/consumers to educate them on the value of robust EHV grid expansion, and least regrets expansion plans.

Given footnote 9 on page 22 of the pdf to note MISO's evolution, it would seem appropriate to include a statement somewhere in this section about the WAPA/Basin IS joining the SPP in 2015, since WAPA is a PMA under DOE and the first federal agency to join an organized market.

Section 4.7 on page 62 of the pdf needs to be expanded to include recent developments, study results and recommendations from MISO, SPP, ERCOT and others dealing with the reliability and economic implications of the CPP, as proposed by the EPA.

Fig 5.1 on page 66 of the pdf needs to remove the two Laramie River 345kV outlet lines in Wyoming that are actually part of the Eastern Interconnection. Although it's very much a detail, I think it's important for folks to note that lines within a footprint are not necessarily in that particular network.

On page 83 of the pdf, please revise "the SPP construction will serve new wind in the central and southern plains and address some reliability concerns in the Entergy region." to read "the SPP construction will better integrate new wind developments in the central and southern plains and enhance grid performance throughout the region."

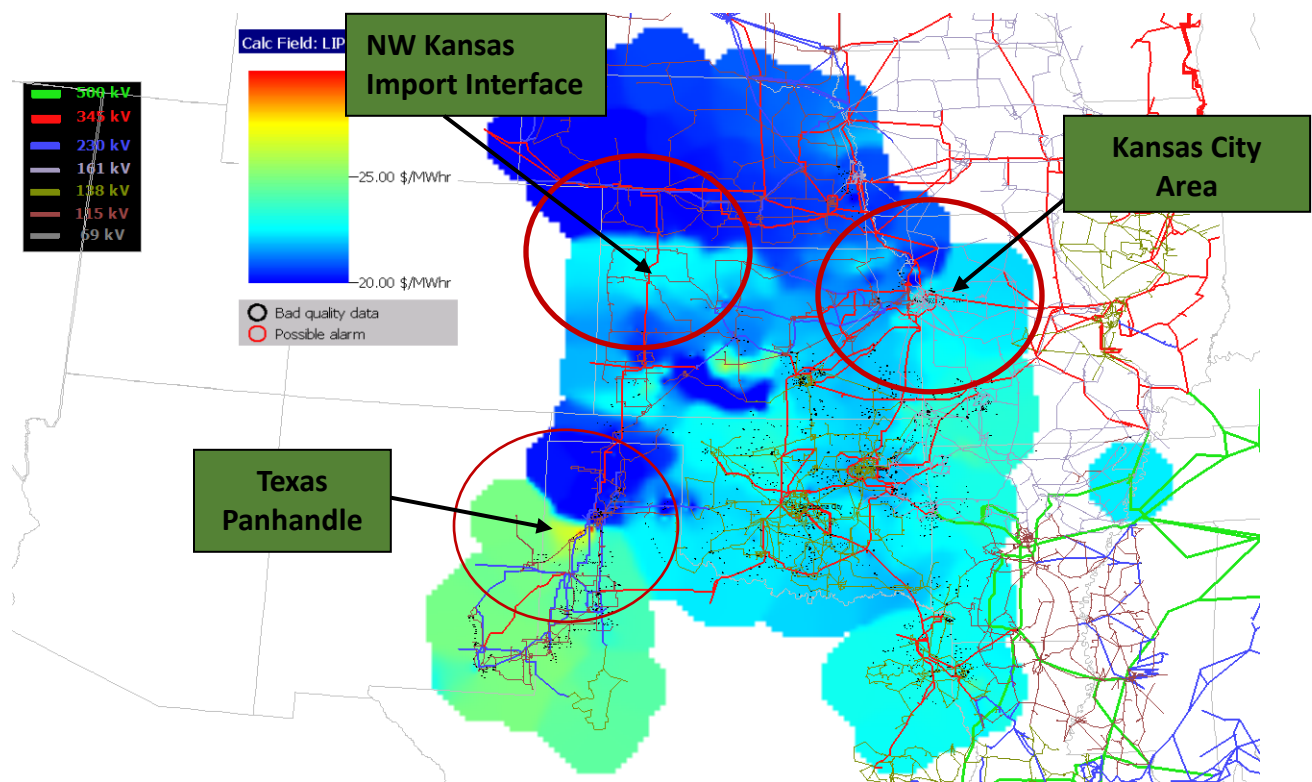
On page 86 of the pdf, some clarification is warranted, e.g., add "extra high voltage AC and" before "HVDC" in the Tres Amigas bullet. Also add "HVDC" line before "line" in the two Clean Line bullets.

On page 107 of the pdf, change "Midwest" in the sentence starting with "Alabama Power..." to be "SPP" to clarify the source of those renewables not being in MISO.

On page 112 of the pdf, change "Midwest ISO" to read "Midcontinent ISO". Be careful with this edit and make sure we keep "Midwest ISOs and RTOs" in the next sentence.

The bulk power system is very dynamic and congestion patterns are constantly changing as a result of load patterns, generation and/or transmission outages as well as new facility additions. SPP identified three Frequently Constrained Areas (FCAs) prior to the start of the SPP Integrated Marketplace on March 1, 2014. SPP, at the FERC's direction, applies more stringent energy market mitigation processes in the FCA relative to the rest of the SPP footprint. Figure 1 identifies the three areas. The study performed by Potomac Economics relied on 2011-2012 data from SPP's real-time energy imbalance market and can be found at <http://www.spp.org/publications/BODAGD&BKGD121013.pdf>.

SPP Frequently Congested Areas



SPP is currently studying the impacts of transmission upgrades during 2013 and 2014, as well as impacts from the implementation of the SPP Integrated Marketplace and consolidation of the footprint into a single balancing authority.

SPP has also reported that sixty percent (60%) of the auction revenue rights on paths into the frequently constrained areas have been allocated, comparable to a 90% allocation percentage on paths in other areas of the footprint. An auction revenue right is an instrument that allows the holder to acquire a financial transmission right.

If you have any questions or comments about these SPP staff remarks, please don't hesitate to contact me. Sincerely,

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