



PJM: Next Steps

Electric Power Generation Association

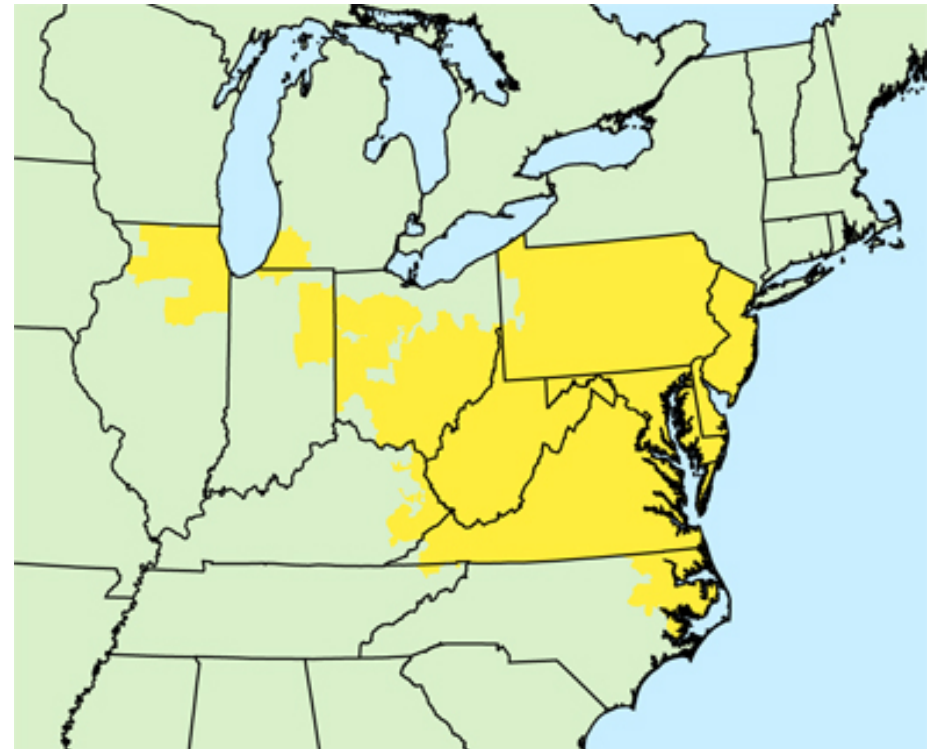
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**Mike Kormos
Sr. Vice President**



New PJM RTO Profile

- More than 51 million people served in Delaware, Illinois, Indiana, Kentucky, Maryland, Michigan, New Jersey, North Carolina, Ohio, Pennsylvania, Tennessee, Virginia, West Virginia and the District of Columbia
- >136,000 megawatts of peak load
- 163,806 megawatts of generation capacity
- 56,070 miles of transmission lines
- 1,082 generation sources with diverse fuel types
- 350 plus members
- **BIG, LIQUID MARKET**



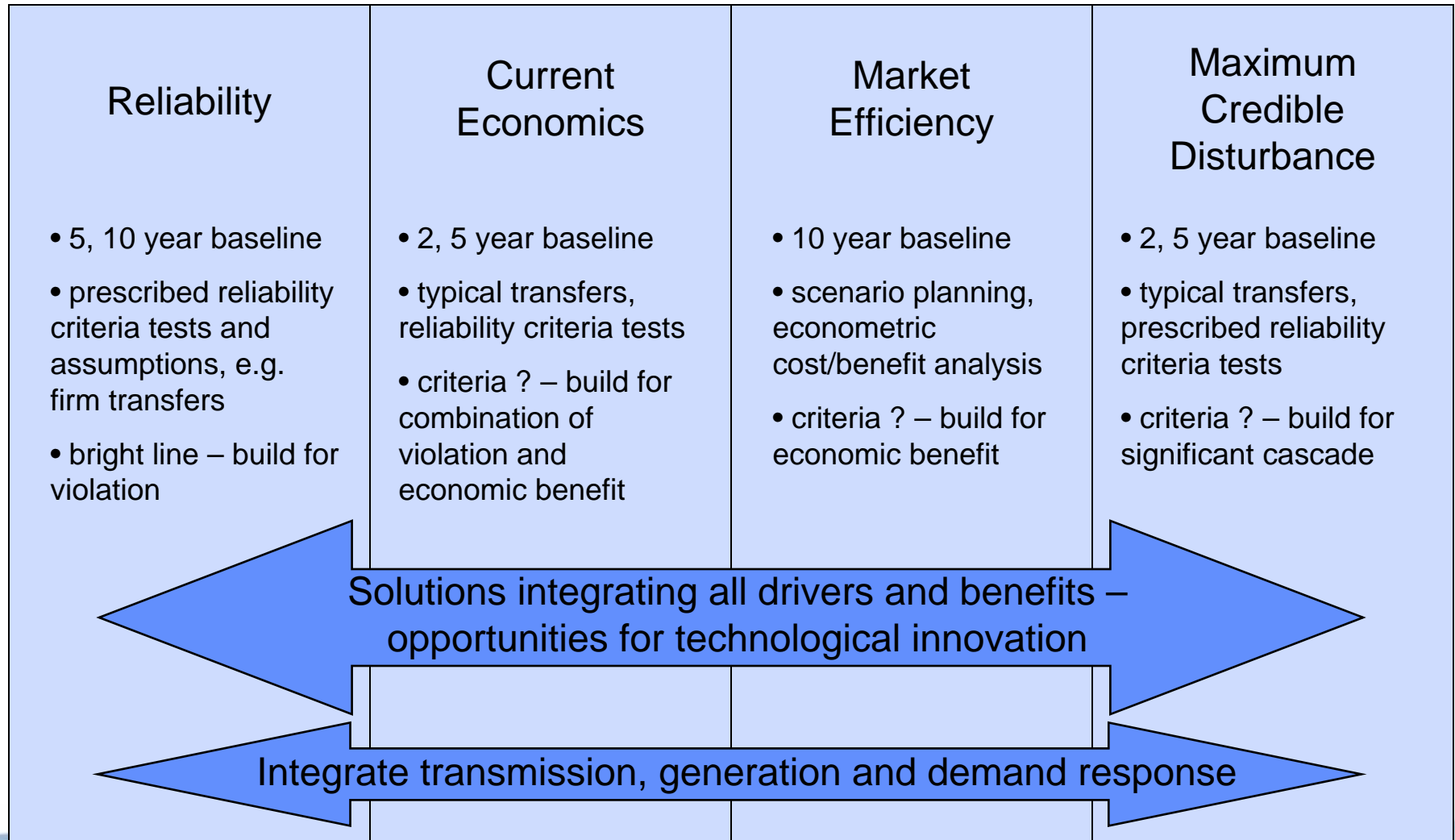
- Implemented first locationally priced market
- Designed capacity market
- Regional Transmission Expansion Plan to maintain reliability – over \$1 billion of investment directed
- Generation Interconnection Process – facilitated connection of over 16,000 MWs
- FTR auctions to allow customers to hedge congestion costs
- Successfully integrated systems which more than doubled the market served from 2001 to present.

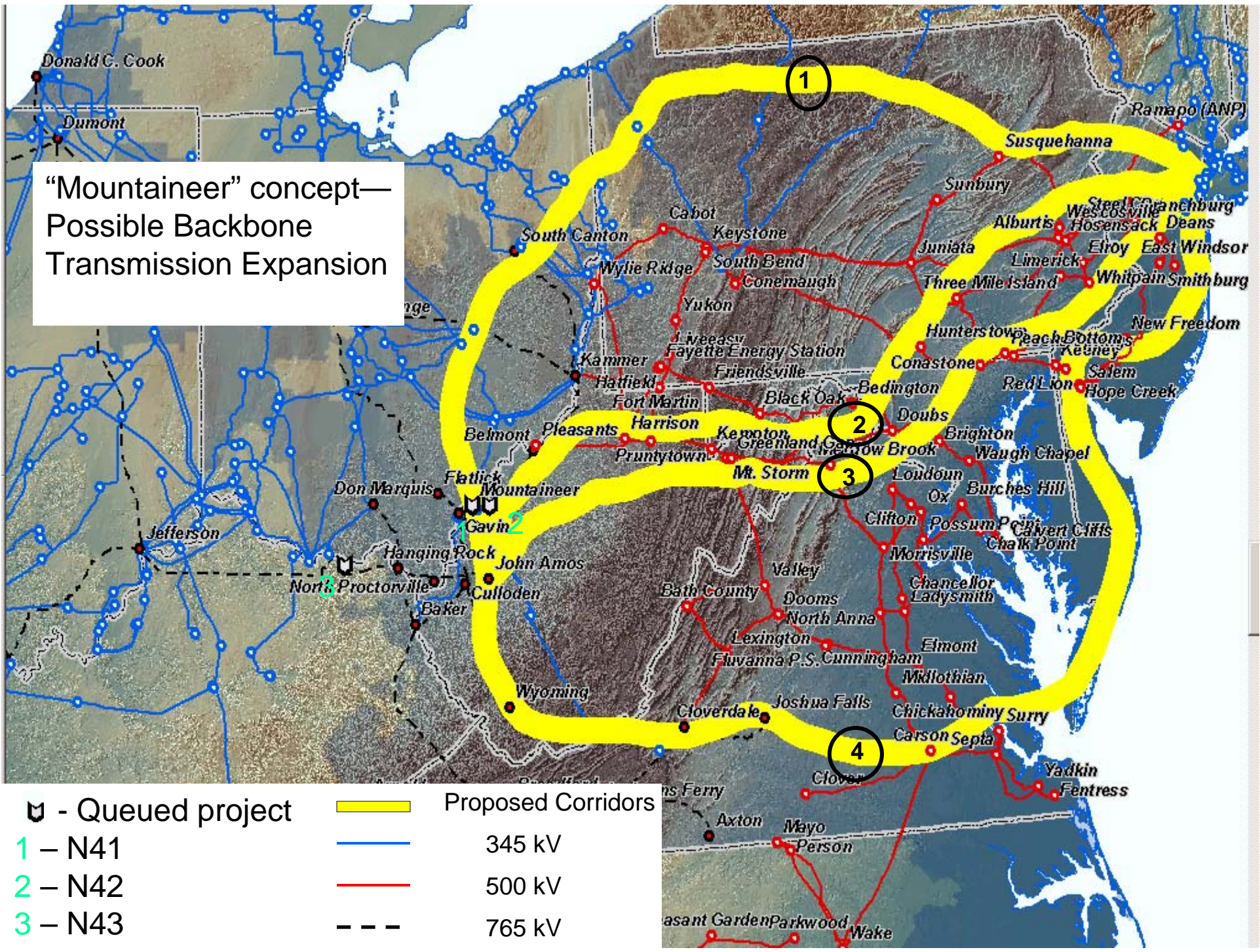
- **Generation Retirements**
 - Timing vs. Transmission Construction Lead Time
 - Concentration of Retirements in East
- **Fuel Diversity**
 - New Generation is Virtually all Natural Gas Fired
 - Currently an Economic Issue, Could Become a Reliability Issue
- **Aging Infrastructure**
- **National issue of better cost accountability (see APPA, ELCON, etc)**



- Redesign of capacity market (Reliability Pricing Model)
- Longer-term transmission planning
 - “Moutaineer” concept to expand high voltage transmission from coal regions to East
- Demand Response Initiatives
- PJM Stated Rate

- Locationally based capacity markets
 - Currently system is flush but some locations are tight – low prices reflect system conditions
- Downward sloping “demand curve”
 - Price high when capacity in zone is tight, lower as capacity is added
- Four year forward commitment
 - Allows for new resources to be committed – generation, transmission, demand
- Analysis demonstrates capacity prices, while higher than today, will be lower over time
- Filed at FERC on August 31





“Mountaineer” concept—
Possible Backbone
Transmission Expansion

- u - Queued project
- 1 – N41
- 2 – N42
- 3 – N43
- Proposed Corridors
- 345 kV
- 500 kV
- 765 kV

- Demand Response needed as necessary balance to supply in any commodity market
- PJM attempts to “institutionalize” demand response programs in order to provide stability for demand providers
- New “forward energy reserve” (FER) initiative to facilitate load shaping
- Anticipate filing of package at FERC by end of year

- PJM has worked to prudently manage costs while expanded member requested services
 - Reduced 2004 administrative rate by 20% over 2003
- Nevertheless, some customers concerned about "runaway" RTO costs
- PJM sees opportunity to manage investment in necessary systems while providing price stability
- Filed "stated rate" with FERC to provide for a stable rate over several years
- FERC asking for more information from PJM

- Many of the *original* goals for RTOs have been accomplished
- Need to move to the next set of challenges
- Some stakeholders will agree with some initiatives while others will disagree
- Total package of initiatives intended to benefit all and further reliability and competitive markets