TEP Reliability Must Run

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Ron Belval

Tucson Electric Power

TEP 2014 Load Serving Analysis Summary

year	TEP Study System Forecasted Peak[1]	Study System Load (MW)	Metric	Metric Value (MW)	Limiting Element	Limiting Outage	TEP Study System Generation Dispatch	
							Station	Dispatch
2014	2,533	2,345	SIL	2,392	North Loop - DMP 138kV circuit #1	North Loop - Rillito 138kV ckt #1 & North Loop - West Ina 138kV ckt #1	N/A	N/A
		2,820	MLSC	2,820	North Loop - DMP 138kV circuit #1	North Loop - Rillito 138kV ckt #1 & North Loop - West Ina 138kV ckt #1	ALL within study area	551MW
		2,533	RMR	294	N/A	N/A	SUNDT #3 SUNDT #2 SUNDT #1 DMP CT#1	100MW 75MW 75MW 44MW

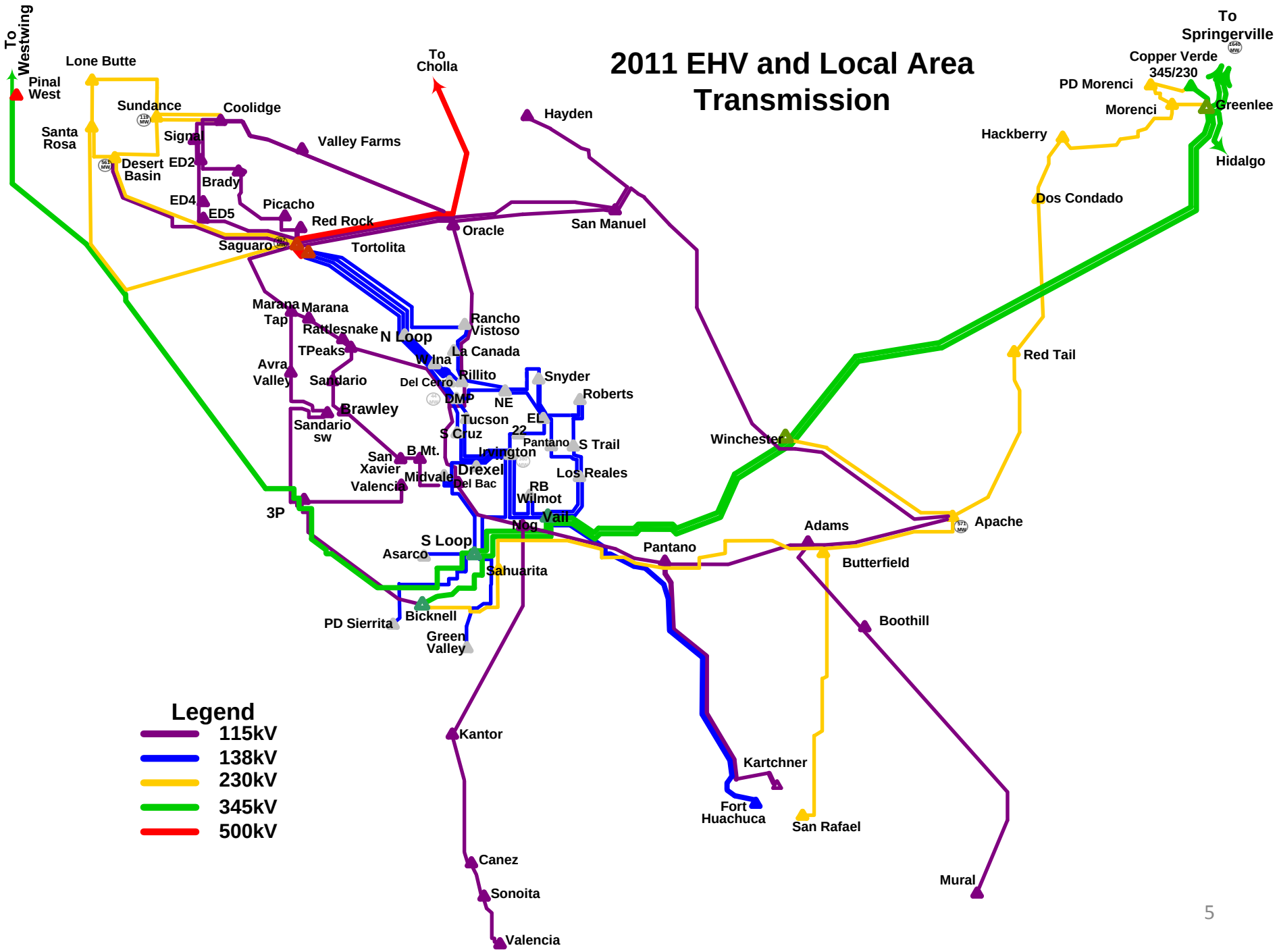
2014 & 2021 Annual RMR Cost Estimates

year	TEP Study System Forecasted Peak[1]	Study System Load (MW)	Metric	Metric Value (MW)	TEP Study System Generation Dispatch		Annual Incremental RMR Generation Cost Estimate
					Station	Dispatch	
2014	2,533	2,533	RMR	294	SUNDT #3 SUNDT #2 SUNDT #1 DMP CT#1	100MW 75MW 75MW 44MW	$186,774
2021	2,880	2,880	RMR	338	SUNDT #3 SUNDT #2 SUNDT #1 DMP CT#1 SUNDTCT#1 SUNDTCT#2	100MW 75MW 75MW 44MW 22MW 22MW	$1,188,526

TEP 2021 Load Serving Analysis Summary

year	TEP Study System Forecasted Peak[1]	Study System Load (MW)	Metric	Metric Value (MW)	Limiting Element	Limiting Outage	TEP Study System Generation Dispatch	
							Station	Dispatch
2021	2,880	2,504	SIL	2,575	VAIL - TECHPARK 138kV circuit #1	PINALWES - SOUTH345kV #1 & VAIL - SOUTH 345kV #1	N/A	N/A
		3,079	MLSC	3,079	NL. EXP - NARANJA 138kV circuit #1	North Loop - Rillito 138kV ckt #1 & North Loop - West Ina 138kV ckt #1	ALL within study area	551MW
		2,880	RMR	338	VAIL - TECHPARK 138kV circuit #1	PINALWES - SOUTH345kV #1 & VAIL - SOUTH 345kV #1	SUNDT #3 SUNDT #2 SUNDT #1 DMP CT#1 SUNDTCT#1 SUNDTCT#2	100MW 75MW 75MW 44MW 22MW 22MW

2011 EHV and Local Area Transmission



2014 & 2021 Comparative Analysis

RMR Mitigation Option		2014	2021
1	Annual Incremental RMR Generation Cost Estimate	$186,774	$1,188,526
2	RMR New Facilities Mitigation Cost Estimate	$12,500,000	$132,200,000

Comparison of ALternatives

- Cost of RMR is significantly less than new facilities to eliminate the RMR condition
  - Ratio of Facility Cost / RMR Cost
    - 2014 = 66.9
    - 2021 = 111.2
- Facilities to eliminate RMR cannot be justified.