

ICTE TLR 5 Investigation Report
Flowgate 16272
(Nelson AT1 500/230 kV for the loss of Hartburg - Cypress 500 kV)
TLR Level 5: May 16, 2010
Report Issued:

1. Description of purpose/cause of hold/curtailment.

This report is submitted in accordance with the NERC Transmission Loading Relief Investigation Procedure for the TLR 5 event that occurred on Flowgate 16272 on May 16, 2010. Flowgate 16272 is an Entergy flowgate. The TLR 5 was in effect from 9:55 AM until 1:30 PM on May 16, 2010. Projected post-contingent flows on the Nelson AT1 500/230 kV line for the loss of the Hartburg - Cypress 500 kV line exceeded the SOL.

2. Facility/flowgate limitations and flows at the time the TLR was initiated.

At the time the TLR 5b was issued, the Limiting Element was rated at 560 MVA. Flow on the Limiting Element was 507 MVA. Flow on the Contingent Element was 612 MVA. The LODF was approximately 28%. Post-contingent flow on the Limiting Element was approximately 678 MVA.

3. TLR levels, timing, and relief requested amounts.

TLRs levels, timing and relief requested amounts are shown on pages 2, 3 and 4.

4. Transmission and generation outages or changes from prediction that may have contributed.

There were no unplanned outages. Nelson 6 was in an outage.

5. Procedures implemented prior to hold/curtailment.

Curtailed non-firm transactions, not enough non-firm to alleviate the flowgate.

6. The initial investigation shall compare all transaction curtailment lists as generated by the IDC with the list of transactions flowing as determined by the IDC (Whole Transaction Lists) both before and after curtailment. The reasons for any transactions that were excluded from curtailment shall be provided. For those transactions not curtailed, the Reliability Authority will identify those entities and any affiliation with said entities.

There were no known transactions excluded from curtailment for this TLR.

7. List of known transactions not in the IDC with Transaction Contribution Factors greater than the curtailment threshold and actions taken to curtail such transactions.

There were no known transactions not in the IDC.

8. Excerpts from the RA Operations Log containing information relevant to the TLR event.

Information was provided to Reliability Coordinators through the IDC and the RCIS. Also the ICTE Reliability Coordinators logged information describing the actions taken at each issuance of the TLR.

9. Flowgate limitations as identified by security analysis processes conducted by the Reliability Authority for the day prior to the TLR event.

In the next day process, we did not see an issue with this flowgate, based off of the peak study.

10. State Estimator snapshots and security analysis, including any contingency analysis or stability analysis, along with any other recorded data indicating need for TLR.

The ICTE Reliability Coordinator was monitoring their state estimator for potential issues during this time. Screen shots were taken during each issuance of the TLR level 5.

11. ATC limitations before, during, and after the TLR event.

ICT Tariff Administration grants transmission service using an AFC process. This process evaluates each transmission request on a case by case basis. There are no ATC values for individual corridors to or from the Entergy system. ICT Tariff Administration was not granting any transmission requests that impacted the congested flowgate by 3 % or greater at the time of the TLR 5.

12. Description of actions taken to avoid future hold/curtailments.

This TLR was caused by a combination of generation patterns, load, and system flows. Due to this situation, no actions were taken to avoid future hold/curtailments.

13. Provide IDC generated Congestion Management Reports showing transaction curtailment list and Control Area NNL (network and native load) curtailment responsibility.

Congestion Management Reports for each issuance of the TLR have been reviewed and kept on file. These screen shots are not being provided to reduce the size of this report

14. Re-dispatch actions taken.

Entergy achieved their NNL obligation by moving generation on Sabine 1, 2, 3, 5, Nelson 3, 4, and Lewis Creek.

Event History									
Issuing RC:		ICTE							
Flowgate:		16272 - Nelson AT1 500/230 (ftlo) Hartburg 500kv - Cypress							
Event Begin:		2010-05-16 08:00							
Event End:		2010-05-16 22:50							
Event Duration:		14 Hours							
TLR Level	TLR Date	TLR Confirm Time	Run Time	Requested Relief	Remaining Relief	Relief Provided	Total Cuts		
							Tags	MW	
TLR Level 1	05/16/2010 08:00	05/16/2010 08:00	05/16/2010 07:59:47	0.0	0.0	0.0	0	0	
TLR Level 4	05/16/2010 08:55	05/16/2010 08:42	05/16/2010 08:41:15	0.0	0.0	0.0	1	25	
TLR Level 5B	05/16/2010 08:55	05/16/2010 08:56	05/16/2010 08:54:42	80.0	0.0	80.6	20	110	
TLR Level 5A	05/16/2010 10:00	05/16/2010 09:28	05/16/2010 09:27:00	27.0	0.0	101.4	21	173	
TLR Level 5A	05/16/2010 11:00	05/16/2010 10:29	05/16/2010 10:28:18	40.0	0.0	131.4	24	351	
TLR Level 5A	05/16/2010 12:00	05/16/2010 11:30	05/16/2010 11:26:39	66.0	0.0	177.8	24	433	
TLR Level 5A	05/16/2010 13:00	05/16/2010 12:28	05/16/2010 12:25:35	18.0	0.0	171.0	19	321	
TLR Level 5A	05/16/2010 14:00	05/16/2010 13:41	05/16/2010 13:26:30	101.0	0.0	254.9	19	468	
TLR Level 5A	05/16/2010 15:00	05/16/2010 14:28	05/16/2010 14:25:49	32.0	0.0	261.6	19	570	
TLR Level 5A	05/16/2010 16:00	05/16/2010 15:28	05/16/2010 15:26:23	33.0	0.0	262.0	16	481	
TLR Level 5A	05/16/2010 17:00	05/16/2010 16:41	05/16/2010 16:35:51	66.0	0.0	309.9	19	590	
TLR Level 5A	05/16/2010 18:00	05/16/2010 17:32	05/16/2010 17:28:53	0.0	0.0	261.1	19	499	
TLR Level 5A	05/16/2010 19:00	05/16/2010 18:28	05/16/2010 18:25:55	0.0	0.0	215.1	19	404	
TLR Level 5A	05/16/2010 20:00	05/16/2010 19:32	05/16/2010 19:30:40	18.0	0.0	211.1	19	390	
TLR Level 5A	05/16/2010 21:00	05/16/2010 20:32	05/16/2010 20:30:04	0.0	0.0	160.1	26	544	
TLR Level 1	05/16/2010 22:00	05/16/2010 21:31	05/16/2010 21:31:19	0.0	0.0	0.0	0	0	
TLR Level 0	05/16/2010 22:50	05/16/2010 22:38	05/16/2010 22:36:52	0.0	0.0	0.0	0	0	

Event Summary

FILE SAVED AS: ICTE_16272_20100516_0800.htm

Incident: ICTE_16272_20100516_0800	Date: 05/16/2010	Reliability Coordinator: ICTE
Initial Conditions: N/A		
Flowgate: 16272 - Nelson AT1 500/230 (ftlo) Hart...	Rating: 560	LODF: 27.97%
TLR Direction: Normal		
Effective StartTime: 05/16/2010 08:00	Effective EndTime: 05/16/2010 22:50	TLR Duration: 14 Hours and 50 Minutes

TLR Actions

Confirm Time	Level	Effective Hour	Priority	Schedule								NNL Relief			Market Relief				Flow			TLR Action Comments
				Total Tags Out / Hold	MW	Relief	MW	Relief	MW	Relief	MW	Relief	CA	IDC MW	RC Askn MW	Type	Mkt	IDC MW	RC Askn MW	Current	Post Cont.	
May 16 08:00	TLR 1	CURRENT		NONE								NONE			NONE				418	554	488	N/A
May 16 08:42	TLR 4	CURRENT	6-NN	1 / 0	25	1.5	25	1.5	0	0.0	NONE			NONE				463	617	554	N/A	
		NEXT		NONE								NONE			NONE							
May 16 08:56	TLR 5B	CURRENT	7-F	20 / 0	110	6.8	110	6.8	0	0.0	EES	82.0	82.0	NONE				507	678	612	N/A	
			Total	20 / 0	110	6.8	110	6.8	0	0.0	LAGN	11.0	11.0									
		NEXT	7-F	20 / 0	110	6.8	110	6.8	0	0.0	NONE			NONE								
			Total	20 / 0	110	6.8	110	6.8	0	0.0												
May 16 09:28	TLR 5A	NEXT	7-F	21 / 0	173	10.6	173	10.6	0	0.0	CLEC	1.0	1.0	NONE				423	573	538	N/A	
			Total	21 / 0	173	10.6	173	10.6	0	0.0	EES	77.0	78.0									
											LAGN	13.0	13.0									
											Total	91.0	92.0									
May 16 10:29	TLR 5A	NEXT	6-NN	2 / 0	103	5.2	103	5.2	0	0.0	CLEC	1.0	1.0	NONE				414	577	585	N/A	
			7-F	22 / 0	248	15.0	248	15.0	0	0.0	EES	95.0	95.0									
			Total	24 / 0	351	20.2	351	20.2	0	0.0	LAGN	16.0	16.0									
											Total	112.0	112.0									
May 16 11:30	TLR 5A	NEXT	7-F	22 / 0	330	20.0	330	20.0	0	0.0	CLEC	1.0	1.0	NONE				423	598	629	N/A	
			Total	22 / 0	330	20.0	330	20.0	0	0.0	EES	131.0	131.0									
											LAGN	20.0	21.0									
											Total	152.0	153.0									
May 16 12:28	TLR 5A	NEXT	7-F	19 / 0	321	17.7	321	17.7	0	0.0	CLEC	1.0	1.0	NONE				423	594	612	N/A	
			Total	19 / 0	321	17.7	321	17.7	0	0.0	EES	132.0	132.0									
											LAGN	21.0	21.0									
											Total	154.0	154.0									
May 16 13:41	TLR 5A	NEXT	7-F	19 / 0	468	25.9	468	25.9	0	0.0	CLEC	1.0	1.0	NONE				466	651	664	N/A	
			Total	19 / 0	468	25.9	468	25.9	0	0.0	EES	199.0	199.0									
											LAGN	30.0	30.0									
											Total	229.0	229.0									
May 16 14:28	TLR 5A	NEXT	7-F	19 / 0	570	33.0	570	33.0	0	0.0	CLEC	1.0	1.0	NONE				428	593	590	N/A	
			Total	19 / 0	570	33.0	570	33.0	0	0.0	EES	197.0	197.0									
											LAGN	30.0	30.0									
											Total	228.0	228.0									
May 16 15:28	TLR 5A	NEXT	7-F	16 / 0	481	25.8	481	25.8	0	0.0	CLEC	1.0	2.0	NONE				429	595	597	N/A	
			Total	16 / 0	481	25.8	481	25.8	0	0.0	EES	203.0	203.0									
											LAGN	32.0	32.0									
											Total	236.0	237.0									
May 16 16:41	TLR 5A	NEXT	7-F	19 / 0	590	32.3	590	32.3	0	0.0	CLEC	2.0	2.0	NONE				429	593	588	N/A	
			Total	19 / 0	590	32.3	590	32.3	0	0.0	EES	235.0	235.0									
											LAGN	38.0	38.0									
											Total	278.0	278.0									
May 16 17:32	TLR 5A	NEXT	7-F	19 / 0	499	27.4	499	27.4	0	0.0	CLEC	1.0	2.0	NONE				359	499	501	N/A	
			Total	19 / 0	499	27.4	499	27.4	0	0.0	EES	200.0	200.0									
											LAGN	32.0	32.0									
											Total	233.0	234.0									
May 16 18:28	TLR 5A	NEXT	7-F	19 / 0	404	22.5	404	22.5	0	0.0	CLEC	1.0	1.0	NONE				351	486	485	N/A	
			Total	19 / 0	404	22.5	404	22.5	0	0.0	EES	165.0	165.0									
											LAGN	26.0	26.0									
											Total	192.0	192.0									
May 16 18:32	TLR 5A	NEXT	7-F	19 / 0	390	21.8	390	21.8	0	0.0	CLEC	1.0	1.0	NONE				380	532	544	N/A	
			Total	19 / 0	390	21.8	390	21.8	0	0.0	EES	160.0	160.0									
											LAGN	28.0	28.0									
											Total	189.0	189.0									
May 16 20:32	TLR 5A	NEXT	6-NN	1 / 0	100	5.8	100	5.8	0	0.0	CLEC	1.0	1.0	NONE				342	476	487	N/A	
			7-F	24 / 0	244	15.9	244	15.9	0	0.0	EES	107.0	107.0									
			Total	25 / 0	344	21.8	344	21.8	0	0.0	LAGN	20.0	20.0									
											Total	128.0	128.0									
May 16 21:31	TLR 1	CURRENT		NONE								NONE			NONE				295	411	417	N/A
May 16 22:38	TLR 0	CURRENT		NONE								NONE			NONE				286	399	406	N/A

TLR Schedule Totals

Priority	Schedule			
	Total Tags Out / Hold	IDC Cut MW	RC Cut Acknowledge MW	Hold MW
0	0	0	0	0
1	0	0	0	0
2	0	0	0	0
3	0	0	0	0
4	0	0	0	0
5	0	0	0	0
6	4	228	228	0
7	278	4938	4938	0
Total	282	5166	5166	0

TLR NNL Totals

CA	NNL Relief	
	IDC MW	RC MW
CLEC	13.0	15.0
EES	1965.0	1966.0
LAGN	317.0	318.0
Total	2295.0	2299.0