



Nodal Program Update

Mike Cleary

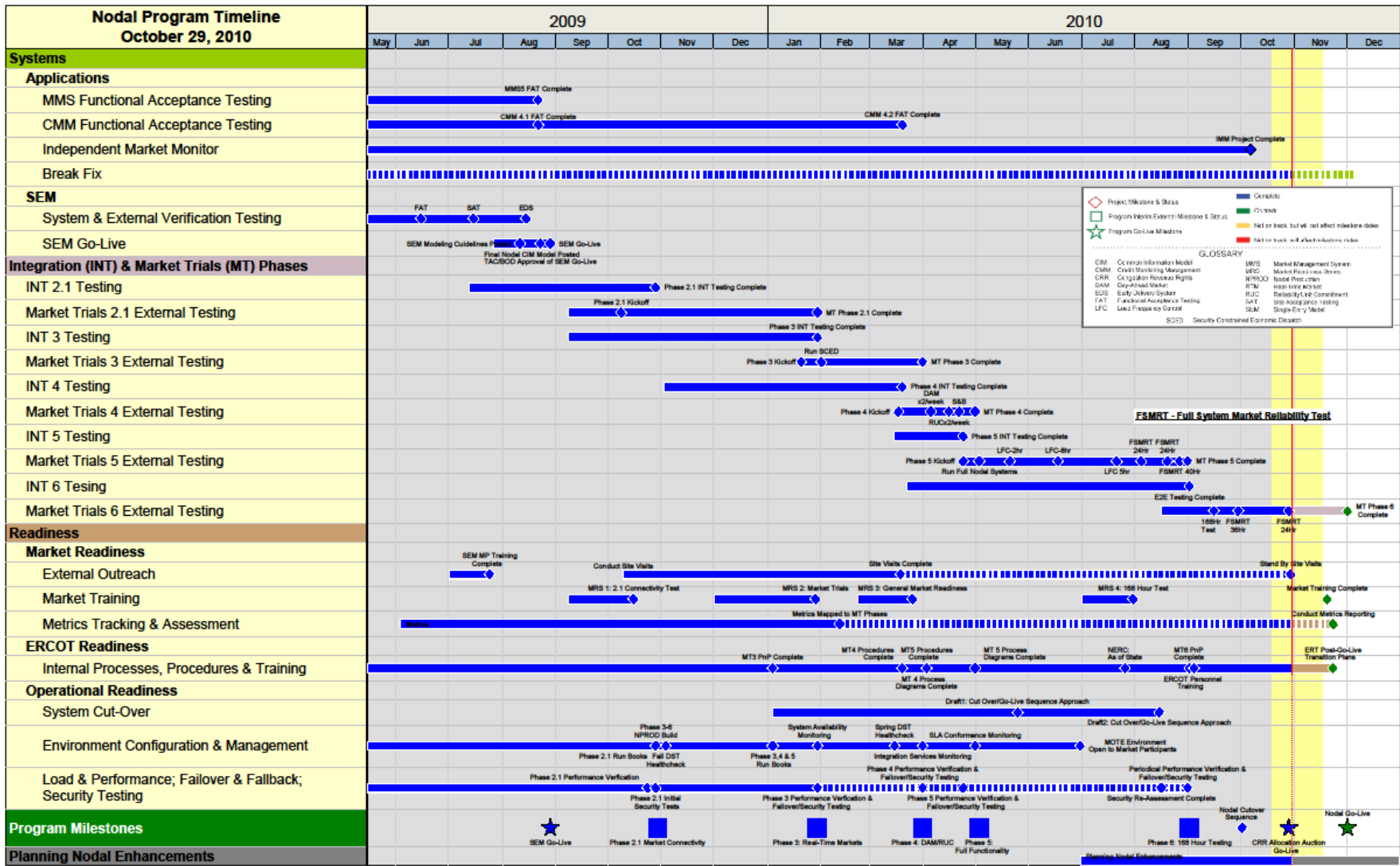
Chief Operating Officer

ERCOT Board of Directors

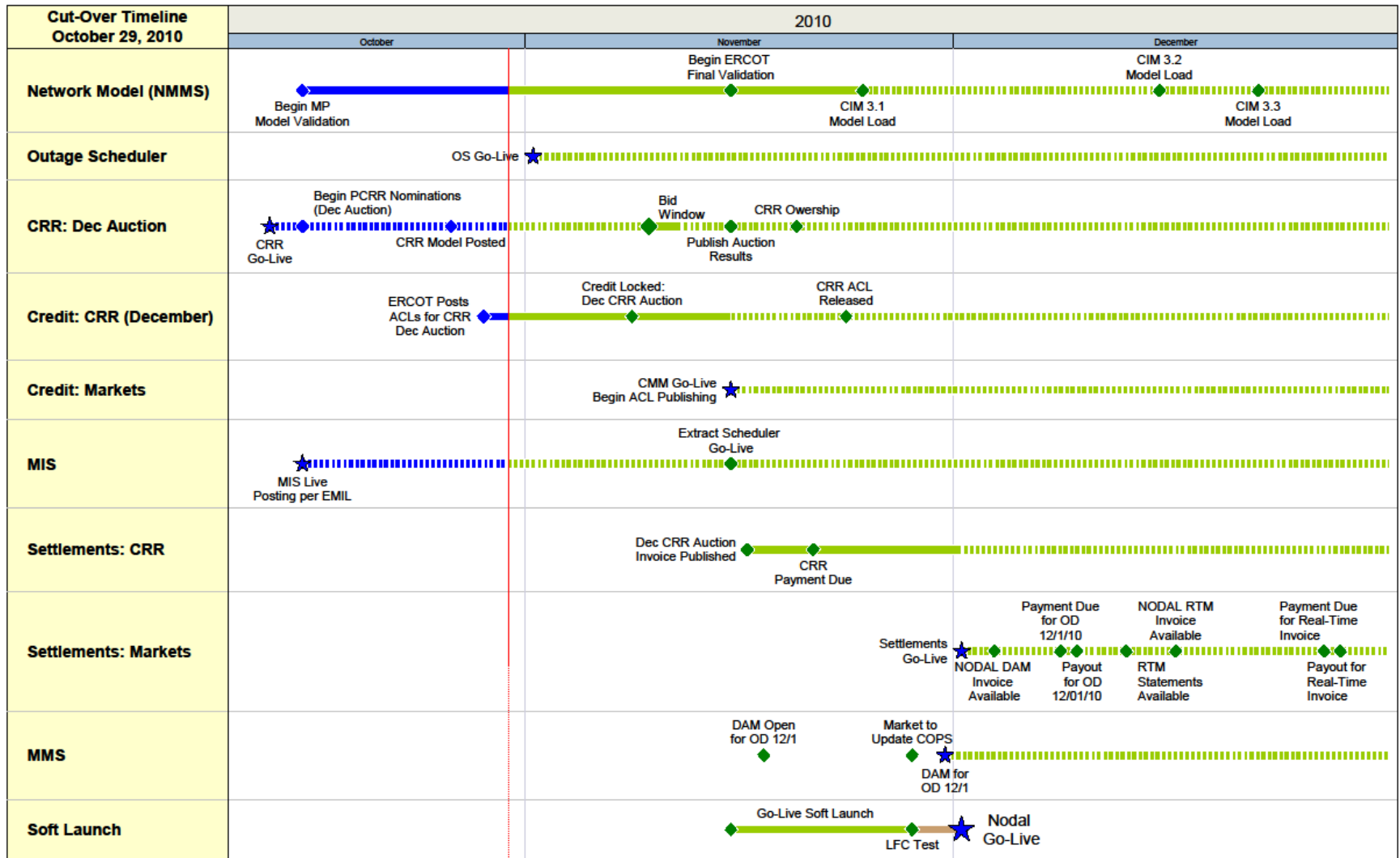
16 November 2010

- **Program Status**
- **Cutover Update**
- **24 Hour LFC Test Update**
- **Nodal Defect Delivery & Issues Update**
- **Prioritization Process Overview**
- **Monthly Financial Review**

Integrated Nodal Timeline



Cutover Timeline



14 Days to Go-Live

Go-Live Soft Launch has Begun

Program Activities:

- Load Frequency Control(LFC)Tests
 - 10/27 - 10/28 24 Hr LFC test
 - 11/11 - 11/12 24 Hr LFC test
 - 11/28 - 11/30 58 Hr LFC test (Go-Live Soft Launch)
- Market Trials October testing window
 - 10/18 - 10/30 Day Ahead Market, DRUC and HRUC tested daily
 - 10/18 - 10/30 SCED published LMPs and base points
 - 10/25 - 10/29 Focused window with realistic QSE inputs (e.g. realistic Current Operating Plans, telemetry, offers and bids)
- Nodal Market Workshop for Retail Electric Providers 11/09
- Market Readiness Seminar #9 delivered on 11/10
- CRR December Auction results published on 11/15
- Go-Live Soft Launch
 - 11/15 - 11/29 Soft Launch began with execution of the Day-Ahead Market
 - 11/28 - 11/30 Final LFC test through midnight 11/30
 - 12/01 1st Binding Operating Day

Live Nodal Systems

- Market Registration
- Network Model Management (NMMS)
- Congestion Revenue Rights (CRR)
- Market Information System (MIS)
- Outage Scheduler (OS)
- Credit Monitoring and Management (CMM)



Cutover Update

Kenneth Ragsdale
Principal Market Operations

Cut-Over Update – Go-Live Sequence of Events

Date	Action	Comments
11/15/2010 – 11/29/2010	ERCOT Initiates “Soft Launch” to Nodal Market Go-Live	ERCOT will run non-binding DAM, RUC daily per Nodal protocol timelines. RTM will remain Open Loop, but continue to publish base points and LMPs. Note that credit will be set high on 11/15
11/15/2010	Credit posts ACLs and TPEs for non-binding DAM	For Operating Day 11/15 credit will be manually set to high limits
11/16/2010	First Credit Operating Day 11/16	Credit reflects actual limits
11/17/2010	Market now able to submit transactions for first Nodal Operating Day (T-14d)	12/01 Operating Day open for Market submissions
11/23/2010	QSEs with Resources required to submit 7 days of rolling COPs	12/01 required on 11/23
11/28/2010 2:00 PM – 11/28/2010 3:00 PM	Generation and Frequency Control switched to Nodal systems for final LFC test	QSEs will begin following Nodal base points Settlements will continue to be Zonal
11/28/2010 2:00 PM – 11/30/2010 11:59:59 PM	QSEs remain on Nodal Control while settling Zonally during the LFC test	
11/29/2010	Last Non- Binding DAM for operating day 11/30	

Cut-Over Update – Go-Live Sequence of Events (11/30/2010)

Time	Action	Comments
up to 10:00	Bids and Offer submission	QSE submit bids and offers
10:00	Close DAM	
10:00	Execute Dam Clearing Process	
13:30	Approve DAM results	Day Ahead results posted to MIS
13:30-14:30	Submit Post DAM COP updates	
14:30	Close for RUC	
14:30	Begin Execution of DRUC	
16:00	Approve DRUC Results	
16:00	Post DRUC Results	
18:00	HRUC Begins Hourly Runs	

Full Market WebEx Calls

- **11/15/2010 – 11/22/2010**
 - Market call on Monday 11/15
 - Market call on Friday 11/19
- **11/23/2010 – 12/07/2010**
 - Twice Daily Market calls
 - 10:30 AM call
 - 4:30 PM call

LFC Test WebEx (open to QSEs w/Resources and TSPs)

- **11/28/2010 – 12/01/2010**
 - Call will open at 11:00 AM on 11/28
 - Call will remain open through 11:59 PM on 12/01

Note: After 12/1/2010 all issues and questions will be fielded through the issues management process or during the twice daily market calls

Status Reporting

- **11/19 - 11/26** Continue Weekly Nodal BOD email updates
- **11/19** ERCOT to issue 10 day Market Notice
- **11/28 - 12/03** Begin Daily Nodal BOD email updates

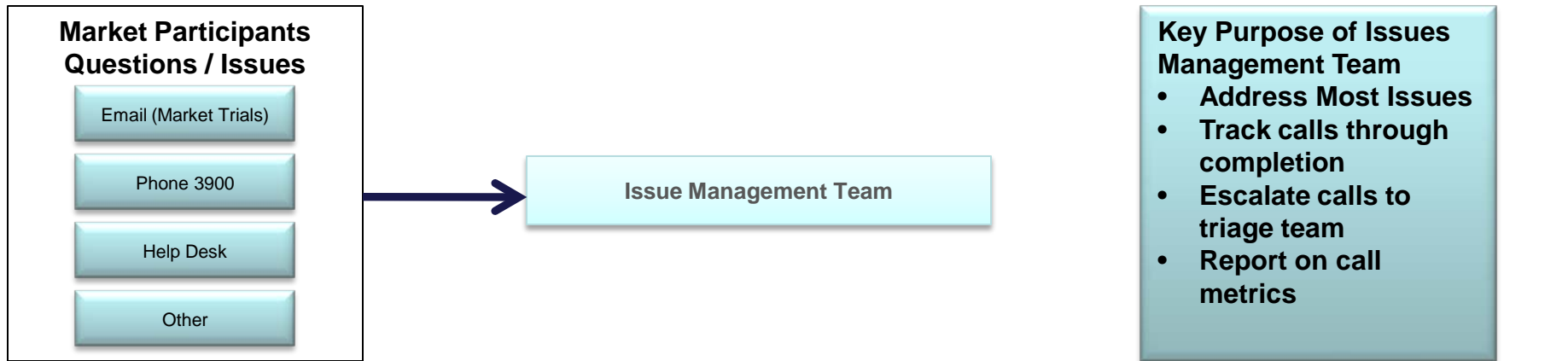
Additional Communication Channels

- **ERCOT Management is finalizing the communications plan and is soliciting Board input on communication preferences**

- **Summary of Support Hours**

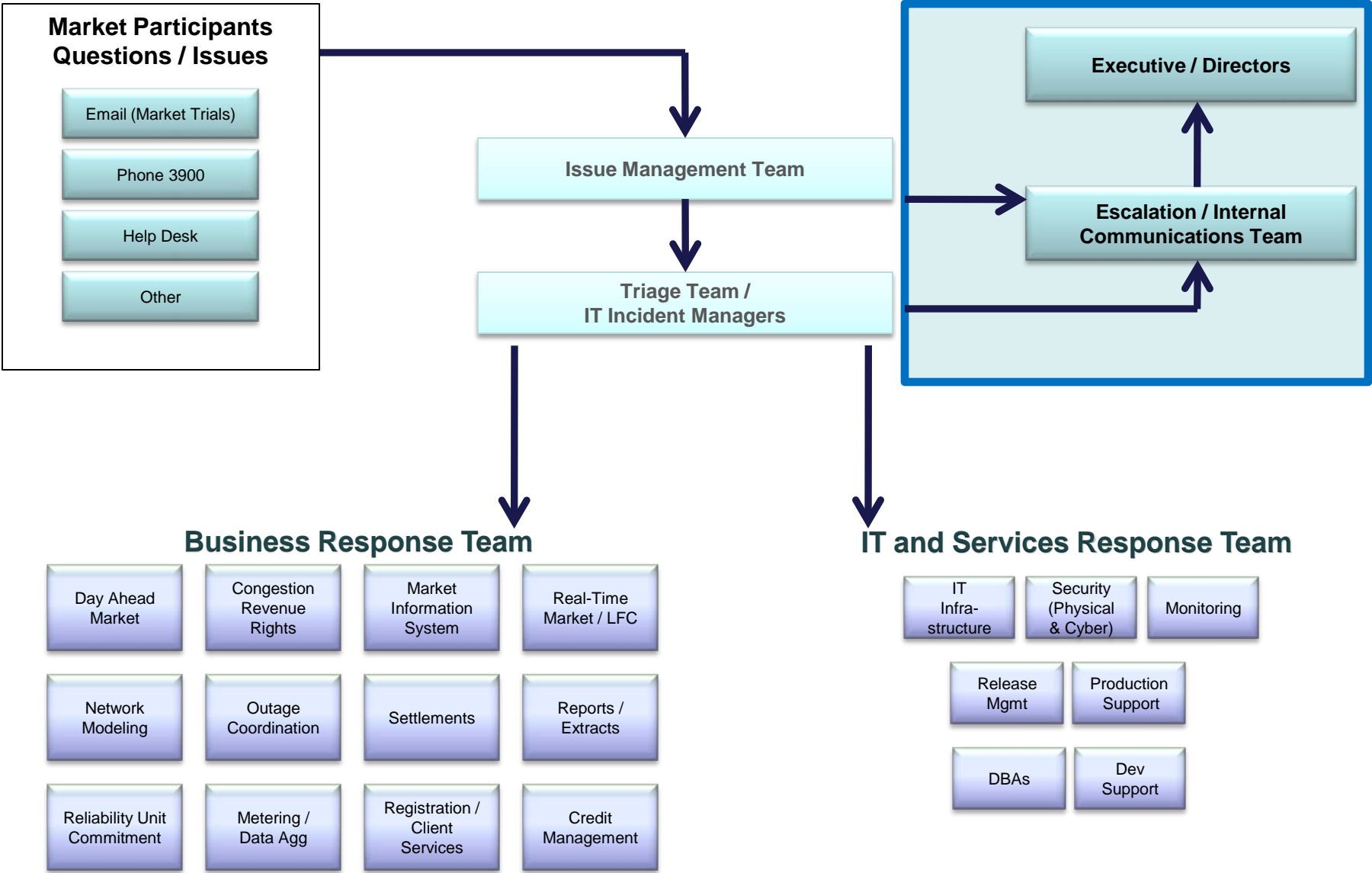
- 11/15/2010 – 11/26/2010 : Soft Launch
 - On-Site Support will be regular business hours
 - Every department will be available for on call support
- 11/27/2010 – 12/3/2010: LFC and Go-Live
 - Key Departments will begin 24x7 Rotations
 - After hours support roster will be maintained
- 12/4/2010 – 12/30/2010: Initial Stabilization
 - 24x7 support maybe extended due to issues
 - On-Call Personnel will be on heightened alert

Cutover Update – Issue Management and Communication



- **Consolidating methods of receiving calls / emails from Market Participants**
 - Emailed Issues to markettrials@ercot.com
 - Phoned in issues to either 3900 (WCS) or the Helpdesk
 - The Market will be asked to route technical issues through the Help Desk starting on 11/23/2010
 - All other issues will be asked to route through 3900
- **Team Comprised of**
 - Wholesale Clients Services
 - Help Desk
- **Tracking**
 - Team will track, measure and validate all Market questions and issues are being addressed

Cutover Update – Issue Management Overview and Escalation

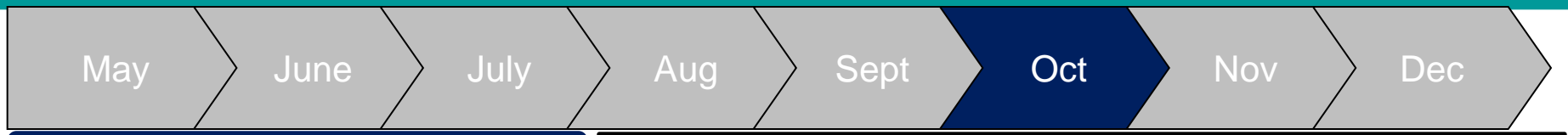


Cut-Over Update – Go-Live Sequence of Events

- **The primary driver after Go-Live will be resolution mode with reversion back to Zonal as a last result**
- **Key Zonal Notes for 11/30/2010 and 12/01/2010**
 - **QSEs will maintain:**
 - Balancing Energy Offers through Operating Day (OD) 12/01
 - Submitted on 11/30 for OD 12/1
 - Resource Plans through OD 12/01
 - Maintained continuously through 12/01 to reflect actual Resource Plan
 - Zonal Outages effective on OD 12/01
 - Examples: Actual Start / End, Forced Outages, etc
 - **On 11/30/2010 ERCOT will run:**
 - Zonal Ancillary Service Market
 - Zonal awards will be published
 - Zonal RPRS
 - Run as a study only
 - Zonal commitments will not be published
 - **Zonal prices will not be generated for 12/01/2010**
 - **No Zonal Submissions or Markets for OD 12/02/2010 or later**

Note: Zonal systems (ERCOT & MP) must remain in place until 1/01/2011

Cut-Over Update - October



Functional Area

- ✓ Network Model
- ✓ Outage Scheduler
- ✓ Congestion Revenue Rights
- ✓ Credit
- ✓ MIS

White arrow pointing right towards the Key Cut-Over Activities box.

MP Activities / Impacts

- CRRAH able to retrieve ACLs from CRR system each business day.
- MPs can post additional collateral until 11/08/2010 for Dec 2010 CRR Auction
- Dec 2010 CRR Model available on MIS
- Dec 2010 Monthly Auction Notice available on MIS

White arrow pointing left towards the Key Cut-Over Activities box.

Key Cut-Over Activities for October 2010

- Complete (10/14-10/19)** CRR: ERCOT begins accepting PCRR Nominations for December Monthly Auction (updated)
- Complete (10/15-11/15)** Model: Network Operations Model posted to TSP Citrix location and TSPs begin validation process
- Complete (10/26)** CRR: ERCOT shall allocate PCRRs to NOIEs for the 2010 December Monthly Auction and publish to MIS
- Complete (10/26)** CRR: ERCOT shall post CRR Network Model for the 2010 December Monthly Auction to MIS
- Complete (10/28-11/08)** Credit: ERCOT posts ACLs daily for CRR December monthly auction to CRR
- Complete (10/29)** CRR: ERCOT to post December 2010 Monthly Auction Notice to MIS

Cut-Over Update - November

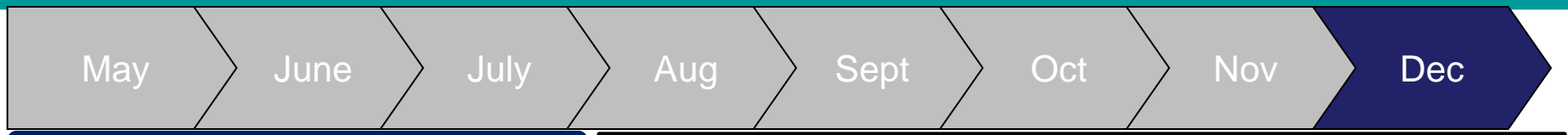


- Functional Area**
- ✓ Settlements
 - ✓ Credit
 - ✓ Congestion Revenue Rights
 - ✓ Disputes
 - ✓ Market Management

- MP Activities / Impacts**
- Available Credit Limit is locked for CRRAHs
 - CRR Auction Invoice via the API or MIS
 - CRRAHs can receive postings on MIS
 - QSEs can begin DAM Bid submission (15 submission items)
 - Market checkpoint calls begin to facilitate issues and readiness
 - Daily Market Conference Bridge starts 11/23

- Key Cut-Over Activities for November 2010**
- **Complete (11/8/2010 12:00pm)** Credit: Collateral Posting Deadline (Dec Auction)
 - **Complete (11/8/2010 5:00pm)** CRR: Credit Lock for Dec CRR Auction
 - **Complete (11/9/2010 – 11/11/2010)** CRR: December CRR Auction Bid Open/Close
 - **Complete (11/12/2010)** CRR: December CRR Auction Executes
 - **Complete (11/15/2010)** CRR: December CRR Auction Results published
 - **(11/16/2010)** Settlements: December CRR Auction Invoice published
 - **(11/19/2010)** Credit: Payment Due for December CRR Auction Invoices
 - **(11/22/2010)** Settlements: Payments to CRRAH (Dec Auction)
 - **(11/23/2010)** Market Submission Opens (Remaining Protocol Go-Live)
 - **(11/24/2010)** Model: Network Model Load
 - **(11/29/2010)** Credit: ERCOT to Publish ACL for the initial Day-Ahead Market execution by ERCOT

Cut-Over Update – December



- Functional Area**
- ✓ Network Model
 - ✓ Settlements
 - ✓ Congestion Revenue Rights
 - ✓ Credit
 - ✓ Market Management System

- MP Activities / Impacts**
- Daily Market Calls continue for issue facilitation
 - Settlement Calendar Extracts (See Email for full list of postings)
 - MPs receive 1st Nodal Invoice for DAM and RTM via MIS
 - MPs can submit Disputes via MIS or API

- Key Cut-Over Activities for December 2010**
- **(12/1/2010)** Nodal Program: Nodal Go-Live (Operating Day 1)
 - **(12/3/2010)** Settlements: Nodal Day Ahead Market Statement & Invoice Available
 - **(12/8/2010)** Credit: Nodal Payment Due for OD12/01
 - **(12/9/2010)** Credit: Nodal Payout for OD12/01
 - **(12/15/2010)** Model: Network Model Load
 - **(12/13/2010)** Settlements: Nodal Real-Time Statement Available
 - **(12/16/2010)** Settlements: Nodal Real-Time Invoice Available
 - **(12/27/2010)** Credit: Nodal Payment Due for Real-Time Invoice 12/16
 - **(12/28/2010)** Credit: Nodal Payout for Real-Time Invoice 12/16



24 Hour LFC Test Update

October Test 10/27-10/28

November Test 11/11-11/12

Kenneth Ragsdale

Principal Market Operations

October 24hr LFC Test (Highlights) – Completion Criteria

- Initial assessment of Completion Criteria:
 - The rolling CPS1 one minute average score must equal or exceed 100% during the test period
 - Note that the CPS1 average will not take into account the periods where ERCOT is transitioning to Nodal and then back to Zonal
 - Note that the CPS1 average will not take into account the periods where ERCOT is performing system tuning
 - **Hourly CPS1 Scores:**
 - » **Max:** 166, **Min:** 88, **Average:** 137
 - Zonal Commercially Significant Constraints (CSCs) and Closely Related Elements (CREs) managed below thermal limits: **Yes**
 - Local Congestion managed below thermal limits : **Yes**
 - Stability limits managed below transfer limits : **Yes**
 - No NERC Disturbance Control Standard (DCS) failure if applicable: **None**
 - No LFC-SCED system issues that result in termination of the test : **None**

October 24hr LFC Test (Highlights) – Observations

Observation	What / When	Cause	Resolution
SCED Stopped	Intervals 12:05, 12:10, 15:55	Issue occurs when DSR telemetered Output Schedule = 0 MW and RST = ONDSR	<u>Complete</u> Code fix released to Nodal Production 11/05 for November LFC test
Updated Desired Base Points	UDBPs were observed to cease updating for 5 units	Problem related to SCED stopping.	<u>Complete</u> Code fix to be released 11/10 to Nodal Production for November LFC test
EMS Alert Issues	Large volume of EMS alerts seen by MPs, including stale alerts and duplicates	Defect found in the alert processes that caused duplicate alerts to be sent	<u>Complete</u> Code fix to be released 11/10 to Nodal Production for November LFC test
Incorrect Base Points, LMPs, HUB Prices, Load Zone Prices	Interval impacted 13:15, 18:05, 18:55	MMS process issue with synchronizing data received from EMS. Resource Shift factors and Electrical Bus Shift factors	<u>Complete</u> Code fix released to Nodal Production for November LFC test

October 24hr LFC Test (Highlights) – Observations (cont)

Observation	What / When	Cause	Resolution
High / Low Prices	Throughout peak period of the test	<ul style="list-style-type: none"> • Multiple outages (common this time of year) • Resource limit constraints (AS, ONTEST) • Nodal prices are not incentivized • Conservative Operations 	<p><u>Complete</u></p> <ul style="list-style-type: none"> • Improved Operator Process • Post Go-Live: Payment will be linked to Nodal prices vs. Zonal prices
Incorrect Real-Time Metered Prices (Note: this did not impact Base Points or other prices)	Missing EPS data between 12:00 and 13:30 on 10/27	Preliminary finding is that bad data was introduced into EMS. Root cause analysis still in process	<p><u>Interim Fix Implemented</u></p> <ul style="list-style-type: none"> • Updated configuration and added data validation tools • Improved monitoring of data transfer processes
LMP differences between ICCP and MIS postings for some generators (2-3 cents)	Various SCED intervals	Precision mismatch of shift factors, shadow prices between SCED and Oracle database	<p><u>Complete</u></p> <p>Code fix released to NProd for November LFC test</p>



Nodal Defect Delivery & Issues Update

Kenneth Ragsdale
Principal Market Operations

Critical Defects and Issues to be resolved by Go-Live (12/1/10)

#	Defect ID	Project	Summary	NPROD Migration Date	Status
1	17602	MMS	Initial online Combined Cycle mode min-up time enforcement. [This defect is to address certain scenarios for combined cycles where a configuration that is initially ON at the first hour can be prematurely shutdown (violating its minimum up time).]	11/05/10	Closed
2	17753	MMS	Append PCAP outages after EMSI run. [This defect is to address that DAM/RUC are not modeling PCAPs adequately and may over constraint the solution.]	11/05/10	Closed
3	17837	MMS	Credit exposure for PTP obligation bid for phase 2 and post phase 2 before DAM close should be $Quantity * (\max(\text{proce}, 0) = u\%(\text{RT-DA}))$	11/05/10	Closed
4	17623	EMS	Jointly owned statically rated lines and transformers. [Currently, ERCOT is not using the lowest rating provided by multiple owners.]	11/05/10	Closed
5	17997	MMS	SCED DS12 & DSI: For online - move reading of constraint info to DSI 2 . ONE read for constraint, shift Fact (elec bus & gen) [This defect is to address pricing mis-calculations due to incorrect shift factor transfer]	11/05/10	Closed

#	Issue Summary	Mitigation Plans	Status - RESOLVED
1	DAM Performance Issues related to CRR PTP Option offers	Upgrade MMS Hardware	<ul style="list-style-type: none"> * New Hardware setup complete in Testing and Production Environments * Completed Operating Day Testing in ERCOT's test environment * Began running Day-Ahead Market facing activities in Production environment * No issues in performance or quality of solution observed
		Reduce Contingency List (backup plan)	<ul style="list-style-type: none"> * Process and tools for creating the shortened contingency list has been completed * Performance testing results have confirmed this as a viable alternative

Defect Summary (slide 1 of 3) [as of 11-05-10]

System	Defects to be resolved by Quarter 4	Deferred Defects	Comments
MMS	Total : 2	Total: 88	<p><i>Delivery Schedule</i></p> <ul style="list-style-type: none"> • 1 Defect to be resolved by 11/05 • 1 Defect to be resolved by 11/12 <p><i>Deferred Defects</i></p> <ul style="list-style-type: none"> • 59 Deferred defects require a workaround, all 59 workarounds in place and exercised
EMS	Total: 4	Total: 360	<p><i>Delivery Schedule</i></p> <ul style="list-style-type: none"> • 2 Defects to be resolved by 11/10 • 2 Defects to be resolved by 11/12 <p><i>Deferred Defects</i></p> <ul style="list-style-type: none"> • 126 Deferred defects require a workaround, all 126 workarounds in place and exercised.
COMS	Total: 0	Total: 73	<p><i>Delivery Schedule</i></p> <ul style="list-style-type: none"> • NA <p><i>Deferred Defects</i></p> <ul style="list-style-type: none"> • 38 Deferred defects require a workaround, all 38 workarounds in place and exercised.
CMM	Total: 0	Total: 54	<p><i>Delivery Schedule</i></p> <ul style="list-style-type: none"> • NA <p><i>Deferred Defects</i></p> <ul style="list-style-type: none"> • 12 Deferred defects require a workaround, all 12 workarounds in place and exercised

Defect Summary (slide 2 of 3) [as of 11-05-10]

System	Defects to be resolved by Quarter 4	Deferred Defects	Comments
MIS	Total: 7	Total: 12	<p><i>Delivery Schedule</i></p> <ul style="list-style-type: none"> 1 Defect to be resolved by 11/11 4 Defects to be resolved by 11/12 2 Defects to be resolved by 11/19 <p><i>Deferred Defects</i></p> <ul style="list-style-type: none"> 4 Deferred defects require a workaround, 3 workarounds in place and exercised, 1 workaround to be completed
NMMS	Total: 0	Deferred: 10	<p><i>Delivery Schedule</i></p> <ul style="list-style-type: none"> NA <p><i>Deferred Defects</i></p> <ul style="list-style-type: none"> 9 Deferred defects require a workaround, all 9 workarounds in place and exercised
OS	Total: 0	Total: 128	<p><i>Delivery Schedule</i></p> <ul style="list-style-type: none"> NA <p><i>Deferred Defects</i></p> <ul style="list-style-type: none"> 40 Deferred defects require a workaround, all 40 workarounds in place and exercised
CRR	Total: 0	Total: 7	<p><i>Delivery Schedule</i></p> <ul style="list-style-type: none"> NA <p><i>Deferred Defects</i></p> <ul style="list-style-type: none"> 4 Deferred defects require a workaround, all 4 workarounds in place and exercised



Defect Summary (slide 3 of 3) [as of 11-05-10]

System	Defects to be resolved by Quarter 4	Deferred Defects	Comments
EIP	Total: 2	Total: 66	<p><i>Delivery Schedule</i></p> <ul style="list-style-type: none"> • 1 Defect to be resolved by 11/05 • 1 Defect to be resolved by 11/12 <p><i>Deferred Defects</i></p> <ul style="list-style-type: none"> • 10 Deferred defects require a workaround, all 10 workarounds in place and exercised
CDR	Total: 10	Total: 6	<p><i>Delivery Schedule</i></p> <ul style="list-style-type: none"> • 10 Defects to be resolved by 11/12 <p><i>Deferred Defects</i></p> <ul style="list-style-type: none"> • 3 Deferred defects require a workaround, all 3 workarounds in place and exercised
EIS (EDW)	Total: 2	Total: 13	<p><i>Delivery Schedule</i></p> <ul style="list-style-type: none"> • 2 Defects to be resolved by 11/12 <p><i>Deferred Defects</i></p> <ul style="list-style-type: none"> • 2 Deferred defects require a workaround, all 2 workarounds in place and exercised

Nodal Defects Target Completion dates (as of 11/05/10)

System	# of Priority Defects	Target Completion Dates	Deferred Defects	Total Defects
MMS	2	1 - 11/05/10 1 - 11/12/10	88	90
EMS	4	2 - 11/10/10 2 - 11/12/10	360	364
COMS	0	NA	73	73
CMM	0	NA	54	54
NMMS	0	NA	10	10
OS	0	NA	128	128
CRR	0	NA	7	7
MIS (inc MID)	7	1 - 11/11/10 4 - 11/12/10 2 - 11/19/10	12	19
CDR	10	10 - 11/12/10	6	16
EIS (EDW)	2	2 - 11/12/10	13	15
EIP	2	1 - 11/05/10 1 - 11/12/10	66	68
MPIM	0	NA	9	9
Planning Model	0	NA	8	8
Total	27		834	861

November Nodal Classes/Workshops

Course	Start Date	Location
Generation 201	November 3	ERCOT MET Center (Austin)
Load Serving Entity 201	November 8	Liberty Power (Florida)
Market Settlements 301	November 8	WCR Auditorium (Austin)
Nodal Market Workshop for Retail Electric Providers	November 9	Omni Austin Hotel at Southpark
Generation 101	November 11	WCR Auditorium (Austin)
Resource Transmission Facility Outage Submittal Training (NPRR219)	November 17	ERCOT Facility (Taylor)
ERCOT Nodal 101	November 18	Suez Energy (Houston)
Load Serving Entity 201	November 19	ERCOT MET Center (Austin)

Enrollment at: <http://nodal.ercot.com/training/courses/index.html>





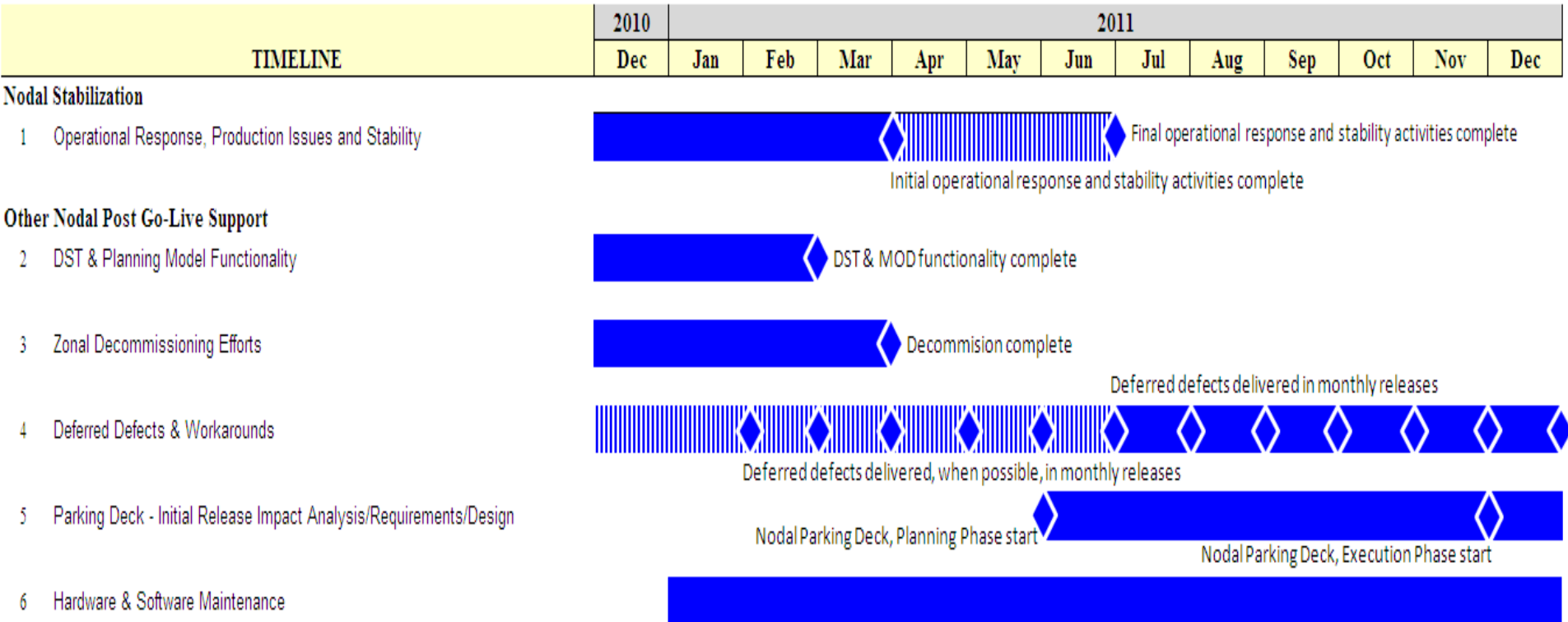
Prioritization Process Overview

Troy Anderson
Manager, Enterprise Project Portfolio Management

It's Time to Look Forward to 2011...

- Nodal Stabilization will be the primary focus after Go-Live
- A coordinated effort is needed to prioritize and implement future changes to the Nodal systems
 - Deferred Defects will be worked as time allows during Stabilization
 - Parking Deck items need an impact assessment before final prioritization can be completed
 - Other lists of proposed changes have been compiled
 - QSE / TSP / DAM Issues lists
 - Potomac Economics Market Assessment
 - ERCOT Risk Assessment
 - New requests will come through existing channels
 - NPRRs, SCRs, Revision Guide changes, etc.

Nodal Stabilization Timeline



- **Initial Prioritization Process**

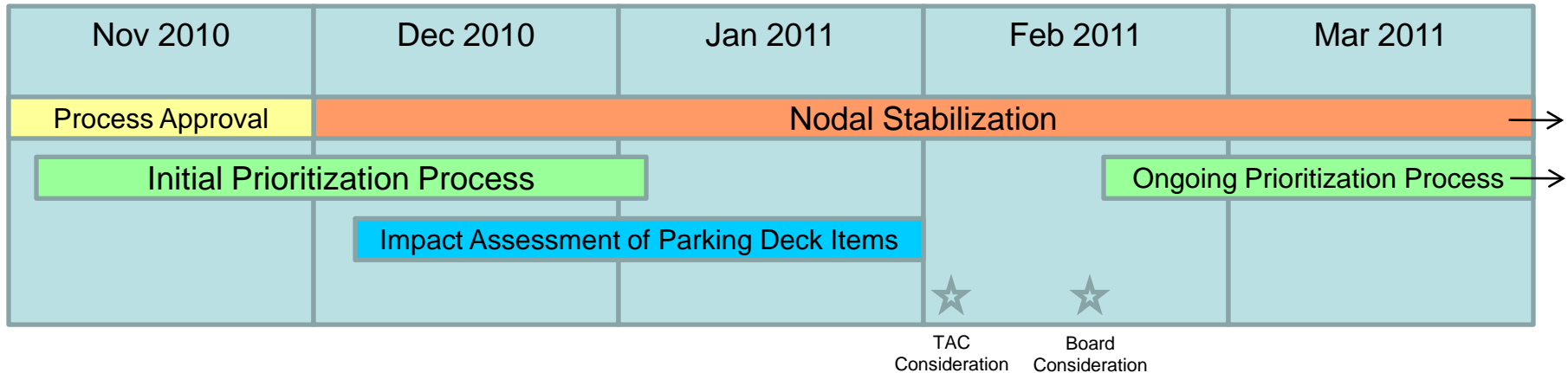
- The various issues lists will be centralized and managed by ERCOT
- ERCOT will propose an initial prioritization
- ERCOT will coordinate stakeholder review of the prioritized list
 - COPS, RMS, ROS, WMS, PRS, NATF, TAC
- TAC and the Board will be asked to endorse the initial prioritization
- NPRRs or SCRs will need to be submitted for market requests to ensure stakeholder support (QSE / TSP / DAM issue lists)

- **Ongoing Prioritization Process**

- New requests are considered through the usual process
 - Revision Request submission
 - ERCOT Review
 - Market Subcommittee consideration
 - TAC and Board approval

Prioritization Timeline

- November 2010
 - Seek approval of approach
 - ERCOT initial prioritization recommendation
- December 2010
 - Begin review of prioritized list with stakeholder groups
- February 2011
 - Seek TAC/Board approval of initial prioritized list





Monthly Financial Review

Mike Petterson

Controller

Nodal Financial Management Office

November 16, 2010

Financial Review – October 2010 Performance Forecast vs. Actual

Line	Cost Summary			Variance	
		Forecast¹	Actual	Fav./ (Unfav.)	
1	Internal Labor Costs	\$ 1.9	\$ 1.9	\$	-
2	Backfill Labor Costs	0.1	0.1		-
3	External Resource Costs	1.5	1.4		0.1
4	Software & Software Maintenance	0.3	0.3		-
5	Hardware & Hardware Maintenance	0.2	0.2		-
6	Other	-	-		-
7	Sub-total Direct Project Costs	\$ 4.0	\$ 3.9	\$	0.1
8	Allocations	0.2	0.2		-
9	Finance Charges	1.1	0.9		0.2
10	Sub-total Indirect Project Costs	\$ 1.3	\$ 1.1	\$	0.2
11	Total	\$ 5.3	\$ 5.0	\$	0.3

Amounts in Millions

Note 1: Forecast consists of re-forecast from October 1, 2010 plus NCRs

Financial Review – LTD Performance through October 2010

Forecast vs. Actual

Line	Cost Summary	Forecast ¹	Actual	Variance Fav./((Unfav.)	Estimate to Complete
1	Internal Labor Costs	\$ 80.9	\$ 80.9	\$ -	\$ 1.7
2	Backfill Labor Costs	6.3	6.3	-	0.1
3	External Resource Costs	278.2	278.1	0.1	1.3
4	Software & Software Maintenance	30.1	30.1	-	0.3
5	Hardware & Hardware Maintenance	49.4	49.4	-	0.3
6	Other	2.2	2.2	-	-
7	Sub-total Direct Project Costs	\$ 447.1	\$ 447.0	\$ 0.1	\$ 3.7
8	Allocations	22.8	22.8	-	0.2
9	Finance Charges	35.9	35.7	0.2	14.4
10	Sub-total Indirect Project Costs	\$ 58.7	\$ 58.5	\$ 0.2	\$ 14.6
11	Program Contingency Fund Unutilized	-	-	-	1.9
12	Board Discretionary Fund	-	-	-	117.8
13	Total	\$ 505.8	\$ 505.5	\$ 0.3	\$ 138.0

Amounts in Millions

Note 1: Forecast consists of re-forecast from October 1, 2010 plus NCRs

Financial Review – CTO Contingency Fund

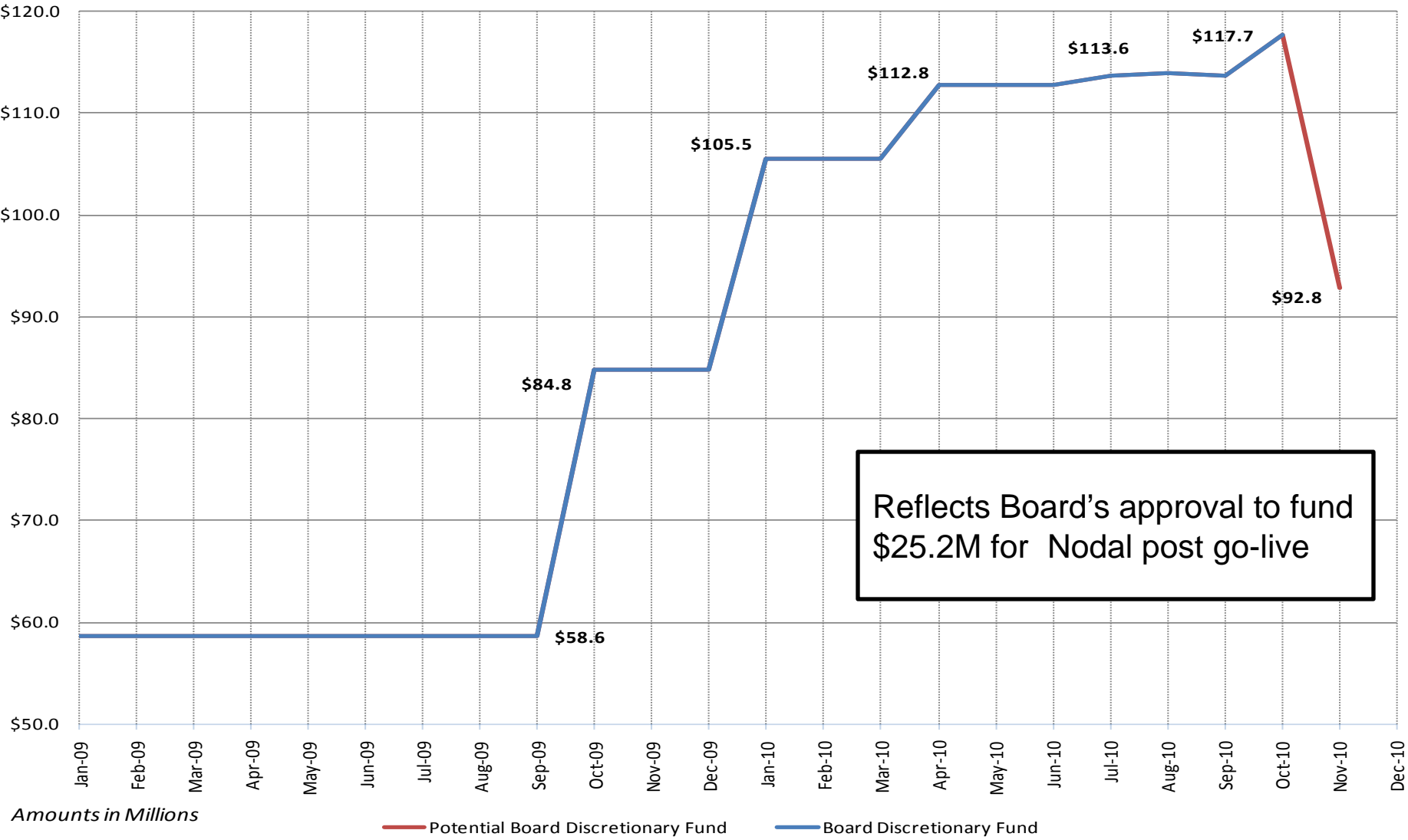
Q4 Risk Items Update

Line	Major Activities/Adjustments	Likely to Spend ¹	Risk	Approved NCRs	Unutilized Risk Funds
1.	Operational Readiness Support	H	\$ 0.5	\$0.0	\$0.5
2.	Infrastructure Hardware & Application Upgrades	H	0.5	0.0	0.5
3.	Current Open Change Requests	H	0.3	0.1	0.2
4.	Expected Nodal Change Requests	H	0.5	0.0	0.5
5.	Market Analysis	L	0.2	0.0	0.2
	Total		<u>\$ 2.0</u>	<u>\$0.1</u>	<u>\$1.9</u>

Amounts in Millions

Note 1: H – high probability risk has or will materialize, L – low probability risk has or will materialize

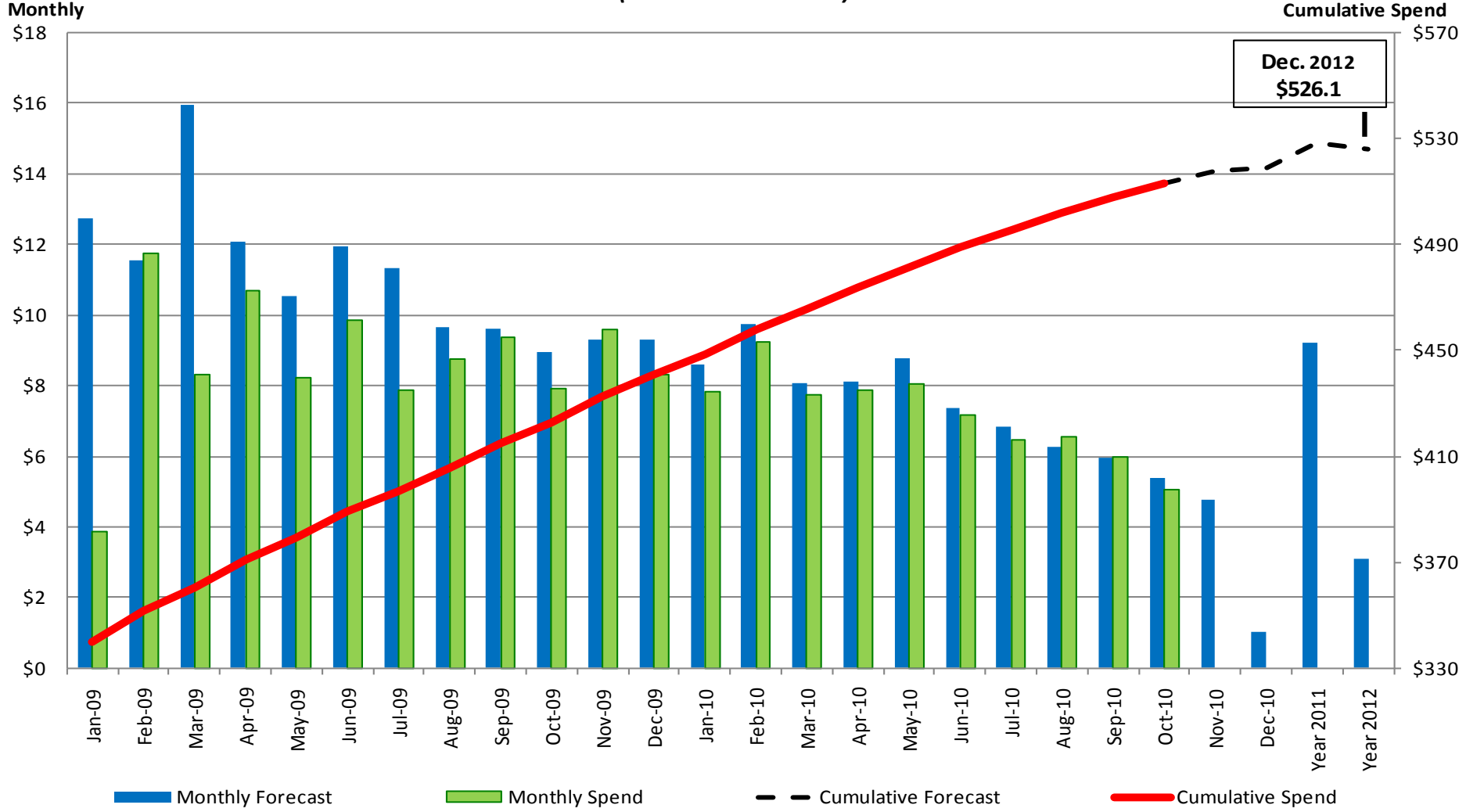
Financial Review – Board Discretionary Fund



Financial Review – Program Cost Management

Monthly Budget, Forecast and Actual Analysis

(Amounts in Millions)



**Dec. 2012
\$526.1**

█ Monthly Forecast
 █ Monthly Spend
 - - - Cumulative Forecast
 — Cumulative Spend

Note: Years 2011 and 2012 reflect finance charges

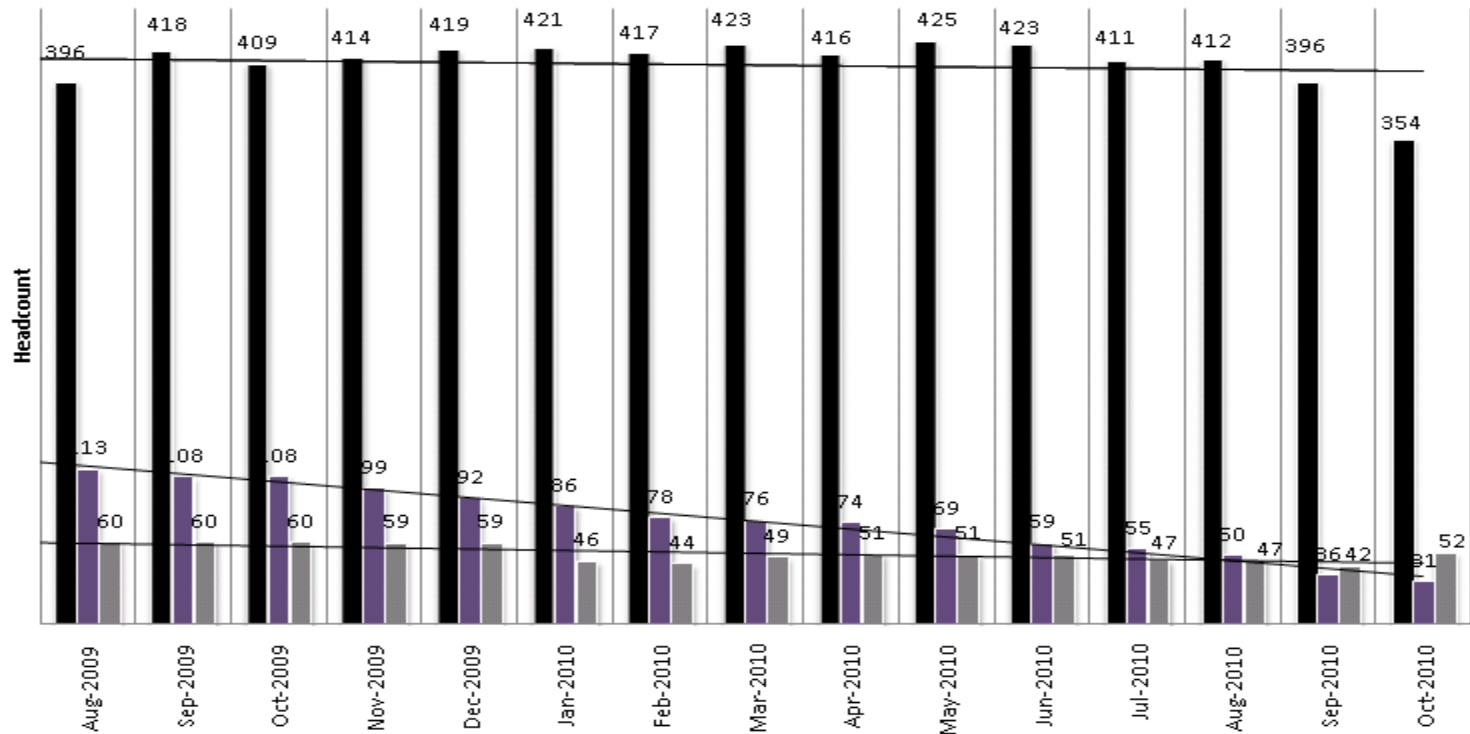


Questions?

Appendix

Nodal Internal/External and Vendor Headcount 2010

Nodal Internal/External and Vendor Headcount for 2010



	Jul-09	Aug-09	Sep-09	Oct-09	Nov-09	Dec-09	Jan-10	Feb-10	Mar-10	Apr-10	May-10	Jun-10	Jul-10	Aug-10	Sep-10	Oct-10
■ ERCOT Employees	385	396	418	409	414	419	421	417	423	416	425	423	411	412	396	354
■ Contingent Labor	121	113	108	108	99	92	86	78	76	74	69	59	55	50	36	31
■ Vendor Labor	62	60	60	60	59	59	46	44	49	51	51	51	47	47	42	52

As of November 5, 2010

