

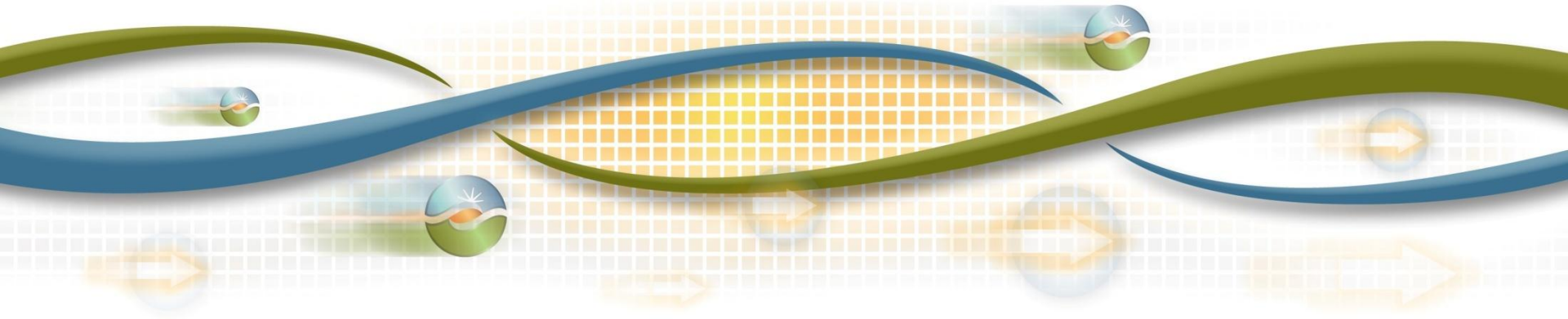


California ISO  
Shaping a Renewed Future

# Integration of Transmission Planning and Generator Interconnection (TPP-GIP Integration)

## Final Proposal

Stakeholder conference call, March 16, 2012

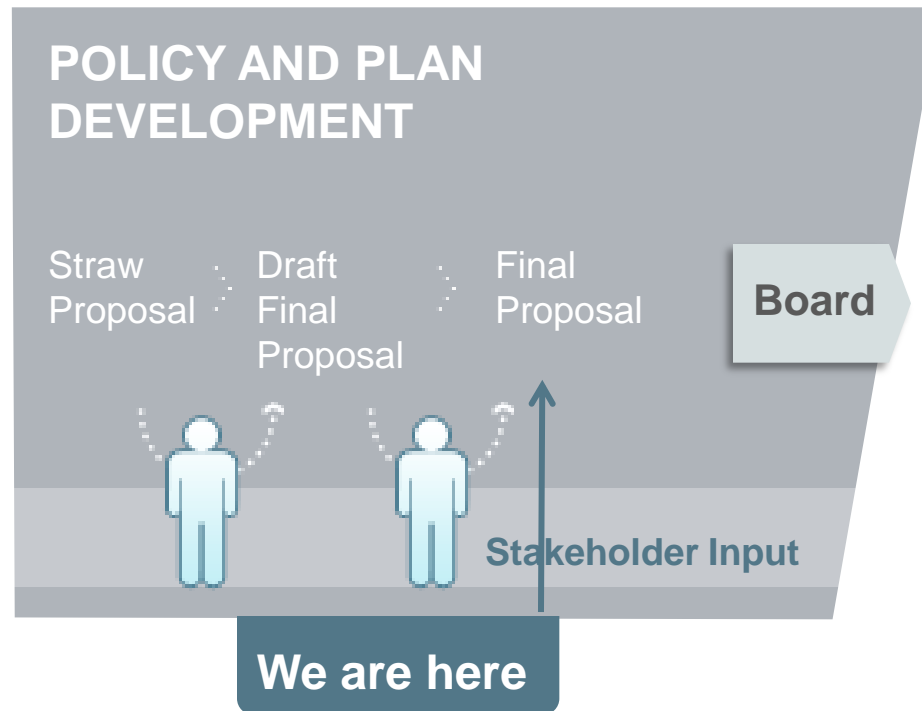


# Stakeholder Process, Agenda

Chris Kirsten

Senior Stakeholder Engagement and Policy  
Specialist

# ISO Stakeholder Initiative Process



# Schedule for stakeholder process

Date	Event
July 21, 2011	ISO posts Straw Proposal
July 28	Stakeholder meeting at ISO
August 9	Stakeholders' written comments due
September 12	ISO posts Revised Straw Proposal
September 19	Stakeholder meeting at ISO
September 26	Stakeholders' written comments due
November 23	ISO posts Discussion Paper
December 1	Work group meeting at ISO
January 12, 2012	ISO posts Second Revised Straw Proposal
January 19	Stakeholder meeting at ISO
January 31	Stakeholders' written comments due
February 15	ISO posts Draft Final Proposal
February 22	Stakeholder meeting at ISO
March 1	Stakeholders' written comments due
March 9	ISO posts Final Proposal
March 16	Stakeholder call
March 22-23, 2012	ISO Board meeting

# Agenda

Time		Speaker
10:00-10:10	Stakeholder Process, Agenda	Chris Kirsten
10:10-11:50	Final Proposal	Lorenzo Kristov
11:50-12:00	Next Steps	Chris Kirsten

# Final Proposal

Lorenzo Kristov

Principal, Market & Infrastructure Policy

# Final proposal responds to stakeholder and MSC input

- Stakeholders requested further clarifications in a few areas
- MSC provided formal opinion, adopted March 9
- Final proposal makes some clarifications and modifications to improve the proposal
- ISO posted both clean and redline (against 2/15 draft final proposal) versions on March 9
- Today's presentation contains one change from March 9 proposal
  - RNU cash reimbursement – slides 15-16

# Clarification: Distinction between ADNU and LDNU

- ADNU are upgrades needed to provide deliverability for generation in a large geographic or electrical area to the aggregate of ISO load
  - Need is driven by total amount of generation in the area, rather than interconnection points of specific projects
  - Could be identified in either TPP or GIP studies
- LDNU are upgrades needed to provide deliverability for smaller amounts of generation within a smaller area to the aggregate of ISO load
  - Driven by deliverability constraints for a small group of generators electrically close to each other
  - Typically identified in GIP studies and not in TPP



# Study methodology for identifying ADNUs and LDNUs – Local and Area Deliverability Constraints

- Local deliverability constraints driving LDNUs
  - 5% DFAX circle includes a few buses electrically close
  - Do not trigger “problematic” high cost upgrades
- Area deliverability constraints driving ADNUs
  - 5% DFAX circle includes buses in one or more study areas
  - May trigger “problematic” high cost upgrades

# Study methodology for identifying ADNU and LDNU – Round 1 Deliverability Assessment

- Round 1 Deliverability Assessment
  - Study all generation projects to identify deliverability constraints
  - Identify LDNUs to relieve local deliverability constraints
  - Curtail generation sufficient to relieve area deliverability constraints
    - Phase 1: curtail current cluster generation, then earlier queued
    - Phase 2: curtail Option B projects first, then Option A projects, earlier queued last

# Study methodology for identifying ADNUs and LDNU – Phase 1 Round 2 Deliverability Assessment

- Phase 1 Round 2 Deliverability Assessment
  - Model LDNUs
  - For each area deliverability constraint, add an incremental amount of generation to Round 1 curtailed case.
  - Identify ADNUs for the incremental generation.

# Study methodology for identifying ADNUs and LDNUs – Phase 2 Round 2 Deliverability Assessment

- Phase 2 Round 2 Deliverability Assessment
  - Model LDNUs
  - Model all Option B projects into the Round 1 cases with generation curtailment.
  - Identify ADNUs for Option B projects.

# Clarification: Classification of generators as “existing” or “new” for NQC reductions

- Discussion of potential NQC reductions in TPP-GIP proposal is provided as a review of 1/31/12 technical bulletin where relevant to this initiative
  - Classification of generators as “new” or “existing” is not an element of this initiative
  - This initiative does not propose any changes to the approach described in the 1/31/12 technical bulletin
- ISO recognizes that certain cases are not covered in the 1/31/12 technical bulletin and will issue a clarification in the near future

## Clarification: Expected impacts of annual re-study process

- Expect significant amounts of generation in queue to withdraw over the next several years
- Network upgrades previously required by withdrawn generation should be reassessed for possible elimination or reduction in scope for later queued projects
- For reductions in scope, the network upgrade schedule is expected to remain unchanged or be shortened
- In some cases cost responsibility could be transferred to later queued projects
  - Cost responsibility for option (B) projects could be increased; but, schedule for COD should not be adversely impacted

## Modification: Cash reimbursement for RNU, and consideration of LDNU costs

- Stakeholder and MSC concerns
  - potential exposure of ratepayers to high RNU and LDNU costs
  - consistent treatment for all energy only projects
  - consideration of such costs in allocation process
- Final proposal: RNU cash reimbursement available for all projects after COD
  - Up to ~~\$40,000~~ \$60,000 per MW of generating capacity
  - Phase 1 & 2 RNU cost caps will still apply
- Final proposal: LDNU cost will be used as tie breaker if 2 or more projects requesting TP deliverability score equally on allocation criteria
  - No change proposed to cash reimbursement of LDNU costs for projects awarded TP deliverability

## Modification: Limit on cash reimbursement for RNU costs will be \$60,000 per MW of generating capacity

- Initial \$40,000 value proposed was simple average (total \$ / total MW) based on
  - Phase 2 RNU costs
  - 5,159 MW cluster 1-2 projects
  - Excluding 4 projects (435 MW) with highest per MW costs
- ISO expanded data set to include
  - 14,544 MW transition cluster plus cluster 1-2 projects
  - Phase 2 RNU costs
  - No exclusion of high-cost projects
- Resulting simple average \$60,000 per MW is also the 71<sup>st</sup> percentile of the cost distribution
  - 71% of the total project MW (10,302 MW) had per MW RNU costs below \$60,000.



## Modification: Retention criterion for a project allocated TP deliverability based on shortlist position only

- Concern was expressed that a project could be allocated TP deliverability based only on a short-list position and retain it without making progress
- Final proposal: If a project is allocated TP deliverability based on only the minimum threshold level of project financing status
  - i.e., it was included on an active LSE short list but had not yet executed a PPA
- Then it must, at a minimum, have an executed PPA by the start of the next allocation cycle in order to retain the allocation

## Modification: Ability for a project awarded partial TP deliverability to park the rest of its original request

- Context: There is not enough TP deliverability to fully meet a project's requested deliverability status
  - ISO will allow the project to accept the smaller allocation of deliverability
- Final proposal
  - If this occurs in first allocation cycle after project receives its phase 2 results, it may park the rest of its capacity until the next allocation cycle
  - Project will execute GIA based on full MW of its request and amount of partial deliverability
  - After end of parking period, GIA will be amended to reflect any additional deliverability allocation

# Next Steps

Chris Kirsten

Senior Stakeholder Engagement and Policy  
Specialist

# The next near-term milestones are shown below

Date	Milestone
March 19	ISO will post draft tariff language for review
March 22-23	ISO Board Meeting