SCE Mesa 500-kV Substation Project

CPUC Response to SCE Data Request (5/16/2016)

SCE Request	CPUC Response
1a. Re the One 1600 MVA Transformer Alternative, please provide the PowerWorld Simulator model utilized to evaluate this alternative and arrive at the results contained in Appendix B.	See attached data CD.
1b. Re the One 1600 MVA Transformer Alternative, does the proposed 1600 MVA transformer consist of three 533 MVA single phase transformers or is it a single 3-Phase 1600 MVA transformer?	The 1600-MVA transformer bank consists of three single-phase 533 MVA transformers.
1c. Re the One 1600 MVA Transformer Alternative, please confirm the normal and emergency rating of the 160 MVA transformer used by Elcon in performing the analysis.	The nominal rating of the transformer bank is 1600 MVA. The emergency rating of the transformer bank is 1920 MVA.
1d. Re the One 1600 MVA Transformer Alternative, the DEIR states that the transformer assessed in this alternative is a "1600 MVA 550/220 kV transformer with greater than 10% impedance." Was a system study performed to determine the impedance for the 1600 MVA transformer represented in the PowerWorld Simulator model? If not, how was the impedance determined?	An impedance of 10 percent was selected as a minimum value for satisfactory transformer performance.
2a. Re the Two 1120 MVA Transformer Alternative, please provide the PowerWorld Simulator model utilized to evaluate this alternative and arrive at the results contained in Appendix B.	See attached data CD.