

ROLL-UP WORKING GROUP (RUWG) – Baseline Infrastructure Criteria Development

SSC Conference Call

November 22, 2010

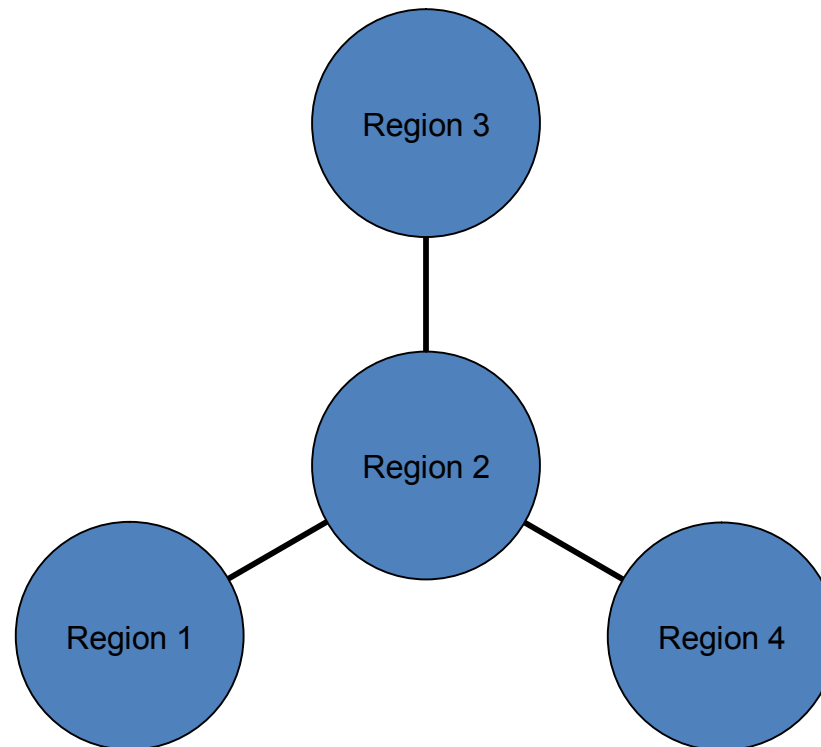
Background

- EIPC initiated a “Roll Up” of ten year plans into one power flow model, intending to use it as starting point for CRA modeling (August).
- RUWG review of Draft Roll-Up data revealed a great deal of inconsistency among input data by PAs (September).
- The SSC agreed on a need for “baseline infrastructure criteria” to determine what portions of Roll-Up would be used (October).

CRA's Economic Models

- CRA's MRN/NEEM macroeconomic models will add generation - but not transmission.
- If we remove generation from the “baseline infrastructure”, the model will add it back (if needed).
- But if we remove transmission, the model will not add it back.

NEEM Transfer Limits Between Regions Are a Major Driver of The Modeling Results – So The Baseline Infrastructure Is Important



Draft Roll-Up Report

- Issued on September 27 (321 pages).
- The SSC and RUWG asked for more consistency on definitions used, and more information on project status, at October 13 - 14 SSC meeting.
- EIPC promised an updated Roll-Up report, but has not provided it yet.

Baseline Criteria Development

- EISPC “Roll Up” working group develops initial criteria for screening degree of firmness of projects (October).
- Criteria supplemented with data from WECC.
- Criteria made available to RUWG and SPWG.
- Input from RUWG received 11/15.
- Criteria discussions were based on the information provided in the September 27th Draft Roll-Up Report.

EISPC's Three Approaches

1. Cut Off: G&T are screened against criteria. Suggestions include; in-service date, size (kV or MW), status e.g. “planned” or “conceptual”, nature of project, e.g. “reliability”, “economic”, “multivalued”.
2. Project Approach: projects are included if they meet threshold criteria such as siting approval, environmental permits, or other.
3. Hybrid Approach: apply cut off criteria, allow exceptions (add in or subtract out) when threshold criteria are met.

Possible Cut Off Criteria

- In service date.
- Project classification e.g. “planned” or “conceptual”.
- Project purpose e.g. “reliability”, “economic”, “multivalued”, “other.”
- Project size; MW for generation or kV for transmission.

Possible Project Thresholds

- Final project design is developed to bid specific format.
- Engineering on project is complete.
- Facility has secured state siting approval.
- Merchant Generation or Transmission have either an Interconnection Agreement or a Power Purchase Agreement and siting and environmental permits.
- Utility generation is designed, engineered, has siting permits and environmental permits.
- Facility has received environmental permits.

Possible Project Thresholds

- Others from WECC
 - Approved financial statements incorporating committed capital to cover the full costs of the project.
 - If applicable, inclusion of project in an IRP or equivalent process that has been approved by applicable regulator(s), ISO or public entity (state/provincial dependent)
 - Major equipment orders placed, or project under construction
 - Permitting actively underway or completed (e.g., EIS, EIR)
 - Executed construction contracts
 - Executed participation contracts
 - Shipper contracts or commitments
 - Regulatory approval for cost recovery, where applicable
 - Right of way acquired or purchased
 - Proposed in-service date within the timeframe of study

Feedback to EISPC

- “Final” engineering for transmission projects may not be complete until after equipment arrives – maybe use bid spec. or some defined cost engineering level.
- States may “review” w/o actually “approving” Integrated Resource Plans.
- States can approve project cost recovery, but this may not guarantee facilities will be built.

Feedback to EISPC

- Start at 2020 and tear down the input list rather than cutting off at some date and building back up.
- Concerns that eliminating transmission assumptions will result in the power models not “solving.”
- Starting with the 2020 case will facilitate producing a solved case.
- Revised RU report uses definitions of “state budget approved”, “planned,” and “proposed” – try to conform criteria to those.

Feedback to EISPC

- Examine whether a transmission project is needed for interregional transfers, or associated with a generation resource.
- Include proposed facilities identified in a Planning Authority's regional planning process as needed to implement state Renewable Portfolio Standards.

Feed Back to EISPC

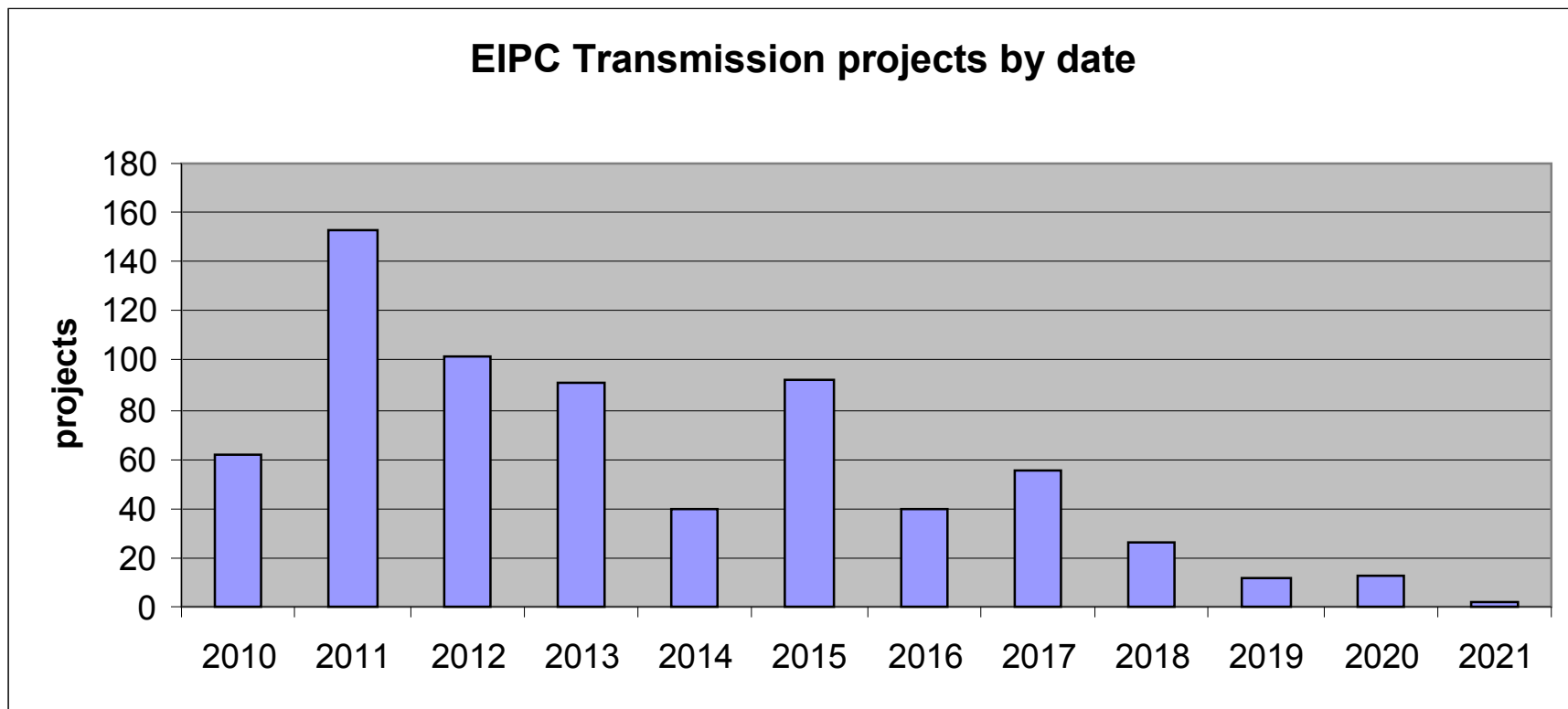
- Deference should be given to PA Processes. If a facility is in an approved regional plan, there should be a presumption that it should be included and there should be a high hurdle to removing such facilities.

EISPC Recommendation

- EISPC Recommended A Hybrid Approach;
 - Number of new facilities (nearly 700) requires some rough justice. Cut off criteria reduce the number to be evaluated to a manageable level.
 - Exceptions should be made for good reason;
 - A project that doesn't meet cut off, but meets threshold criteria can remain on the list.
 - A project that meets the cut off, but doesn't meet threshold criteria can be taken off the list.
 - A project that wasn't in the initial roll up data but meets threshold criteria can be added to the list.

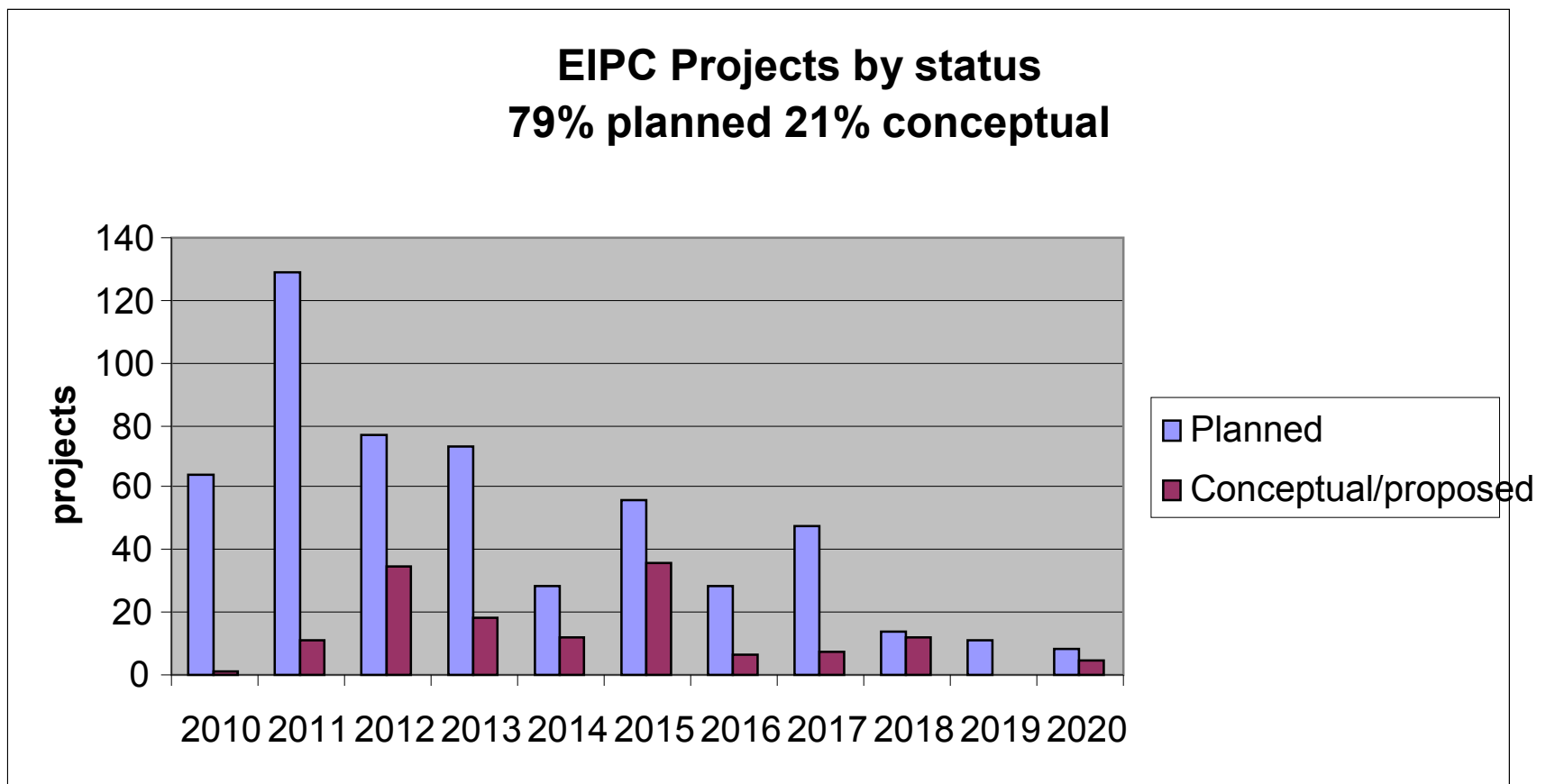
EISPC Suggested Cut Offs - Date

- Date: Projects in-service in year 2015 or sooner are included.



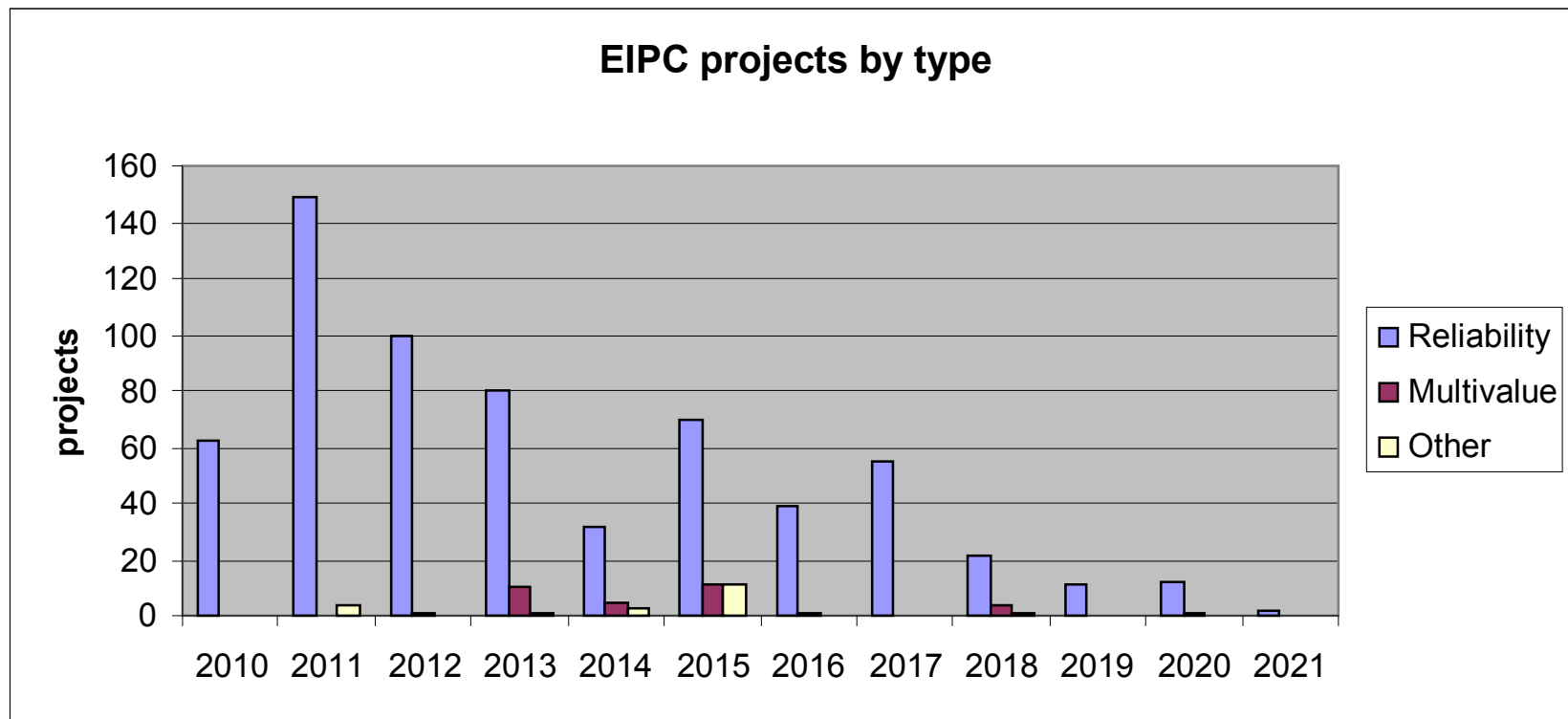
EISPC Suggested Cut Offs - Status

- Status: Only planned, not conceptual projects.



EISPC Suggested Cut Offs - Type

- Nature of project: Only transmission planned to maintain NERC reliability standards (92%)



EISPC Vote

- EISPC voted last week to adopt the “hybrid approach” with *all three* cutoffs - 1) date (2015), 2) status (only planned and not conceptual), and 3) purpose/nature (only reliability); and
- EISPC also voted to allow exceptions (generation or transmission can be added or subtracted for good cause), using the threshold criteria (see slides 7 and 8 above).

Questions

- Will using all three cut-off criteria result in the removal of too many projects?
- Will the model solve?
- And can this criteria be applied to the new roll-up report - which no longer includes some of these categories (such as “conceptual”)?

Next Steps

- **Review Revised Roll-Up Report.**
- **Work with SPWG on criteria - based on new categories, definitions, and information in the revised Roll-Up Report.**
- **Try to reach consensus on a recommendation to SSC before December 13 and 14 meeting .**
- **SSC decision item for December 13 and 14 on the baseline infrastructure criteria.**