



Overloaded Facility	Contingency (All and Worst P6)	Category	Category Description	Loading % (Baseline Scenarios)									Loading % (Sensitivity Scenarios)			Project & Potential Mitigation Solutions
				2023 Summer Peak	2026 Summer Peak	2031 Summer Peak	2023 Winter Peak	2026 Winter Peak	2031 Winter Peak	2023 Spring Off-Peak	2026 Spring Off-Peak	2031 Spring Off-Peak	2026 SP High CEC Forecast	2023 SP Heavy Renewable & Min Gas Gen	2023 OP Heavy Renewable & Min Gas Gen	
Neenack — Bailey/Westpack Tap 66 kV	All elements in sevice	P0	N-0	<100%	<100%	<100%	N/A	N/A	N/A	<100%	106.8	N/A	<100%	<100%	<100%	Congestion management
	Bailey – Pardee & Baily – Pastoria 230 kV lines or Bailey 230/66 kV transformers	P6	L-1/L-1 or 1/T-1	<100%	<100%	<100%	N/A	N/A	N/A	<100%	<100%	N/A	103.4	<100%	103.8	Split Antelope–Bailey 66 kV System per existing SCE operating procedure after initial contingency
Big Creek 3 – Rector 230 kV No. 1	Big Creek 1 – Rector 230 kV line	P1	L-1	<100%	<100%	100.9	N/A	N/A	N/A	<100%	<100%	N/A	<100%	<100%	<100%	Existing Big Creek RAS
Windhub 500/230 kV Transformer No. 3 or No. 4	Remaining Windhub 500/230 kV Transformer No. 3 or No. 4	P1	T-1	<100%	<100%	117.1	N/A	N/A	N/A	<100%	<100%	N/A	<100%	107.1	<100%	Congestion management; Planned Windhub CRAS identified in GIP
Windhub 500/230 kV Transformer No. 1 or No. 2	Remaining Windhub 500/230 kV Transformer No. 1 or No. 2	P1	T-1	<100%	<100%	<100%	N/A	N/A	N/A	<100%	<100%	N/A	<100%	141.1	<100%	
Whirlwind 500/230 kV Transformers	Loss of one Whirlwind 500/230 kV Transformer	P1	T-1	<100%	<100%	<100%	N/A	N/A	N/A	<100%	<100%	N/A	<100%	120.4	106.39	Existing Whirlwind RAS
	Loss of two Whirlwind 500/230 kV Transformers	P6	T-1/T-1	121.8	121.5	<100%	N/A	N/A	N/A	<100%	166.7	N/A	121.5	249.6	217	
Antelope 230 kV/66 kV transformers	Loss of two Antelope 230 kV/66 kV transformers	P6	T-1/T-1	123.3	123	179.7	N/A	N/A	N/A	115.8	<100%	N/A	139.3	<100%	<100%	Energize existing spare after intial contingency



Overloaded Facility	Contingency (All and Worst P6)	Category	Category Description	Loading % (Baseline Scenarios)									Loading % (Sensitivity Scenarios)			Project & Potential Mitigation Solutions
				2023 Summer Peak	2026 Summer Peak	2031 Summer Peak	2023 Winter Peak	2026 Winter Peak	2031 Winter Peak	2023 Spring Off-Peak	2026 Spring Off-Peak	2031 Spring Off-Peak	2026 SP High CEC Forecast	2023 SP Heavy Renewable & Min Gas Gen	2023 OP Heavy Renewable & Min Gas Gen	
Big Creek 2 – Big Creek 3 230 kV	Big Creek 1–Rector & Big Creek 8–Big Creek 3 230 kV lines	P6	L-1/L-1	126.6	126.0	132.7	N/A	N/A	N/A	114.37	<100%	N/A	125.66	126.2	114.64	Reduce Big Creek generation after initial contingency
	Big Creek 1–Rector & Big Creek 8–Big Creek 2 230 kV lines	P6	L-1/L-1	110.7	110.6	115.6	N/A	N/A	N/A	<100%	<100%	N/A	110.37	110.4	<100%	
Big Creek 3 – Rector 230 kV No. 1	Big Creek 3 – Rector No. 2 and Big Creek 1 – Rector 230 kV lines	P6	L-1/L-1	149.1	148.4	Diverged	N/A	N/A	N/A	141.1	<100%	N/A	150.3	144.7	134.5	Existing Big Creek RAS
Big Creek 3 – Rector 230 kV No. 2	Big Creek 3 – Rector No. 1 and Big Creek 1 – Rector 230 kV lines	P6	L-1/L-1	120.4	119.4	Diverged	N/A	N/A	N/A	Diverged	<100%	N/A	120.4	115.9	108.1	
Big Creek 1 – Rector 230 kV	Big Creek 3 – Rector No. 1 and No. 2 230 kV lines	P7	L-2	142.8	141.1	Diverged	N/A	N/A	N/A	134	<100%	N/A	142.8	137.9	127.7	
Springville–Big Creek 4 230 kV	Big Creek 3 – Rector No. 1 and Big Creek 1 – Rector 230 kV lines	P6	L-1/L-1	101.6	101.2	<100%	N/A	N/A	N/A	<100%	<100%	N/A	<100%	102.1	105.6	
Big Creek 8 –Big Creek 3 230 kV	Big Creek 2 – Big Creek 3 and Big Creek 1 – Rector 230 kV lines	P6	L-1/L-1	133.8	133.1	140.4	N/A	N/A	N/A	120.9	<100%	N/A	132.8	133.4	121.2	
Big Creek 8 –Big Creek 2 230 kV		P6	L-1/L-1	117.0	117.0	122.7	N/A	N/A	N/A	103.9	<100%	N/A	116.7	116.7	104.2	

Study Area: **SCE Tehachapi & Big Creek Corridor**
Thermal Overloads



Overloaded Facility	Contingency (All and Worst P6)	Category	Category Description	Loading % (Baseline Scenarios)									Loading % (Sensitivity Scenarios)			Project & Potential Mitigation Solutions
				2023 Summer Peak	2026 Summer Peak	2031 Summer Peak	2023 Winter Peak	2026 Winter Peak	2031 Winter Peak	2023 Spring Off-Peak	2026 Spring Off-Peak	2031 Spring Off-Peak	2026 SP High CEC Forecast	2023 SP Heavy Renewable & Min Gas Gen	2023 OP Heavy Renewable & Min Gas Gen	
Magunden–Pastoria No. 1 or No. 2 230 kV lines	Magunden–Pastoria No. 1 or No. 2 and No. 3 230 kV lines	P6	L-1/L-1	<100%	<100%	<100%	N/A	N/A	N/A	104.9	<100%	N/A	<100%	<100%	123.1	
Pardee–Warne Tap 230 kV line	Pardee–Patoria and Bailey–Pastoria 230 kV lines	P6	L-1/L-1	116.2	103.2	<100%	N/A	N/A	N/A	<100%	<100%	N/A	<100%	117.9	<100%	Existing Pastoria Energy Faciity RAS
Warne Tap–Pastoria 230 kv line		P6	L-1/L-1	108.11	<100%	<100%	N/A	N/A	N/A	<100%	<100%	N/A	<100%	109.8	<100%	
Bailey–Pastoria 230 kV line	Pardee–Pastoria and Pardee–Warne Tap-Pastoria 230 kV lines	P6	L-1/L-1	101.7	<100%	<100%	N/A	N/A	N/A	<100%	<100%	N/A	<100%	101.6	<100%	
Pardee–Pastoria 230 kV line	Bailey–Pastoria and Pardee–Warne Tap-Pastoria 230 kV lines	P6	L-1/L-1	<100%	<100%	<100%	N/A	N/A	N/A	<100%	<100%	N/A	<100%	101.5	<100%	

Study Area: SCE Tehachapi & Big Creek Corridor

High/Low Voltages



Substation	Contingency (All and Worst P6)	Category	Category Description	Voltage PU (Baseline Scenarios)									Voltage PU (Sensitivity Scenarios)			Project & Potential Mitigation Solutions
				2023 Summer Peak	2026 Summer Peak	2031 Summer Peak	2023 Winter Peak	2026 Winter Peak	2031 Winter Peak	2023 Spring Off-Peak	2026 Spring Off-Peak	2031 Spring Off-Peak	2026 SP High CEC Forecast	2023 SP Heavy Renewable & Min Gas Gen	2023 OP Heavy Renewable & Min Gas Gen	
Bailey – Antelope 66 kV system	Bailey–Pardee & Bailey–Pastoria 230 kV lines or Bailey 230/66 kV transformers	P6	L-1/L-1 or T-1/T-1	> 0.9	> 0.9	Diverged	N/A	N/A	N/A	Diverged	> 0.9	N/A	> 0.9	> 0.9	> 0.9	Split Antelope–Bailey 66 kV System per existing SCE operating procedure after initial contingency

Study Area: SCE Tehachapi & Big Creek Corridor

Voltage Deviation



Substation	Contingency (All and Worst P6)	Category	Category Description	Post Cont. Voltage Deviation % (Baseline Scenarios)									Post Cont. Voltage Deviation % (Sensitivity Scenarios)			Project & Potential Mitigation Solutions
				2023 Summer Peak	2026 Summer Peak	2031 Summer Peak	2023 Winter Peak	2026 Winter Peak	2031 Winter Peak	2023 Spring Off-Peak	2026 Spring Off-Peak	2031 Spring Off-Peak	2026 SP High CEC Forecast	2023 SP Heavy Renewable & Min Gas Gen	2023 OP Heavy Renewable & Min Gas Gen	

No voltage deviation related violations identified

Study Area: SCE Tehachapi & Big Creek Corridor

Transient Stability



Contingency	Category	Category Description	Transient Stability Performance						Potential Mitigation Solutions
			Baseline Scenarios				Sensitivity Scenarios		
			2023 Spring Off-Peak	2026 Summer Peak	2031 Summer Peak	2031 Spring Off-Peak	2026 SP High CEC Forecast	2023 OP Heavy Renewable & Min Gas Gen	
Magunden-Springville No. 1, 3-PH Fault on Magunden, Normal Clearing (5 Cycles)	P1	N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Magunden-Vestal No. 1, 3-PH Fault on Magunden, Normal Clearing (5 Cycles)	P1	N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Magunden-Vestal No. 2, 3-PH Fault on Magunden, Normal Clearing (5 Cycles)	P1	N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Big Creek 1-Rector & Rector-Vestal No. 1, SLG Fault on Big Creek 1, Delayed Clearing (15 Cycles)	P4	Stuck Breaker	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Big Creek 3-Rector No. 1 & Rector-Vestal No. 2, SLG Fault on Big Creek 1, Delayed Clearing (15 Cycles)	P4	Stuck Breaker	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Big Creek 4-Springville & Magunden-Springville No. 2, SLG Fault on Big Creek 4, Delayed Clearing (15 Cycles)	P4	Stuck Breaker	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Magunden-Pastoria No. 1 & Bailey-Pastoria, SLG Fault on Pastoria, Delayed Clearing (15 Cycles)	P4	Stuck Breaker	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Magunden-Pastoria No. 2 & Pardee-Pastoria, SLG Fault on Pastoria, Delayed Clearing (15 Cycles)	P4	Stuck Breaker	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Magunden-Pastoria No. 3 & Pardee-Pastoria-Warne, SLG Fault on Pastoria, Delayed Clearing (15 Cycles)	P4	Stuck Breaker	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Pardee-Pastoria & Pardee-Vincent, SLG Fault on Pardee, Delayed Clearing (15 Cycles)	P4	Stuck Breaker	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Bailey-Pardee & Pardee-Vincent No. 1, SLG Fault on Pardee, Delayed Clearing (15 Cycles)	P4	Stuck Breaker	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Pardee-Pastoria-Warne & Pardee-Santa Clara, SLG Fault on Pardee, Delayed Clearing (15 Cycles)	P4	Stuck Breaker	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Mesa-Vincent2 No.2 & Vincent2-Santa Clara, SLG Fault on Vincent 2, Delayed Clearing (15 Cycles)	P4	Stuck Breaker	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Big Creek 1-Rector & Big Creek 3-Rector No. 1, 3PH Fault on Big Creek 1	P6	N-1/N-1	Unstable	Unstable	No Issues	N/A	No Issues	No Issues	Existing Big Cig Creek RAS
Big Creek 3-Rector No. 2 & Big Creek 1-Rector, 3PH Fault on Rector, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	Unstable	No Issues	N/A	WECC criteria not met	No Issues	Existing Big Cig Creek RAS
Big Creek 3-Rector No.2 & Big Creek 4-Springville, 3PH Fault on Big Creek 3, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	Unstable	No Issues	N/A	No Issues	No Issues	Existing Big Cig Creek RAS
Big Creek 4-Springville & Rector-Springville, 3PH Fault on Big Creek 4, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Rector-Vestal Nos. 1 & 2, 3PH Fault on Rector, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Magunden-Springville Nos. 1 & 2, 3PH Fault on Magunden, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Magunden-Vestal Nos. 1 & 2, 3PH Fault on Magunden, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Magunden-Vestal Nos. 1 & 2, 3PH Fault on Magunden, Normal Clearing (5 Cycles)- With BC RAS	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation

Study Area: SCE Tehachapi & Big Creek Corridor

Transient Stability



Contingency	Category	Category Description	Transient Stability Performance						Potential Mitigation Solutions
			Baseline Scenarios				Sensitivity Scenarios		
			2023 Spring Off-Peak	2026 Summer Peak	2031 Summer Peak	2031 Spring Off-Peak	2026 SP High CEC Forecast	2023 OP Heavy Renewable & Min Gas Gen	
Big Creek 1-Rector & Big Creek 3-Big Creek 8, 3PH Fault on Rector, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Magunden-Vestal No. 1 & Rector-Springville, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Magunden-Vestal No. 2 & Rector-Springville, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Rector-Vestal No. 1 & Magunden-Springville No. 1, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Rector-Vestal No. 2 & Magunden-Springville No. 1, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Magunden-Vestal No. 1 & Magunden-Springville No. 1, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Magunden-Vestal No. 2 & Magunden-Springville No. 1, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Rector-Vestal No. 1 & Rector-Springville, 3PH Fault on Rector, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Rector-Vestal No. 2 & Rector-Springville, 3PH Fault on Rector, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Big Creek 3-Rector No. 1 & Rector-Springville, 3PH Fault on Rector, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Magunden-Pastoria Nos. 1 & 2, 3PH Fault on Magunden	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Magunden-Pastoria Nos. 1 & 3, 3PH Fault on Magunden, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Magunden-Pastoria Nos. 2 & 3, 3PH Fault on Magunden, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Bailey-Pastoria & Pardee-Pastoria, 3PH Fault on Pastoria, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Bailey-Pastoria & Pardee-Pastoria-Warne, 3PH Fault on Pastoria, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Pardee-Pastoria & Pardee-Pastoria-Warne, 3PH Fault on Pastoria, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Pardee-Pastoria & Bailey-Pardee, 3PH Fault on Pardee, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Bailey-Pardee & Pardee-Pastoria-Warne, 3PH Fault on Pardee, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Antelope-Magunden Nos. 1 & 2, 3PH Fault on Magunden, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Antelope-Magunden No. 1 & Pardee-Pastoria-Warne, 3PH Fault on Magunden, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Antelope-Magunden No. 2 & Pardee-Pastoria-Warne, 3PH Fault on Magunden	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation

Study Area: SCE Tehachapi & Big Creek Corridor

Transient Stability



Contingency	Category	Category Description	Transient Stability Performance						Potential Mitigation Solutions
			Baseline Scenarios				Sensitivity Scenarios		
			2023 Spring Off-Peak	2026 Summer Peak	2031 Summer Peak	2031 Spring Off-Peak	2026 SP High CEC Forecast	2023 OP Heavy Renewable & Min Gas Gen	
Antelope-Pardee & Pardee-Pastoria-Warne, 3PH Fault on Pardee, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Bailey-Pastoria & Bailey-Pardee, 3PH Fault on Pardee, Normal Clearing (5 Cycles)	P6	N-1/N-1	WECC criteria not met	WECC criteria not met	No Issues	N/A	WECC criteria not met	No Issues	Split Antelope–Bailey 66 kV System per existing SCE operating procedure after initial contingency
Big Creek 1-Rector & Big Creek 2-Big Creek 8, 3PH Fault on Rector, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Antelope-Pardee & Bailey-Pastoria, 3PH Fault on Pardee, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Bailey-Pardee & Pastoria-Edmonston, 3PH Fault on Pardee, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Bailey-Pastoria & Pastoria-Edmonston, 3PH Fault on Pastoria, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Pardee-Vincent & Pardee-Vincent2 , 3PH Fault on Pardee, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Rector SVC & Magunden-Vestal No. 1, 3PH Fault on Magunden, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Rector SVC & Magunden-Vestal No. 2, 3PH Fault on Magunden, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Rector SVC & Magunden-Springville No. 1, 3PH Fault on Magunden, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Rector SVC & Magunden-Springville No. 2, 3PH Fault on Magunden, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Rector SVC & Magunden-Pastoria No. 1, 3PH Fault on Magunden, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Rector SVC & Magunden-Pastoria No. 2, 3PH Fault on Magunden, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Rector SVC & Magunden-Pastoria No. 3, 3PH Fault on Magunden, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Rector SVC & Antelope-Magunden No. 2, 3PH Fault on Magunden, Normal Clearing (5 Cycles)	P6	N-1/N-1	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Loss of Springville Substation, SLG Fault on Springville 230kV Bus, N-RBD Relay Failure, Delayed Clearing (30 cycles)	P5	Non-Redundant Relay	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Loss of Big Creek 1 Substation, SLG Fault on Big Creek 1 230kV Bus, N-RBD Relay Failure, Delayed Clearing (30 cycles)	P5	Non-Redundant Relay	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Loss of Big Creek 2 Substation, SLG Fault on Big Creek 2 230kV Bus, N-RBD Relay Failure, Delayed Clearing (30 cycles)	P5	Non-Redundant Relay	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Loss of Big Creek 4 Substation, SLG Fault on Big Creek 4 230kV Bus, N-RBD Relay Failure, Delayed Clearing (30 cycles)	P5	Non-Redundant Relay	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation

Study Area: SCE Tehachapi & Big Creek Corridor

Transient Stability



Contingency	Category	Category Description	Transient Stability Performance						Potential Mitigation Solutions
			Baseline Scenarios				Sensitivity Scenarios		
			2023 Spring Off-Peak	2026 Summer Peak	2031 Summer Peak	2031 Spring Off-Peak	2026 SP High CEC Forecast	2023 OP Heavy Renewable & Min Gas Gen	
Loss of Big Creek 8 Substation, SLG Fault on Big Creek 8 230kV Bus, N-RBD Relay Failure, Delayed Clearing (30 cycles)	P5	Non-Redundant Relay	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation
Big Creek 3-Rector No. 2 & Rector-Springville, 3PH Fault on Big Creek 3, Normal Clearing (5 Cycles)	P7	DCTL	No Issues	No Issues	No Issues	N/A	No Issues	No Issues	No violation

Study Area: SCE Tehachapi & Big Creek Corridor



Single Contingency Load Drop

Worst Contingency	Category	Category Description	Amount of Load Drop (MW)												Potential Mitigation Solutions
			2023 Summer Peak	2026 Summer Peak	2031 Summer Peak	2023 Winter Peak	2026 Winter Peak	2031 Winter Peak	2023 Spring Off-Peak	2026 Spring Off-Peak	2031 Spring Off-Peak	2026 SP High CEC Forecast	2023 SP Heavy Renewable & Min Gas Gen	2023 OP Heavy Renewable & Min Gas Gen	

No single contingency resulted in total load drop of more than 250 MW

Study Area: SCE Tehachapi & Big Creek Corridor



Single Source Substation with more than 100 MW Load

Substation	Load Served (MW)												Potential Mitigation Solutions
	2023 Summer Peak	2026 Summer Peak	2031 Summer Peak	2023 Winter Peak	2026 Winter Peak	2031 Winter Peak	2023 Spring Off-Peak	2026 Spring Off-Peak	2031 Spring Off-Peak	2026 SP High CEC Forecast	2023 SP Heavy Renewable & Min Gas Gen	2023 OP Heavy Renewable & Min Gas Gen	

No single source substation with more than 100 MW