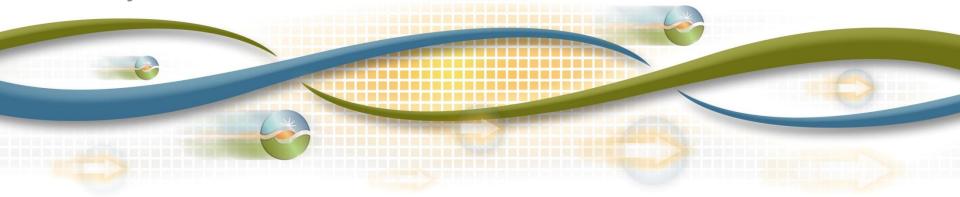


EIM market power mitigation

Department of Market Monitoring

Market Surveillance Committee Meeting May 19, 2014



Agenda

- Review/update on market power analysis and conclusions
- Default energy bids for EIM
- Technical specification of EIM transfer constraints incorporated into market power mitigation



Pivotal supplier analysis

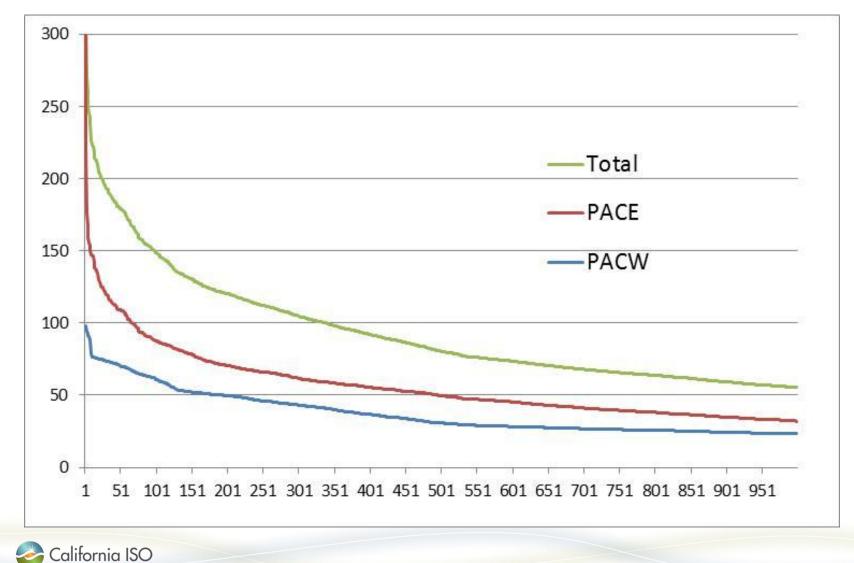
Residual supply (within EIM) + non-PAC supply from EIM transfers

Imbalance energy demand (non-PAC)_t

- Residual supply
 - Unless many small suppliers, may be limited to residual supply excluding 3 largest suppliers (3-pivotal supplier test)
- Non-PAC supply from EIM transfers
 - Assumes CAISO is competitive supply to PACW
 - Assume PACE↔PACW not competitive supply (unless can be sourced from CAISO).



Hourly imbalance energy demand (2012)



Market power analysis – updated information

- Non-PAC demand for imbalance energy
 - 2012 data provided by PAC incomplete
 - actual demand higher by unknown about
- Non-PAC supply
 - Limited about dispatchable of non-PAC supply expected at least initially
 - May incur extra \$8/MWh (minimum) for hourly transmission from PAC for EIM dispatches.

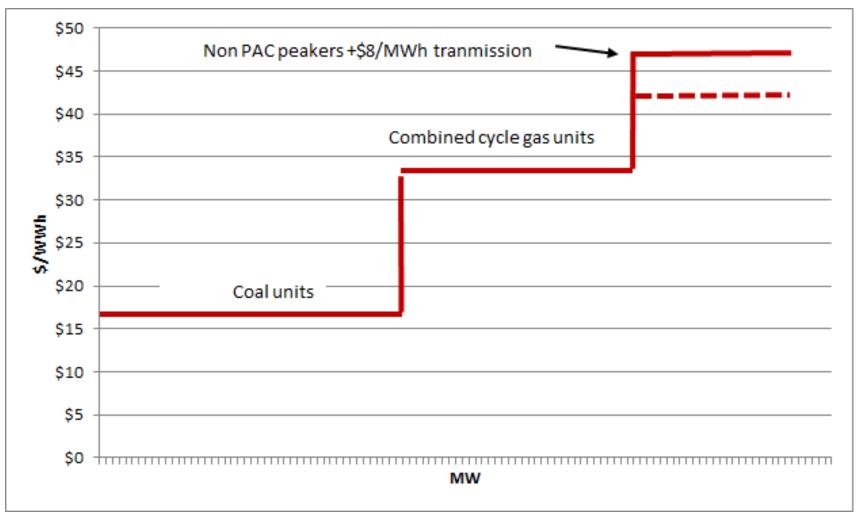


Market power analysis – updated information

- Transmission capacity (CAISO \rightarrow PACW)
 - PAC merchant will retain control over how much transmission capacity made available to EIM
 - Reaffirmed right to sell or use this transmission for non-EIM transactions
- Transmission capacity (PACW \rightarrow PACE)
 - − 0 MW of EIM scheduling rights from PACW \rightarrow PACE
 - Incremental EIM capacity from PACW→PACE could be created if base EIM schedules include dynamic schedules from PACE→PACW using EIM transmission.



Default energy bids – hourly transmission costs





EIM transfer constraints (before considering dynamic base schedules using EIM transmission rights

