ERCOT OPERATIONS MONTHLY REPORT – MARCH 2006

Acronyms ................................................................................................................................. 4

Grid Operation .......................................................................................................................... 5
  Daily Peak Demand .................................................................................................................... 6
  13 Month Review of Peak Demand .......................................................................................... 6
  Daily Average Temperature in Five Congestion Management Zones ..................................... 6
  Relative Activity Capacity Purchases - OOMC & RMR ........................................................... 7
  Total Number of Days of Local Congestion Management ....................................................... 7
  Instances of CSC Congestion .................................................................................................. 9
  Notable Events ....................................................................................................................... 10

Market Operation ...................................................................................................................... 11
  Ancillary Services ................................................................................................................... 11
    Average Hourly Procurement by Ancillary Service ............................................................... 12
    13 Month Review of Average Hourly Procurement by Ancillary Service ............................ 12
    Average MCPC by Ancillary Service .................................................................................... 13
    13 Month Review of Average MCPC by Ancillary Service ..................................................... 13
    Average Deployment by Ancillary Service ............................................................................ 14
    13 Month Review of Average Deployment by Ancillary Service .......................................... 14

Balancing Energy ...................................................................................................................... 15
  Average Balancing Energy Deployed .................................................................................... 15
    Average UBES Deployment in Five Zones .......................................................................... 16
    Average DBES Deployment in Five Zones .......................................................................... 16
    13 Month Review of UBES Deployment ............................................................................. 17
    13 Month Review of DBES Deployment ............................................................................. 17

Energy Purchased Through ERCOT .......................................................................................... 18
  Total Daily Balancing Energy Scheduled for Purchase Through ERCOT (GWh) .................... 19
    13 Month Review of Total Balancing Energy Scheduled for Purchase through ERCOT (GWh)... 19
    Average Balancing Energy Scheduled for Purchase Through ERCOT by Interval (MWh) .... 20

% of Total ERCOT Energy Requirement .................................................................................. 21
  Average BES Deployed: as a Percentage of Total Energy Requirement ................................. 22
  13 Month Review of Average BES Deployed: as A Percentage of Total Energy Requirement .... 22

Average MCPE .......................................................................................................................... 23
  Average MCPE in Five Zones ............................................................................................... 24
  Average MCPE at Each Interval for Five Zones ...................................................................... 24
  13 Month Review of MCPE ..................................................................................................... 25
  Average Fuel Index ................................................................................................................ 25

Average Shadow Price ............................................................................................................. 26
  Average Shadow Price .......................................................................................................... 27
  13 Month Review of Average Shadow Price .......................................................................... 27

Cost Summary ........................................................................................................................... 28
  Ancillary Service Capacity Cost ............................................................................................. 29
  13 Month Review of Ancillary Service Capacity Cost ............................................................... 29
  Ancillary Service Deployment Cost ......................................................................................... 30
  13 Month Review of Ancillary Service Deployment Cost ......................................................... 30
  OOMC Cost at Final ................................................................................................................ 31
  13 Month Review of OOMC Cost At Final Settlement and True Up ...................................... 31
  RMR Cost (Initial Settlement) ................................................................................................. 32
  RMR Net Cost (Initial Settlement) .......................................................................................... 32
  Verified Actual RMR Cost* .................................................................................................... 33
  Total Local Congestion Costs by the Physical Location of Instructed Units ......................... 34
  Total Local Congestion Costs by Instruction Type (in Million $) ............................................ 34
  Local Congestion Cost By Instruction Type by Day ............................................................... 35

ERCOT OPERATIONS MONTHLY REPORT – MARCH 2006
Addendum: Map of Local Congestion Areas (charts on pages 34 & 35)
Daily Peak Demand

Peak Demand for the Month: 3/24/06 7:15 39126

13 Month Review of Peak Demand

Peak Demand is Peak Interval Demand
Daily Average Temperature in Five Congestion Management Zones

Relative Activity Capacity Purchases – OOMC & RMR

Total Number of Days of Local Congestion Management

Contingency | Congestion Element | # of Days
---|---|---
Bowie TMPP - Patterson Street 138kv | Bowie 138/69kv auto | 8
San Angelo - Menard 138kv | Ballinger - Paint Rock 69kv | 8
Marion - Zorn & Clear Springs 345kv | Seguin - Seguin West 138kv | 6
Odessa EHV 345/138kv auto | Rosene Nylon Tap - Olefin 5sw | 6
Marion - Zorn & Clear Springs 345kv | Zorn - Seguin 138kv | 4
Hill Country - Marion & STP 345kv | Schertz - Parkway 138kv | 4
Jack County - Patterson Street 138kv | Marion - Hill Country & Skyline 345kv | 2
North Edinburg 345/138kv auto | North Edinburg - Mif Burns 138 KV | 2
Paris Sw to Valley Sw 345kv | Commerce to Commerce South | 2
San Miguel to Marion 345kv | Leon Creek to Pleasanton 138kv | 2
Sonora to Hamilton 138kv | Uvalde to Asphalt Mines 138kv | 2
Marion - Hill Country & Skyline 345kv | Geronimo - Seguin 138kv | 2

Note: 1 Unit-Day = 1 unit procured during any time period within one trade day.
Instances of CSC Congestion

Notable Events

New Procedures/Forms/Operations Bulletins

<table>
<thead>
<tr>
<th>Date</th>
<th>Event Description</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>03/01/06</td>
<td>Transmission &amp; Security Desk – Western Area Action Plan for Voltage Support</td>
<td>245</td>
</tr>
<tr>
<td>03/15/06</td>
<td>VDI Guideline to Relieve QSEs from AS Obligations</td>
<td>246</td>
</tr>
<tr>
<td>03/15/06</td>
<td>Scheduling Emergency Power Across the South DC Tie</td>
<td>247</td>
</tr>
<tr>
<td>03/23/06</td>
<td>Day Ahead Desk Operating Procedure</td>
<td>249</td>
</tr>
<tr>
<td>03/30/06</td>
<td>Shift Supervisor Procedure V3R23</td>
<td>250</td>
</tr>
<tr>
<td>03/30/06</td>
<td>Transmission &amp; Security Desk V3R67</td>
<td>251</td>
</tr>
</tbody>
</table>

Significant Communication Problems

None

OCN, Advisory, Alert, Emergency Notice and Major Disturbances

<table>
<thead>
<tr>
<th>Date</th>
<th>Time</th>
<th>Event Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>03/01/06</td>
<td>13:30-16:00</td>
<td>OCN Insufficient Balancing Energy available hours 1600 through 2000</td>
</tr>
<tr>
<td>03/08/06</td>
<td>14:15-18:00</td>
<td>Transmission Alert Loss of Kingsville-Alice 138 kV loads Falfurrias 138/69 kV tr.</td>
</tr>
<tr>
<td>03/11/06</td>
<td>14:30-19:00</td>
<td>Transmission Alert Loss of Big Foot 138/69 kV tr loads Dilley2-Pearsall 69 kV &amp; Dilley Switch 138/69 kV tr.</td>
</tr>
<tr>
<td>03/18/06</td>
<td>20:57-24:00</td>
<td>Transmission Notice for the Hamilton and Uvalde areas due to a forced outage on the Sonora-Cauthorn 138 kV circuit.</td>
</tr>
<tr>
<td>03/20/06</td>
<td>9:30-19:00</td>
<td>Transmission Alert Loss of Kingsville-Alice 138 kV loads Falfurrias 138/69 kV tr.</td>
</tr>
<tr>
<td>03/20/06</td>
<td>14:31-19:00</td>
<td>Transmission Alert Loss of San Angelo-Menard 138 kV loads Ballinger-Paint Rock 69 kV.</td>
</tr>
<tr>
<td>03/21/06</td>
<td>0:15-24:00</td>
<td>Transmission Alert Loss of Big Three-Victoria DuPont Switch 138kV circuit will island with BP Chemical Vistron-Black Bayou-Big Three 138kV circuits.</td>
</tr>
<tr>
<td>03/24/06</td>
<td>9:34-23:55</td>
<td>Transmission Alert Loss of Aspermont-Spur or Aspermont-Paint Creek loads underlying system beyond 1st contingency limits.</td>
</tr>
<tr>
<td>03/29/06</td>
<td>18:10-24:00</td>
<td>Transmission Alert Loss of Menard 138/69 kV tr or San Angelo-Menard 138 kV line loads Ballinger-Paint Rock 69 kV.</td>
</tr>
</tbody>
</table>

Major system Voltage problems/Load Shed incidences

None

Major Computer System Problems/Enhancements/Fixes

None

Security Alert Stage/Threatcon/Related issues

None/None

Major Weather Related Power System Problems

<table>
<thead>
<tr>
<th>Date</th>
<th>Details</th>
</tr>
</thead>
<tbody>
<tr>
<td>03/18-03/19</td>
<td>Thunderstorms in West Texas caused the loss of nine 69 kV lines and four 138 kV lines.</td>
</tr>
<tr>
<td>03/28</td>
<td>13:00-14:10 Multiple lines in Austin are tripped during thunderstorms.</td>
</tr>
</tbody>
</table>

New SPS & RAP's

None

Update on New Generation

None

Max/Min Temperature

Max: 93.8°F W
Min: 25.8°F W
Market Operation

Ancillary Services

Average Hourly Procurement by Ancillary Service

13 Month Review of Average Hourly Procurement by Ancillary Service
Balancing Energy

Average Balancing Energy Deployed
13 Month Review of UBES Deployment

13 Month Review of DBES Deployment

Balancing Energy
Energy Purchased Through ERCOT

(PRRA04: Any Balancing Energy scheduled through the ERCOT Scheduling process)
Total Daily Balancing Energy Scheduled for Purchase Through ERCOT (GWh)

13 Month Review of Total Balancing Energy Scheduled for Purchase through ERCOT (GWh)

Average Balancing Energy Scheduled for Purchase Through ERCOT by Interval (MWh)
Balancing Energy
% of Total ERCOT Energy Requirement

Average BES Deployed: as a Percentage of Total Energy Requirement

13 Month Review of Average BES Deployed: as A Percentage of Total Energy Requirement
Balancing Energy

Average MCPE

Average MCPE in Five Zones

Average MCPE at Each Interval for Five Zones
### Ancillary Service Capacity Cost

**13 Month Review of Ancillary Service Capacity Cost**

- **DRS**: 
- **URS**: 
- **RRS**: 
- **NSRS**: 

**Total: $39.21 Million**

### Ancillary Service Deployment Cost

**13 Month Review of Ancillary Service Deployment Cost**

- **DRS**: 
- **URS**: 
- **RRS**: 
- **NSRS**: 

**Total w/DRS: $0.79 Million  Total w/o DRS: $4.63 Million**

**Total w/DRS: $4.10 Million  Total w/o DRS: $83.23 Million**

Note: There is not a price for self-arranged Ancillary Services. MCPC is used to calculate the cost for self-arrangement.
13 Month Review of OOMC Cost At Final Settlement and True Up

- OOMC Cost At Final Settlement
  - Start-Up Payment (Total: $1.97 Million)
  - Total OOMC Payment (Total: $6.34 Million)

- RMR Cost (Initial Settlement)
  - Energy
  - Stand By
  - Start Up
  - BENA Credit

- RMR Net Cost (Initial Settlement)
  - Total Net Cost $5.59 Million

Totals are for time range of the chart.
*Note:

1. Trade dates thru 2/28/06 complete with Initial Settlement data, using estimated eligible costs.

2. Trade dates thru 1/19/06 complete with Final Settlement data, using verifiable actual cost data provided by the RMR Unit owner.
Local Congestion Cost By Instruction Type by Day

- OOMC
- Manual OOME Up
- LBE-hold at or below level
- Manual OOME Dn
- LBE-operate at or above level

Total $8.03 Million

Top Ten Local Energy Deployment Cost by Local Constraints

(Does not include OOMC)

1. Marion-Hill Country & Skyline 345 kv
2. Odessa Ehv 345/138 kv Auto
3. Geronimo Zorn-Seguin 138 kv
4. Commerce-Commerce South 138 kv
5. Seguin-Seguin West 138 kv
6. Bowie Tmpp-Patterson 138 kv
7. Marion-Zorn & Clear Springs 345 kv
8. Marion-Zorn & Clear Springs
9. San Angelo-Menard 138 kv
10. Hill Country- Marion & Stp 345 kv

Top Ten Total: $1.43 Million
The historical data gathered from the monthly reports has been compiled into an Excel workbook which will be updated and posted along with this report at the following link:


Please contact Shuye Teng at 512-248-3998 or email at steng@ercot.com should you have any questions.

Note:

1. DBES cost is a credit to system costs and therefore is shown as a negative number here to differentiate it from the other types of Reliability Costs.

2. BES deployment costs include two parts: the cost for Power Balance and the cost for CSC Congestion. Due to Relaxed Balanced Schedule, the cost paid for Power Balance covers both the difference between ERCOT load forecast and QSE’s schedule and the amount of energy that QSEs intend to buy from Real-Time Energy market.