RMR Exit for Spencer 5

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Summary

ERCOT staff analysis of the Spencer 5 RMR exit strategy identified the need for several transmission line upgrades as well as transformer and capacitor bank additions.

To allow exit of RMR prior to completion of the identified projects, Remedial Action Plans (RAPs) and Mitigation Plans (MPs) were developed.

List of RAPs needed for 2010**

RAP/MPs Description		Contingency/Overload pair	
1	Carrollton MP	L: Lewisville Switch (645)-Highland E 138 kV(1970) line C: Lewisville Switch (645)-Highland(664)	
		L: Lewisville Switch (645)-Highland E 138 kV(1970) line C: Highland (664) - Canyon (668)	
4	Frisco RAP	L: Collins (2370) – Frisco (681) 138 kV line C: Denton Steam – Corinth; Teasley to Pockrus	
6	Frisco Voltage MP	L: Low voltage at Frisco and Panther Creek C: Collin to Frisco 138 kV line	
7	Arco-Krugerville RAP	L: Collins (2370) to Frisco (681) 138 kV line After Operation of Carrollton RAP or Lake Pointe RAP	

** based on 2010 SSWG load level and one unit unavailable
need for RAPs prior to completion of exit strategy projects will be reviewed each year

Permanent RMR Exit Solutions

	Project	Cost	Estimated Completion Date
1	RD Wells to Hickory 69kV (Denton)	$10,167,000*	June 2010
2	Upgrade Lewisville Switch to Highland (TNMP) 138 kV line to 290MVA or above	$521,170*	May 2015
3	Add second 345/138 kV autotransformer at Lewisville switching substation	$17,165,150*	June 2012
4	Upgrade Collin to Frisco 138 kV line to 326 MVA	$981,594*	June 2013
5	Upgrade West Denton to Jim Christal to North Denton138 kV line to 250 MVA or above	$5,000,000	Summer 2012
6	Additional capacitor banks at Navo and Panther Creek Substations (interim for Mustang capacitor bank)	Included in item 7	2011
7	New Mustang Substation and capacitor bank	$2,760,500*	June 2013
8	Upgrade Arco to Krugerville 138 kV	$4,193,381*	May 2011

*Project was already planned prior to Spencer NSO

Cost Analysis

The estimated annual RMR fixed costs that would be uplifted on an on-going basis are greater than the annual carrying costs of the transmission projects, notwithstanding any additional production cost savings.

Projects planned prior to Spencer NSO not included in transmission project cost.

Questions?