

2007-09
Long Term Access Goal
Update

ATC Board of Directors Meeting
February 27, 2008





Summary

- ATC is making progress on Long Term Access Goal
- ATC is helping to drive
 - Congestion costs **down**
 - Flexibility **up**
 - Transfer capability **up**

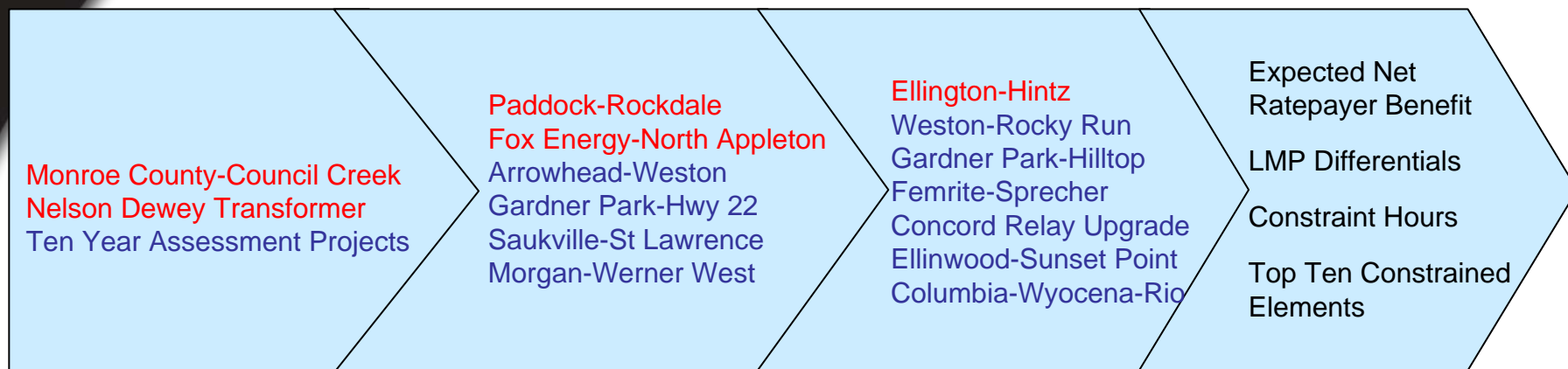


2007-09 Long Term Goal Access (10%)

- Reduce congestion in ATC footprint as measured by Expected Net Ratepayer Benefits*
 - i. In connection with each annual 10-year plan, identify new projects that reduce congestion costs.
 - ii. Prioritize projects and implement or seek regulatory approval, as appropriate.
 - iii. Annually calculate the net rate payer benefit for projects placed in service during the year.
 - iv. Annually review the market and LMP levels with the Board of Directors to place ATC's performance in market context.
 - v. Aggregate performance over the three-year cycle for assessment by the Board of Directors.
- **Measured on an ex-ante basis*

Project Process Pipeline

For Economics of Transmission Projects



Identify & Analyze

Approval & Implementation

In - Service
(Evaluate Results & Benefits)

Market Impacts

Key

Red - Economic Transmission Projects

Blue - Reliability Transmission Projects



Identify and Analyze New Projects

- Projects under evaluation
 - Monroe County-Council Creek 161 kV
 - Nelson Dewey transformer 161-138 kV
- Process Improvements
 - Economic Planning section
 - Screening and prioritizing projects
 - Stakeholder-specified economic studies

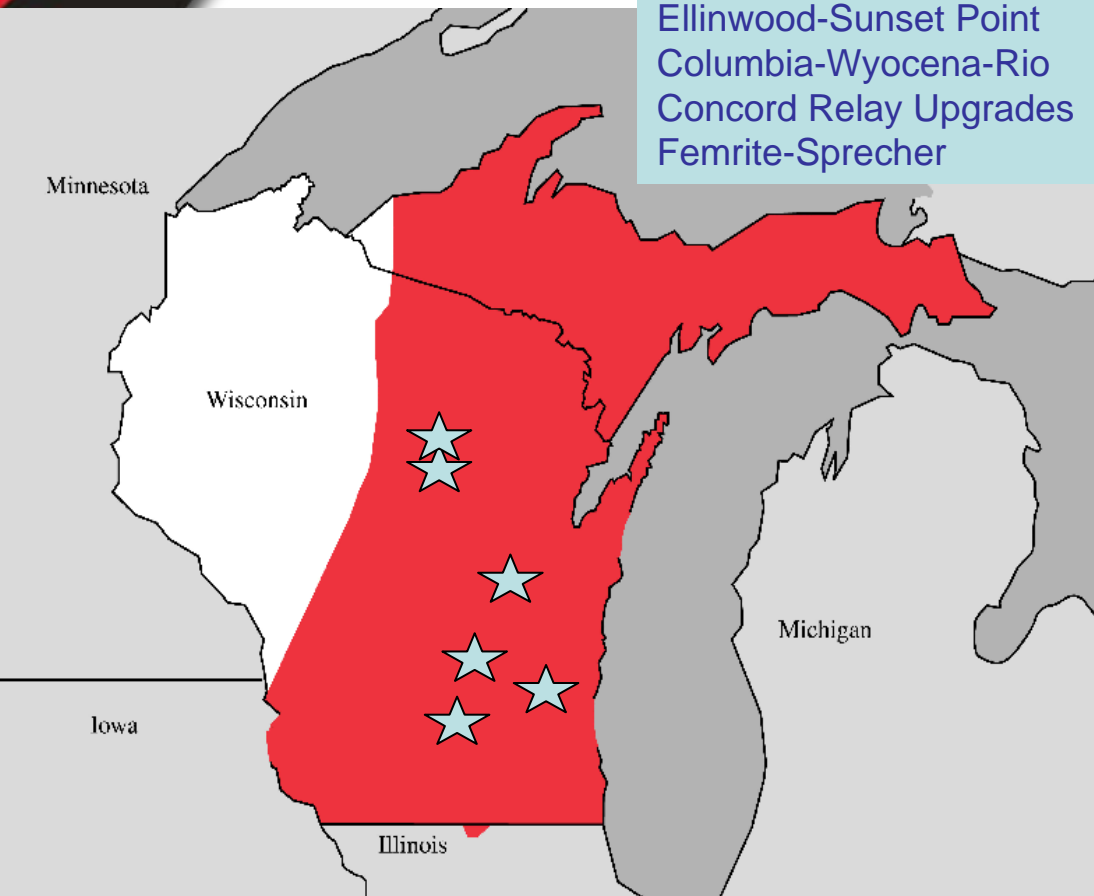


Approvals and Implementation

- Paddock-Rockdale 345 kV
 - Project identified in Access docket; CPCN pending before PSCW.
- Fox Energy-North Appleton 345 kV
 - Flow constraint identified last Winter; scheduled for construction this Spring.
- Ellington-Hintz 138 kV
 - East-west flow constraint identified last Winter; line upgraded Spring 2007.

Economics of In-Service Projects

Gardner Park-Hilltop
Weston-Rocky Run (T20)
Ellinwood-Sunset Point
Columbia-Wyocena-Rio
Concord Relay Upgrades
Femrite-Sprecher



- Projects were justified by Reliability Needs
- Projects also provided \$3.6 Million in 2007 due to reduced energy costs and losses
- Forecasting a continuation of 2007 savings, approximately 80% of project costs are offset
- Project costs = ~\$84 million

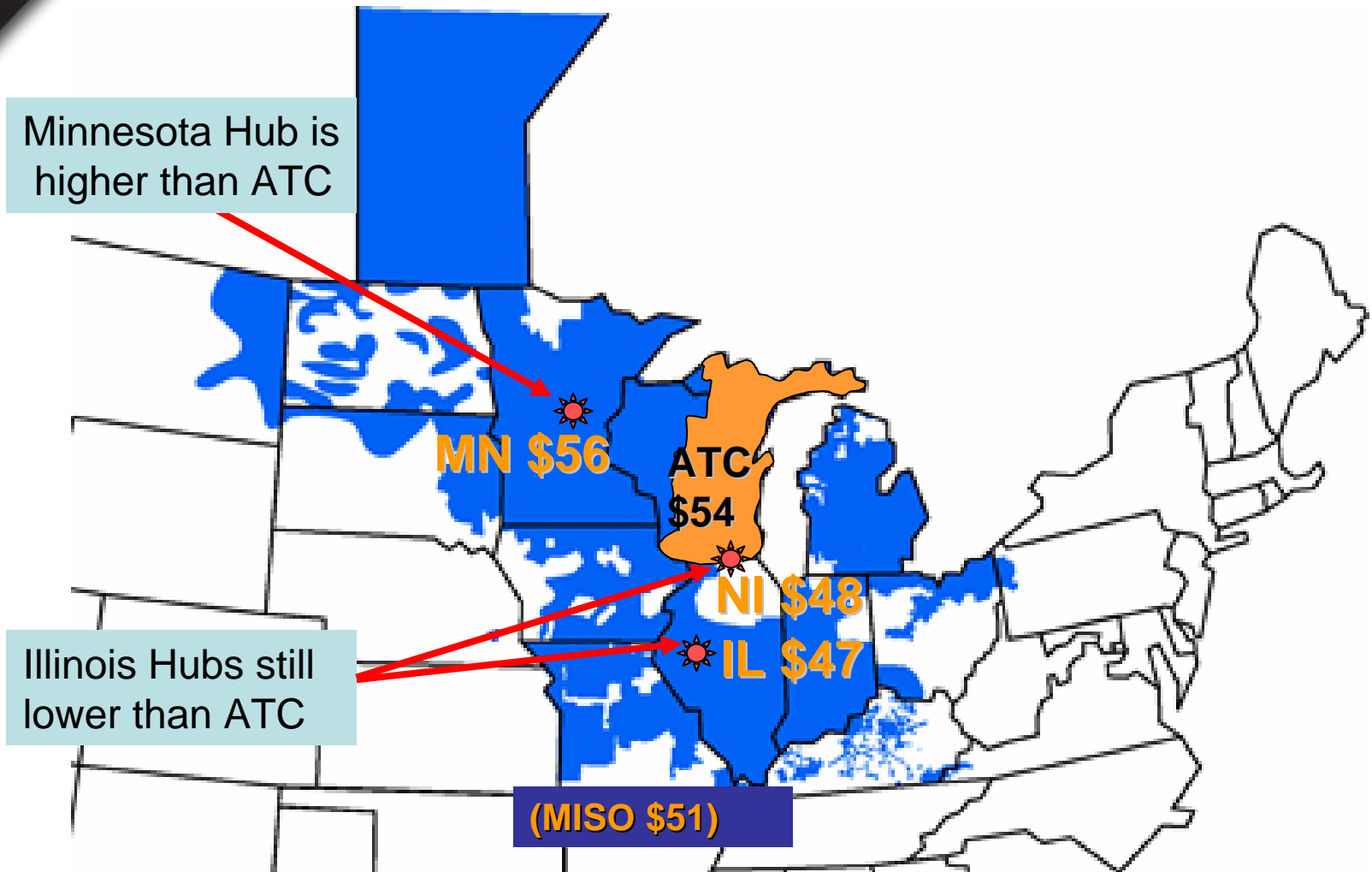


2007 Market Review

- Portfolio of metrics
 - LMP Differentials into ATC
 - Annual
 - Monthly
 - Constraint hours
 - Top ten constrained elements
 - ATC imports and exports

LMP Differentials Into ATC

Annual - 2007

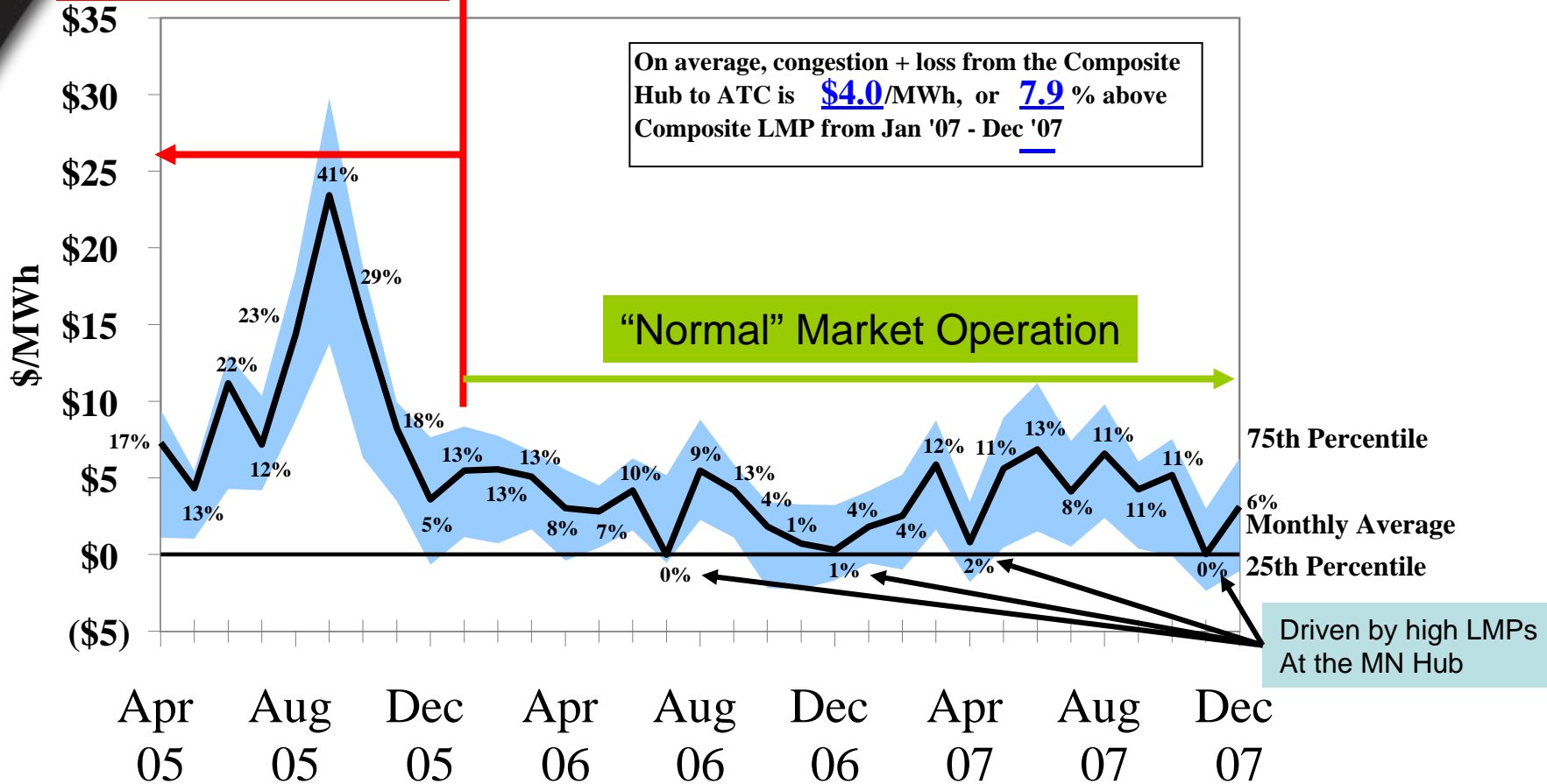


LMP Differentials Into ATC Monthly

- Katrina
- Coal conservation
- Market Start-up

Into-ATC Metric

On average, congestion + loss from the Composite Hub to ATC is **\$4.0/MWh**, or **7.9%** above Composite LMP from Jan '07 - Dec '07



Constraint Hours 2005, 2006 and 2007

	Day Ahead Hours	Real Time Hours
2005*	10,969	4,261
2006	10,490	2,922
2007	11,241	2,697
AVG	10,900	3,293

* 9 Months of Market Operation

2007 ATC Top Ten Constrained Elements

Number of hours in which this constraint occurred	Constraint (DA Market)
11241	Total for all ATC Day Ahead constraints 1-1-2007 thru 12-31-2007
1999	Paddock 345/138 kV Transformer T21 flo Wempletow n - Rockdale 345 kV
1409	Eau Claire - Arpin 345 kV
648	Hintz - Werner 138 kV flo North Appleton - Werner West 345 kV
523	Ellington - Hintz 138 kV flo North Appleton - Werner West 345 kV
290	Pleasant Valley - Arthur Rd 138 kV flo Saukville - Barton 138 kV
661	Highw ay V - Preble 138 kV flo Lost Dauphin - Red Maple 138 kV
529	Stiles - Pulliam 138 kV (64441) flo Stiles - Pulliam 138 kV (64451)
326	North Appleton - Werner West - Rocky Run 345 kV
441	Stiles - Pulliam 138 kV (64451) flo Stiles - Pulliam 138 kV (64441)
292	Stiles - Pulliam 138 kV (64451) flo Morgan-White Clay 138 kV

- Total of Top Ten Constraint hours = 7,118 (63%)
- Total number of constraints = 112

2007 ATC Top Ten Congested Elements



#3 Hintz – Werner
#4 Ellington – Hintz
#8 N Appleton – Werner West
Weston Unit 4 (2008)
Gardner Park – Hwy 22 (2009)

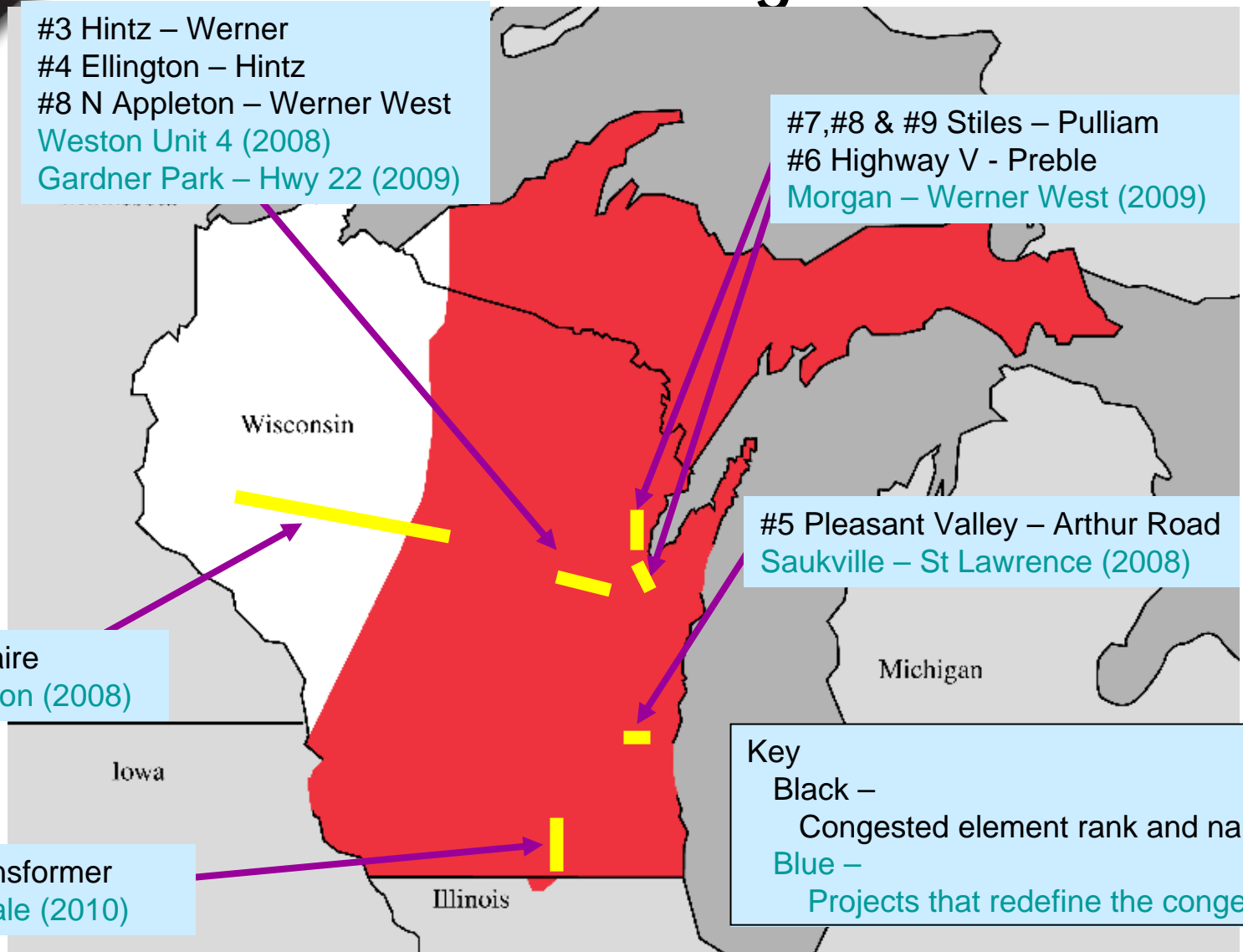
#7, #8 & #9 Stiles – Pulliam
#6 Highway V - Preble
Morgan – Werner West (2009)

#5 Pleasant Valley – Arthur Road
Saukville – St Lawrence (2008)

#2 Arpin – Eau Claire
Arrowhead – Weston (2008)

#1 Paddock Transformer
Paddock-Rockdale (2010)

Key
Black –
Congested element rank and name
Blue –
Projects that redefine the congestion





ATC Imports and Exports

January – December 2007

- ATC was a net importer of energy 99% of the hours
 - Maximum net import was 2941 MWs
- Ranges of flows on ATC's System
 - Southern Flowgates
 - 2423 MW Import - 1088 MW Export
 - Western Flowgates
 - 1089 MW Import - 466 MW Export
- Energy flows stay in ATC
- Flexibility across multiple futures is the key



Conclusions and Discussion

- Reliability projects have contributed significant economic benefit
- External LMP prices continue to be lower than LMPs within ATC
 - Difference is smaller
- ATC's current project portfolio is responsive to current constraints
 - The top ten congested elements in ATC will be substantially addressed by 2010
- Customers benefit from the removal of constraints whether importing or exporting