Southern California Edison
MESA PTC A.15-03-003

DATA REQUEST SET A1503003 ED-SCE-05

To: ENERGY DIVISION
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Title: Power System Planner
Dated: 09/18/2015

Question 01.a:

CAISO transmission planning standards do not allow for non-consequential load shedding in high-density urban areas. SCE stated in its response to Data Request #2, Q.4-01(B) that load shedding in other areas (i.e. areas that are not identified as high-density urban areas) "would not be effective." Provide substantiation to support SCE's conclusion:

A. State whether load shedding in Mission Viejo could be used after the first outage in either studied N-1-1 contingency (i.e., outage of the Eco-Miguel 500-kV Transmission Line followed by an outage of the Ocotillo-Suncrest 500-kV Transmission Line, or outage of the Lewis–Serrano No. 1 230-kV Transmission Line followed by an outage of the Serrano–Villa Park No. 1 230-kV Transmission Line) to meet reliability standards.

Response to Question 01.a:

Per NERC TPL standards, load shed is not permissible as a system adjustment following an N-1 contingency.

Figure 5.1A-1: Excerpt from NERC TPL-001-4 Table 1

Category	Initial Condition	Event [1]	Fault Type [2]	BES Level [3]	Interruption of Firm Transmission Service Allowed [4]	Non-Consequential Load Loss Allowed
P1 Single Contingency	Normal System	Loss of one of the following: 1. Generator 2. Transmission Circuit 3. Transformer [5] 4. Shunt Device [6]	3Ø	EHV, HV	No[9]	No[12]
		5. Single Pole of a DC line	SLG			

If the question is intended to address the availability of load shed following the second contingency of either N-1-1 listed above, Mission Viejo is not defined by the CAISO to be a "high density urban load area" and therefore load shedding in this area could be implemented. This load shedding would not be effective to address a contingency on the Serrano Corridor. Load shedding in Mission Viejo would improve voltage performance following the N-1-1 contingency in SDG&E. The effectiveness of this load shed is described in SCE's response to Data Request Question 01.b.