Generator Interconnection Process Reform (GIPR)

Revised Draft Proposal

June 27, 2008

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1.0 Introduction

This is the fourth iteration of the Generator Interconnection Process Reform (GIPR) proposal. Changes incorporated into this version are largely the product of input received from stakeholders following the May 5, 2008 (Revised May 7, 2008) version of this document. Section 3.0 below provides a summary of the salient modifications. Moreover, rather than continue to reiterate the background section and general goals of GIPR in this draft, those sections have been relocated to Appendix A for reference purposes.

2.0 Schedule for GIPR Stakeholder Process

January 18, 2008	*CAISO posts Issues Identification Paper*
January 25, 2008	*Stakeholder Meeting*
January 31, 2008	*Stakeholder comments submitted*
February 12, 2008	*CAISO posts Draft Proposal*
February 19, 2008	*Stakeholder Meeting*
February 26, 2008	*Stakeholder comments submitted*
February 28, 2008	*Stakeholder Conference Call*
March 12, 2008	*CAISO Posts Revised Draft Proposal*
March 13, 2008	*Stakeholder Conference Call*
March 20, 2008	*Stakeholder Conference Call*
March 26, 2008	*CAISO Board of Governors Presentation (informational)*
March 27, 2008	*Stakeholder Conference Call*
April 9, 2008	*Stakeholder Conference Call*
April 21, 2008	*Status Report Filed with FERC*
May 5, 2008	CAISO posts revised draft GIPR Proposal
May 8, 2008	Stakeholder Conference Call
May 21, 2008	CAISO posts revised draft GIPR proposal
May 28, 2008	Stakeholder Conference Call
May 30, 2008	CAISO posts draft GIPR Tariff language revisions
June 6, 2008	Stakeholder comments submitted
June 10, 2008	Stakeholder Meeting
June 17, 2008	Stakeholder tariff language comments due COB
June 19, 2008	Stakeholder Conference Call
June 27, 2008	CAISO posts 2nd draft of GIPR tariff language revisions
July 1, 2008	Stakeholder Meeting – CAISO Offices in Folsom, CA
July 8, 2008	Stakeholder final tariff language comments due COB
July 9, 2008	GIPR proposal presented to CAISO Governing Board for approval
Mid July, 2008	GIPR Tariff language submitted to FERC for approval

3.0 Summary of Changes in this Revised Proposal

Proposed revisions to the May 21, 2008 proposal are shown in red. Below is a list of significant changes:

- Added Appendix C – GIPR - TPP Coordination

4.0 Proposal for Clearing the Existing Queue Backlog

a) The CAISO issued a Market Notice on April 8, 2008 establishing, under its existing Tariff authority, a going forward Queue Cluster Window to accept new Interconnection Requests (IRs) submitted within the opening and closing dates for the defined Queue Cluster Window. The Queue Cluster Window opens June 2, 2008 and will currently extend 180 days pending any modification permitted by FERC pursuant to the Waiver Petition and/or the GIPR itself, as discussed below. This will be considered the "Initial GIPR Cluster."

b) The CAISO filed with FERC on May 15, 2008, a Waiver Petition requesting the following relief:

1. A waiver of the current maximum Queue Cluster Window duration of 180 days for the Initial GIPR Cluster. The need for this waiver arises from the fact that the Serial Study Group, Transition Cluster, and the Initial GIPR Cluster must be studied sequentially and the processing timelines for the Serial Study Group and Transition Cluster exceed 180 days. As such, this waiver serves to facilitate clearing the backlog of existing projects.

2. A waiver of the deadlines to perform Interconnection Studies on new IRs received in the Initial GIPR Cluster. By waiving the deadlines, the CAISO effectively suspends study activities on these IRs in order to focus resources on clearing the backlog of existing projects.

3. A waiver of the deadlines to perform all Interconnection Study activities for all existing IRs and IRs submitted prior to June 2, 2008 that do not satisfy one of the following criteria:

    a. have advanced through the Large Generator Interconnection Procedures (LGIP) to the point that they have an executed Interconnection System Impact Study (SIS) Agreement with a good faith estimate date of completion on or before May 1, 2008.
    b. have a power purchase agreement (PPA) approved or pending approval with the California Public Utilities Commission or other appropriate Local Regulatory Authority (LRA) as of May 1, 2008; or
    c. Seek interconnection to new transmission projects that have obtained approvals for construction by applicable state or federal regulators. These IRs will be taken by Queue Position until capacity of the transmission project as studied by the CAISO is accounted for.

    Projects that satisfy one of the foregoing criteria will be considered in the Serial Study Group, while all other valid IRs received prior to June 2, 2008, will be considered in the Transition Cluster. The Serial Study Group will continue to be studied in accordance with the existing LGIP. All pre-LGIP projects will be required to meet existing LGIP terms and conditions, including execution of a Large Generator Interconnection Agreement (LGIA).

c) As part of the GIPR filing with the FERC, the CAISO will request that all projects in the Transition Group be required to complete the following:

1. Submit or increase the total study deposit for each IR to $250,000 ($100,000 for projects less than 20MW that do not otherwise qualify[1] for the SGIP), i.e., increase will be net of prior deposits. This deposit is non-refundable unless the Interconnection Customer (IC) enters into an Interconnection Agreement (IA). The reasoning behind making this deposit non-refundable is to encourage developers that have a high degree of uncertainty to withdraw and possibly enter into a later queue window that better fits their development schedule, thus making the Transition Cluster smaller and more manageable (subsequent GIPR clusters have greater opportunity for obtaining refunds of unused study deposits as discussed below). A secondary justification for rendering the deposit non-refundable is to equalize the impact of being in the Transition Cluster of all IRs regardless of the costs previously incurred under the superseded process. However, once the IC enters into an IA, this deposit will be refundable net of any study and administrative costs (including prior study work under the existing LGIP) following the completion of the Phase II studies. It is anticipated that the IC will have 60 days once FERC rules on the GIPR proposal to post this deposit. All prior work, complete or incomplete, for which the IC will be required to pay for under the existing LGIP, will be provided to the IC. Use of any forfeited deposits to be applied to restudies and/or pay down the Transmission Access Charge (TAC).

2. Proof of Site Control for each IR in the Transition Group or posting of $250,000 deposit in lieu of Site Control. This deposit shall be subject to the same refund rules set forth in Step 1 of the Initial GIPR Cluster. It is anticipated that the IC will have 60 days once FERC rules on the GIPR proposal to demonstrate Site Control or post the optional deposit.

3. Site Control will be defined as:

> Site Control - Documentation reasonably demonstrating:
> (1) For Private Land
> (a) Ownership of, a leasehold interest in, or a right to develop property upon which the Generating Facility will be located consisting of a minimum of 50% of the acreage reasonably necessary to accommodate the Generating Facility; or
> (b) an option to purchase or acquire a leasehold in property upon which the Generating Facility will be located consisting of a minimum of 50% of the acreage reasonably necessary to accommodate the Generating Facility; or

[1] Projects that are less than 20 MWs that do not otherwise qualify for the existing SGIP process include new projects less than 20 MWs that desire the CAISO to perform a Deliverability Assessment; or, projects requesting an incremental increase in capacity of less than 20 MW to an existing commercially operating generation plant, regardless of total nameplate capacity. To prevent potential gaming, only one IR qualifying for the reduced study deposit amount can be in process at any one time per existing future or existing generating plant site, otherwise full LGIP deposits will apply. This latter limitation results in precluding an IC from seeking incremental capacity changes in two consecutive Queue Cluster Windows under the GIPR

(c) an exclusivity or other business relationship between Interconnection Customer and the entity having the right to sell, lease or grant Interconnection Customer the right to possess or occupy property upon which the Generating Facility will be located consisting of a minimum of 50% of the acreage reasonably necessary to accommodate the Generating Facility.

(2) For Bureau of Land Management (BLM) Land the Interconnection Customer must have received Bureau of Land Management acceptance of the Interconnection Customer's Application for Right of Way (ROW) to the proposed Generating Facility site.

4. Requested deliverability status as described in section '5.1.g' below.

5. Provide all technical data if not already completed as described in section '5.1.h' below.

6. Signed new Generation Interconnection Process Agreement.

Any IC who does not complete items 1 - 6 above in the allowed timeframe to be defined in the Tariff will be withdrawn.

d) The CAISO will process the remaining projects in the Transition Cluster, utilizing the methodologies described in Sections 5.4 through 5.9. However, the timelines for processing the Transition Cluster will be modified according to section 4.0 e.

e) After FERC approves the GIPR filing, the CAISO proposes the following timeline to clear the existing queue Transition Cluster:

Prior to FERC GIPR Approval		Complete, to the extent possible, all Serial Group projects
FERC Approval		
60 days	Step 1	Revise Agreements, IC Posts Additional Deposits, IC Demonstrates Site Control, IC confirms Commercial Operation Date (COD)
30 days	Step 2	'Transition Cluster' Base Case developed and Project Grouping
210 days	Step 3	Phase I Transition Cluster Studies
60 days	Step 4	Results Meetings
60 days	Step 5	Post Proxy Cost LOCs
330 days	Step 6	Phase II Transition Group Cluster Studies Coordinated with the annual CAISO TPP
90 days	Step 7	IA Execution

f) The accelerated process outlined in Section 5.10 also applies to the Transition Cluster.

5.0 Summary of GIPR Proposal

Following are the steps of the GIPR draft proposal. Timeframes are assumed to be Calendar Days unless otherwise noted.

5.1 Step 1 – Queue Cluster Window

Two four month Queue Cluster Windows will be opened each year. During these windows, ICs would submit a completed IR which would include all of the information currently required by the CAISO LGIP process with the following additions and clarifications:

a) Identify proposed project's physical site location(s) by providing detailed maps and the project's proposed service interconnection point (location where Interconnection Customer Interconnection Facilities meet the Generating Facility).

b) Propose a COD for when the entire output of the proposed generating plant can be in service. There will be two subsequent opportunities to adjust this date: 1) Within 5 days of the Scoping Meeting (see section 5.3.b; and 2) Following the Phase I results meeting and prior to posting required Letters of Credit (LOCs) and entering the Phase II Studies (see section 5.6.b). The IC will then be allowed to delay the COD identified prior to starting the Phase II studies for their project for any reason up to a maximum of 3 years and not be deemed a material modification leading to withdrawal and forfeit their LOCs, however, the LOCs may be converted to cash when facility construction starts as described in Section 5.7.d. For purposes of the GIPR, COD requires Commercial Operation of the entire capacity of the Generating Facility as defined in the IA. Thus, a Generating Facility using a technology that allows for phased construction, i.e. wind or solar, can develop the project incrementally within the three year extension period, but any remaining LOC will not be released until COD.

c) Demonstrate proof of Site Control, as defined above, through the project's proposed COD. If an IC opts to extend the COD of its project (up to a maximum allowable 3 years), proof of Site Control must also be extended up to the revised COD or the IC must post the deposit amount described in 5.1.d.

d) The IC may post a $250,000 deposit in lieu of Site Control. This amount would be refundable upon proof of Site Control or if the IC withdraws.

e) The IC, except as set forth in 5.1.f, shall make a $250,000 deposit to cover costs of processing the IR and conducting studies. As graphically represented in Appendix B, $100,000 of the study deposit becomes non-refundable after the Scoping Meeting, plus 30 days. Thus, an IC may withdraw prior to completion of the base cases and receive full recovery of its deposited study amount, net of administrative and study cost to date. There is also an incentive to inform the CAISO of intent to withdraw following the Results Meeting to facilitate development of the base case for the following Queue Cluster Window. In particular, if the IC withdraws within 30 days following the Results Meeting, the IC shall receive a refund of the unused balance of

its deposit (net of administrative and study costs) above $100,000, if any. The full amount of the study deposit becomes non-refundable if the IR is withdrawn after the Results Meeting, plus 30 days. However, the full $250,000 is refundable net of administrative and study costs following the Phase II Studies if an IA is executed. If the actual study and administrative costs exceed the original study deposit, the IC will be required to pay the difference.

f) IRs involving projects less than 20 MW that do not otherwise qualify for the SGIP because either: 1) they request the CAISO to perform a Deliverability Assessment; or 2) they involve incremental increase in capacity to an existing commercially operational generation plant with aggregate capacity greater than 20 MW; shall make a deposit of $100,000 to cover costs of processing the IR and conducting studies. If the IC withdraws within 30 days following the Results Meeting, the IC shall receive a refund of the unused balance of its deposit (net of administrative and study costs) above $50,000. The full amount of the study deposit becomes non-refundable if the IR is withdrawn after the Results Meeting, plus 30 days. However, the full $100,000 is refundable net of administrative and study costs following the Phase II Studies if an IA is executed. If the actual study and administrative costs exceed the original study deposit, the IC will be required to pay the difference.

g) The IC shall specify their requested deliverability status, either full capacity or energy only. The Deliverability Assessment will be performed at peak conditions in accordance with the CAISO deliverability analysis developed to implement the state's resource adequacy requirements. Full capacity in this instance refers to the maximum Qualifying Capacity of a particular resource technology type under counting protocols adopted by the CPUC or LRAs. However, for wind resources, the entire range of historic output used in the counting protocols should be considered in the deliverability studies. [2]

h) Each IC shall submit all required technical data with their IR. Lack of technical data has been a cause for delays in the serial study process and likewise will delay completion of individual and group studies under a clustered approach. Accordingly, wind developers will no longer be allowed to submit their detailed electrical design specifications and other technical data requirements six months after submission of the IR as is now permitted under FERC Order No. 661-A.

i) The IC would identify the project's preferred Point of Interconnection (POI) and preferred voltage level. The IC would only identify a single POI in the IR; however,

[2] The Net Qualifying Capacity (NQC) of a generation project can be affected by the deliverability of the unit and the Qualifying Capacity (QC) calculation. The deliverability analysis considers transmission constraints and availability of the aggregate generation in the generation pocket as described in the CAISO's deliverability methodology. If transmission constraints have the potential to restrict the output of production values used in the QC calculation then this result may impact the NQC. The determination of impact on the NQC would be after considering the expected availability of the remaining generation in the pocket. This complex interplay, makes it prohibitive to consider a continuous range of deliverability options.

alternate and more cost effective POIs may be identified by the CAISO and Participating Transmission Owner (PTO) during the Scoping Meeting or during the Phase I studies and these options would be presented to the IC for their immediate consideration.

5.2 Step 2 – Interconnection Request Validation and Execution of Generation Interconnection Process Agreement

a) IRs are processed and validated by the CAISO and the IC is notified of any deficiencies and given an opportunity to correct them. This step will be completed within 30 days after receipt of an IR with time-based milestones for both the CAISO and the ICs. All IRs must be validated within 30 days of the close of the Queue Cluster Window. Validation will include all components of the IR, including technical data. Any IR not validated within the allowable timeframe will be deemed withdrawn and deposit net of any administrative costs will be refunded.

b) Sign a Pro-forma Generation Interconnection Process Agreement

5.3 Step 3 – Scoping Meetings

CAISO conducts a Scoping Meeting with each IC within 30 days after the IR is deemed valid and the IC has executed a Generation Interconnection Process Agreement. During the Scoping Meeting the following will be discussed:

a) Feasibility of POI - IC will have 5 business days following the scoping meeting to notify the CAISO of their decision on the POI.

b) Possible study scenarios

5.4 Step 4 – Project Grouping / Base Case Development

CAISO/PTO develop base cases for studies following the final cluster Scoping Meeting. Study scopes and deliverables are discussed in Section 5.5 (Step 5) and Section 5.8 (Step 8), and more detailed information on the study timeline is included in Section 6.

a) The CAISO/PTO will group projects based on their interconnection points and shared transmission needs using good engineering judgment. Final grouping for Delivery Network cost allocation purposes will be determined during the studies using generation distributions factors[3].

[3] The CAISO would employ its deliverability study methodology to determine generation groups and cost responsibility for Delivery Network Upgrades and for Reliability Network Upgrade costs to mitigate thermal overloads. The "5% DFAX circle" described in the methodology would determine the groupings. http://www.caiso.com/docs/2005/05/03/200505031708566410.pdf.

b) Different base cases will be developed in order to focus on a stressed dispatch level for each group, and at the same time balance loads and resources.

The CAISO will make available to ICs and Market Participants relevant base cases, in accordance with the disclosure requirements set forth in the CAISO's Transmission Planning Process. Accordingly, the procedures applicable to access the relevant base cases will depend on factors such as whether the requestor is a Market Participant, WECC member, and can satisfy requirements for Critical Energy Infrastructure Information (CEII) access.[4]

The following information will be made available on the CAISO's secured web-page:

1. Base cases at the beginning of the Phase I and II studies with the queued generation modeled.
2. Base cases at the end of the Phase I and II studies with the queued generation modeled and the necessary transmission upgrades
3. Contingency input files used in the Phase I and II studies
4. RAS information used in the Phase I and II studies that is not already in the contingency files
5. Transmission diagram(s) of the CAISO system

5.5 Step 5 – Initial Cluster Study Process (Phase I) Studies

CAISO/PTO conducts Interconnection Studies within approximately 150 days consisting of the following analyses and deliverables:

a) A Deliverability Assessment evaluating summer peak conditions and a short circuit study. The Deliverability Assessment will identify thermal overloads at summer peak conditions to be mitigated.

The CAISO/PTO will identify Delivery Network Upgrades in performing the Deliverability Assessment needed to ensure the deliverability status requested. [5] The Deliverability Assessment study process will continue to involve a coordinated effort between the CAISO and PTOs to build the cluster base cases, with the CAISO directing the process.

The CAISO/PTO will identify Reliability Network Upgrades in performing short circuit and stability studies.

[4] See Proposed Business Practice Manual for the Transmission Planning Process, Attachment C to CAISO Order No. 890 Compliance Filing in FERC Docket No. OA08-62-000 (Dec. 21, 2007) http://www.caiso.com/1bda/1bdab40d5960.html.

[5] On a case by case basis, the CAISO may also provide a MW estimate for the amount of generation in the pocket which would be deliverable without triggering a particularly high cost transmission constraint.

Stability studies will only be conducted if the CAISO/PTO have a reason to expect transient or voltage stability problems.

The analysis will also include an off-peak case to evaluate the conditions when congestion may be most severe.

b) PTO's will develop the cost responsibility for the Reliability and Delivery Network Upgrades and Interconnection Facilities for each IC. The Delivery Network Upgrade cost allocation for Capacity units would be based on the flow impact of the generation on the identified constraints and upgrades in a manner consistent with the CAISO's existing generation deliverability methodology. Reliability Network Upgrade cost allocation for both Energy-only and Capacity units would be based on the original grouping in Step 4 and the MW capacity of the units in the group.

1. PTOs would develop and annually update per unit costs of facilities for additions to their systems.
2. PTOs would use these per unit costs to prepare non-binding, good faith cost estimates.
3. PTOs could deviate from these per unit costs if a reasonable explanation for the deviation is provided and there is no undue discrimination.
4. If during the Phase II Studies, the CAISO moves the IC's interconnection point in order to optimize the transmission plan, and this results in a change in the estimated costs of the direct assignment Interconnection Facilities of more than the greater of 30% or $300,000, then the IC would have the option to withdraw and be released from the LOC in accordance with Step 7.

c) Determine actual POI (may change from IC's selection). CAISO may determine that an Interconnection Grid Substation (IGS) is needed. The IGS cost responsibility would be as follows:

1. If connected to at least two separate transmission network substations, IGS will be considered a Network Upgrade
2. If connected to only one substation, the IGS and all radial facilities interconnecting it to the CAISO Controlled Grid would be considered Interconnection Facilities
3. If the IGS is used to connect multiple projects owned by multiple IC's to the CAISO Controlled Grid, then costs may be covered by the CAISO Location Constrained Resource Interconnection Facility (LCRIF) tariff.

d) For the Phase I study, to the extent that a state sponsored process, i.e., RETI, identifies maximum developable installed capacity for specified regions, the CAISO's study assumptions will apply such maximum installed capacity quantities where the quantity of capacity for the specified region in the particular study group exceeds the quantity identified by the state sponsored process. This approach is taken to create more realistic and achievable study outcomes.

5.6 Step 6 – Results Meetings

Within 30 days following completion of the Phase I Studies, the following would be completed:

a) CAISO meets with each IC to discuss the Phase I Study Report and the ICs total cost responsibilities for Network Upgrades at their requested deliverability status and an estimate of Interconnection Facilities costs. These costs would be binding as essential information for ICs to determine interest to proceed to the Phase II or withdraw.

b) IC works with the CAISO and PTO to select a reasonable COD. The IC shall provide a schedule outlining key milestones including environmental survey start date, expected Environmental Impact Report (EIR) submittal date, expected procurement date of project equipment, back-feed date for project construction, and expected project construction date. This will assist the parties in determining if CODs are realistic as any required Interconnection Customer Interconnection Facilities must be included in project EIR and will allow the CAISO to track progress moving forward. If major Interconnection Customer Interconnection Facilities are needed, such as telecomm to support possible Special Protection Scheme (SPS), distribution feeders to support back feed, new substation, and/or expanded substation work, permitting and material procurement lead times may result in not meeting proposed COD. If the CAISO, PTO, or IC determines that the requested COD is not feasible, parties may agree to a new COD. Where the parties cannot agree, the COD determined reasonable by the CAISO/PTO will be controlling where such COD is driven by the anticipated completion of necessary Reliability Network Upgrades and/or Interconnection Facilities. For all other disagreements, the IC may initiate Alternative Dispute Resolution (ADR) procedures under Section 13 of the CAISO Tariff, but the COD determined by the CAISO/PTO will be controlling pending the outcome such proceedings. The IC must notify the CAISO within 5 business days following the Scoping Meeting if the new COD is acceptable or initiate ADR.

c) Depending on the MW increments of deliverability created by upgrades identified in the Studies, the IC may have the option of reducing their project size or changing their deliverability status in order to reduce or eliminate the cost of Delivery Network Upgrades for which they would be responsible. This decision must be made prior to beginning the Phase II study. The required LOC for Delivery Network Upgrades will be adjusted accordingly.

d) Prior to beginning the Phase II study, IC will be allowed to change technical information, change project configuration, and reduce their MW size. The required LOC for upgrades will not be adjusted.

5.7 Step 7 – Posting of Financial Commitment of Transmission Upgrades

a) LOC Posting Requirements

1. Within 60 days of the Results Meeting, the IC must post LOCs for:
   - 20% of the total cost responsibility of Reliability and Delivery Network Upgrades or $500,000, whichever is greater; and
   - 20% of the estimated cost of Interconnection Facilities.

2. The criteria for the LOCs shall include:

   a. An acceptable LOC from an entity that is rated A or better by S&P or A2 or better by Moodys;

   b. The lending institution must be a US bank, or if a foreign bank, must be its US branch; and

   c. If the generator elects to use a third-party guarantor, the third party must be investment grade as set forth above.

3. The IC must post the remaining 80% of the IC's Reliability and Delivery Network Upgrades cost responsibility identified in the Phase I studies within 6 months following the completion of the Phase II Studies or start of PTO Interconnection Facilities construction (whichever is earlier). The date of start of construction of PTO Interconnection Facilities will be included in the IA. If the total Reliability and Delivery Network cost responsibility is less than $500,000, the original $500,000 LOC must remain posted. The IC must also increase the amount of the LOC posted for PTO Interconnection Facilities to 100% of the ICs cost responsibility identified in the Phase II Studies.

   This will allow time for ICs to procure the remainder of its LOC, as well as negotiate contracts and apply for needed permits.

b) Release of the LOCs

1. Reliability and Delivery Network Upgrade LOCs are partially refundable upon withdrawal per the schedule established in Section 5.7.c if the ICs withdrawal is triggered by any of the following three reasons:

   a. The IC after a good faith effort fails to secure a power purchase agreement (PPA). At the time of withdrawal, the IC must provide the CAISO with evidence of unsuccessful participation in a competitive solicitation or negotiation.

b. The IC is denied one or more necessary permits (e.g., air, water, real property, environmental, etc.) required to construct and operate its proposed generating facility.

c. The estimated cost of PTO Interconnection Facilities identified in the Phase II studies increased by 30% or $300,000, whichever is greater, over the amount identified in the Phase I studies.

2. The LOC posted for PTO Interconnection Facilities will be 100% refundable at any time less actual costs incurred by the PTO for the Interconnection Facilities.

c) The off-ramp schedule will be as follows:

1. From execution of the IA to six months following the completion of the projects Phase II Studies: Half of the initial 20% (minimum of $500,000) LOC posted for Reliability and Delivery Network Upgrades (equating to 10% (minimum $250,000)) of the IC's Delivery and Reliability Network Upgrade cost responsibility shall be released to the IC if the IC withdraws for any of the three reasons outlined above. The remaining 10% (minimum $250,000) would be applied to offset the Grid-wide portion of the Transmission Access Charge or any necessary restudies.

2. From 6 months to 12 months following the completion of the Phase II Studies: 50% (minimum $250,000) of the LOC posted for Reliability and Delivery Network Upgrades would be released to the IC if the IC withdraws for any of the three reasons. The remaining 50% (minimum $250,000) would be applied to offset the Grid-wide portion of the Transmission Access Charge or any necessary restudies.

3. From 12 months to 18 months following the completion of the Phase II studies: 20% (minimum $100,000) of the LOC posted for Reliability and Delivery Network Upgrades shall be released to the IC if the IC withdraws for any of the three reasons. The remaining 80% (minimum $400,000) of the LOC would be applied to offset the Grid-wide portion of the Transmission Access Charge or any necessary restudies.

4. Once construction of needed facilities commences (including engineering design, permitting and equipment procurement), regardless of the number of months following the completion of the Phase II Studies: 100% of the LOC (minimum $500,000) posted for Reliability and Delivery Network Upgrades shall be forfeited if IC withdraws for any reason. The LOC amount would be applied to offset the Grid-wide portion of the Transmission Access Charge or any necessary restudies.

The IC would provide written notification of its withdrawal to the CAISO at least 30 days in advance of the key milestones above. The IC would include in its notification

to CAISO sufficient documentation to determine the IC's good faith efforts to secure permitting and/or approval of the PPA, if the IC is withdrawing its IR for permitting or other regulatory reasons. Withdrawal for any other reason would lead to IC forfeiting its maximum LOC posted for Reliability and Delivery Network Upgrades exposure (i.e. 20% (minimum $500,000) up to six months following the completion of the Phase II Studies, 100% (minimum $500,000) thereafter).

d) Financing of Network Upgrades.

1. The IC will be required to replace all or a portion of the LOC with cash (unless the PTO at its option agrees to upfront fund) when construction starts on the Network Upgrades assigned to a project. The IC will only be responsible to fund Network Upgrades up to the limit of its LOC. If an IC opts to extend the COD of it's project (up to a maximum allowable 3 years), the IC would still be required to replace all or a portion of the LOC with cash when construction activities starts (including engineering design, permitting and equipment procurement) on the Network Upgrades assigned to it's project if those upgrades can not be delayed and are required for other projects to meet their specified CODs.

2. That portion of the IC's LOC or other funds unused at COD would be refunded at that time. Funds used to construct Network Upgrades would be refunded to the IC over a period not to exceed 5 years from COD. COD is defined as date when entire project capacity is on line.

3. Amounts posted for PTO Interconnection Facilities will be used to the extent necessary in building the PTO Interconnection Facilities. True-up will be performed after the PTO Interconnection Facilities are completed. The forfeiture provisions discussed above do not apply to any LOC posted for PTO Interconnection Facilities.

4. An IC may be required to post additional financial commitments for PTO Interconnection Facilities or may receive a refund depending upon actual PTO Interconnection Facilities costs. The IC remains responsible for the full cost of Interconnection Facilities.

5. If an IC withdraws project at anytime between IA execution and COD, the IC is responsible for any costs incurred by the PTO to construct PTO Interconnection Facilities, any excess will be refunded to the IC.

5.8 Step 8 – Project Refinement and Facilities Study Process (Phase II) Study

CAISO conducts the Phase II Cluster Studies in coordination with the annual CAISO Transmission Planning Process (TPP). (Please note that the following items are not necessarily in sequence.)

a) Update technical analyses for projects in the two previous semi-annual clusters to account for projects that have withdrawn.

b) Develop final plan of service for projects in the two previous semi-annual cluster studies.

c) Perform Interconnection Facilities Studies for Interconnection Facilities and Network Upgrades

d) Determine plans of service segments to optimize in-service timing requirements based on operational studies.

e) Coordinate refinement studies, to the extent practicable, with studies conducted in the TPP.

1. Conceptual transmission plans developed in the TPP for previously identified generation development areas will be considered in designing phased-in transmission plans to accommodate actual IRs.
2. In the absence of a previously established conceptual transmission plan, within the timelines specified below, the Phase II study will:
    a. Consider future generation development potential in transmission upgrade designs.
    b. Consider alternatives that ensure deliverability of generation, meet load serving capability, and economic benefit objectives.
    c. Consider phased development and option value of transmission projects to address uncertainty
3. Generation projects entering the Phase II study will also be considered in TPP study alternatives and assumptions.
4. Transmission projects proposed through Phase II Studies that require a certificate of public convenience and necessity (CPCN) or CAISO Board approval may need to go through the TPP stakeholder process if they have not already gone through a stakeholder process.

f) After final plan of service is determined, IAs will be executed to reflect actual Interconnection Facilities and any additional technical requirements for generators to actually go on-line.

g) Changes to the final plan of service may be allowed during the TPP if a superior alternative is identified and the COD specified after Phase I is not expected to be delayed.

h) Adjust LOC for Interconnection Facilities if necessary

i) Network Upgrades needed to ensure deliverability may be financed, in whole or in part, by the posted LOCs up to their full amount. Using the CAISO deliverability study methodology, the CAISO will determine the need for a particular transmission upgrade to ensure a particular generation project's deliverability when the PTO

notifies the CAISO their definite intent to utilize LOC financing for the particular transmission upgrade. If multiple projects being studied within Phase II rely on the transmission project to ensure their deliverability, then cost allocation will be based on flow distribution factors (DFAX) on the transmission project and generation project size.

5.9 Step 9 – Executing an Interconnection Agreement

The IC will execute an LGIA within 90 days following completion of Phase II Studies or be deemed withdrawn.

5.10 Accelerated Project Refinement and Facilities Study Process

Projects that meet the following criteria will be considered for an accelerated process:

- Submitted an IR during a Queue Cluster Window or are part of the Transition Cluster; and
- Not grouped with any other projects during the Phase I studies or identified as interconnecting to a point of available transmission during Phase I studies; and
- Able to demonstrate that the proposed GIPR timelines are not sufficient to accommodate their requested COD.

a) The Accelerated Process Study shall specify and estimate the cost of the equipment, engineering, procurement and construction work and schedule needed on the ISO Controlled Grid and the PTO's Interconnection Facilities needed to electrically connect the Interconnection Customer's Interconnection Facilities to the ISO Controlled Grid.
b) Once the IC posts the required LOCs following the Phase I Studies, the ISO would start work and would provide a draft Accelerated Process Study to the IC within 120 days with a +/- 20% cost estimate.
c) The IC would pay for the cost of this accelerated study, just as they would be required to fund the Phase II study.

In addition to the above Accelerated Project Refinement and Facilities Study, the CAISO may apply for a waiver to accelerate any project, at any phase, to meet an executive or legislative order or to meet a Public Utilities Commission (PUC)/California Energy Commission (CEC) mandated requirement where the existing GIPR timelines are determined inadequate.

6.0 Proposal Timelines

6.1 Overall Process Timeline

120 days	Step 1	Queue Window Open
1-30 (30 days)	Step 2	IR Validation
31-60 (30 days)	Step 3	Scoping meetings
61-240 (180 days)	Step 4	Project grouping / Base Case Development
	Step 5	Phase I Studies
241-270 (30 days)	Step 6	Results Meetings
271-330 (60 days)	Step 7	LOC Posting
In coordination with the annual CAISO TPP (Approx 330 days)	Step 8	Project Refinement and Facilities Study Process (Phase II Study)
Within 90 Days following the Phase II Studies	Step 9	LGIA Execution

6.2 Initial Cluster (Phase I) Study Timeline

Line	Initial (Phase I) Cluster Study	Typical Calendar Days	Timeline (Days)
1	ISO and PTOs develop initial generation groups for initial dispatch assumptions and cost allocation purposes (except for thermal overload mitigation)	7	1-7
2	PTOs develop draft base cases, each representing all generation in the queue cluster and deliver to ISO	21	1-21
3	PTO develops preferred and alternative if applicable, direct interconnection plans, including the need for an Interconnection Grid Substation (IGS).	25	22-46

4	PTO develops draft contingency lists	25	22-46
5	ISO reviews and approves Base Cases, Direct Interconnection Plans and merges them together, as needed. ISO updates summer peak base cases to reflect withdrawn projects from previous queue cluster study. PTOs update off-peak base cases. ISO reviews and approves contingency lists. PTO needs time to consider ISO proposed changes.	21	47-67
6	ISO provides Deliverability Study results identifying constrained facilities, using summer peak base cases & prepares results summary and may propose mitigation plans for PTO review.	21	68-88
7	At the ISO's direction, the PTO performs the off-peak Load Flow, and summer peak and off peak Post Transient and Stability analyses & identifies mitigation solutions, as appropriate, and submits draft study results to ISO for review and direction.	21	68-88
8	PTO develops mitigation plans for summer peak and off-peak or supplements ISO proposed mitigation plans for consideration, as appropriate, and submits to ISO for review and direction.	21	89-109
9	ISO retests Deliverability study results with proposed delivery upgrades and withdrawn projects from previous cluster study removed. PTO reviews and comments on retest results	14	110-123
10	ISO develops shift factors for cost allocation purposes of all upgrades associated with mitigating thermal overloads	7	124-130
Short Circuit Duty (concurrent with the LF/PT/S)			
11	ISO to coordinate with other potentially affected facility owners[6]	n/a	n/a
12	ISO directs PTO to develop Base Case and run short circuit analysis	21	46-66
13	PTO to perform facilities review (Note: possibly for feedback into the powerflow and PTO mitigation plans)	28	67-94
14	PTO to prepare draft study results and submits to the ISO for review and direction	28	95-123
Facility cost estimates and schedules			
15	At the ISO direction, PTO(s) to prepare cost estimates and schedules for the direct assignment facilities and network upgrades identified in the ISIS power flow, short circuit duty, post transient, and stability studies.	20	124-143

[6] In accordance with the WECC Short Circuit Duty Procedure

Final Report			
16	At the ISO's direction, PTO(s) prepares draft report for impacts in their service territory.	7	144-150
17	ISO compiles all results into a draft report that covers grid impacts, as appropriate. ISO reviews integrated draft report and submits comments, recommendations and direction to the PTO	9	151-159
18	PTO incorporates ISO directions, conclusions and recommendations. If ISO conclusions and recommendations conflict with PTO conclusions then ISO and PTO must coordinate to resolve conflicts. Any remaining conflicts must be noted in the final report.	14	160-173
19	PTO submits final draft report to the ISO. The ISO will finalize the report and tender the ISO approved report to the IC's.		
Final Study Report			
20	ISO provides final approved report to ICs, PTO, and any applicable affected systems.	7	174-180

6.3 Standard Project Refinement and Facilities Study Process (Phase II) Study Timeline

Line	Standard Project Refinement and Facilities Study	Typical Calendar Days	Timeline (Days)
21	PTOs update base cases from Phase I study line 5 to remove projects that have withdrawn.	30	1-30
22	ISO reviews and approves base cases.		
23	ISO and PTOs update studies performed in Phase I lines 6-14 using base cases from line 22. Additional alternatives may be considered that address future generation development potential, meet load serving capability, and economic benefit objectives, and phased development and option value of transmission projects to address uncertainty	120	31-150
23.1	Projects from Line 23 requiring a CPCN or CAISO Board approval may need to go through the TPP stakeholder process. After completing the stakeholder review process, these projects would proceed through the activities described in lines 24 through 32. Projects not requiring a CPCN or CAISO Board approval, or have already gone through a stakeholder process, would proceed immediately to the activities described in lines 24 through 32. (see Appendix C)	See Appendix C	

24	PTOs develop draft off-peak and summer peak operating year base cases as appropriate where each case includes all generation in Phase II study having the same operating date and deliver to ISO	30	151-180*
25	ISO reviews and approves cases from line 24.		
26	At the ISO's direction, the PTOs perform operational studies using cases from line 25 to determine Network Upgrade requirements for each study year and identify any special operational requirements to connect projects in the year of study.	45	181-225*
27	At the ISO's direction, the PTOs perform additional operational studies to identify the optimal approach for building out the overall plan of service on a segmented (i.e. building block) basis acknowledging that portions of the overall plan of service may be staged in segments over time.	30	226-255*
Final Plan of Service Report			
28	At the ISO's direction, PTO(s) prepares draft plan of service report.	7	256-262*
29	ISO reviews draft plan of service report and submits comments, recommendations and direction to the PTO	9	263-271*
30	PTO incorporates ISO directions, conclusions and recommendations. If ISO conclusions and recommendations conflict with PTO conclusions then ISO and PTO must coordinate to resolve conflicts. Any remaining conflicts must be noted in the final report.	14	272-285*
31	PTO submits final draft report to the ISO. The ISO will finalize the report.		
Facility Costs and Schedules			
32	At the ISO direction, PTO(s) to prepare detailed cost estimates and schedules for the direct assignment facilities and network upgrades identified in the overall plan of service and including individual segments.	75	256-330*

* For projects going through the TPP process as described in Line 23.1 and Appendix C, the Activities in line 24 through 32 may be delayed until the Network Facility plan is approved through the TPP process. However, the subsequent cluster study would proceed on schedule based on the plan of service from Line 23.

Appendix A – Background Information

Introduction (from draft proposal dated February 12, 2008)

The foundation for the current generation interconnection process was established by FERC in Order No. 2003 and its progeny. The Large Generator Interconnection Procedures (LGIP) tariff has successfully assured the open transmission access requirement for new generation ICs. However, over the past few years, several factors, largely unanticipated at the time of Order No. 2003's adoption, including the very large number of Interconnection Requests (IR) for renewable generation, have imposed significant challenges to the efficiency of the present "serial" generation interconnection study approach. On February 12, 2008, the CAISO Queue consisted of 188 active IRs totaling 62,608 MW (42,526 MW renewable) for a system with a historic peak of 50,270 MW. (As of July 27, 2008, there were 361 active IRs totaling 105,342 MW (68,556 MW renewable) The large number of requests and high level of MW capacity in the CAISO Controlled Grid Generation Interconnection Queue (CAISO Queue) have overwhelmed available resources, led to delays and frustration with the study process, and exposed, or reinforced, fundamental deficiencies in the current LGIP.

FERC has also acknowledged the existence of challenges to the LGIP and held a technical conference on December 11, 2007 in Docket No. AD08-02-000. The CAISO participated at the technical conference and submitted prepared comments, which may be found at http://www.caiso.com/1cb3/1cb3cf4dc520.pdf. In these comments, the CAISO identified low barriers to entering the CAISO Queue and inadequate progress milestones as material, underlying causes to the high level of commercially questionable projects that populate the current queue. It further noted that when a queue is subject to such a large number of projects that may lack commercial viability and will not ultimately come on-line, the process is infused with significant delays and uncertainty. In response to the concerns raised by the CAISO and others at the technical conference, FERC encouraged the CAISO to engage in an expedited stakeholder process to evaluate possible LGIP reforms for a potential spring filing with FERC.

In accordance with the Notice Inviting Comments issued by the Commission on December 17, 2007, the CAISO filed Post-Technical Conference Comments on January 10, 2008. In its comments, which may be found at http://www.caiso.com/1f4a/1f4acaa38410.pdf, the CAISO recommended possible actions the Commission could take to assist in the interconnection streamlining reform process and informed the Commission of the CAISO GIPR stakeholder process. The schedule for this stakeholder process is described in the following section.

General Description of Reform Goals (from draft proposal dated February 12, 2008)

The CAISO collaborated with the California Public Utilities Commission (CPUC), Participating Transmission Owners (PTOs), and members of the generation community in preparation for the FERC technical conference, and via the GIPR Initiative, will continue this collaborative effort by soliciting input through a series of stakeholder meetings and conference calls to develop a final proposal for presentation to the CAISO Board of Governors and filing with FERC. Through the initial discussions, several common, but not exhaustive, objectives for the stakeholder process

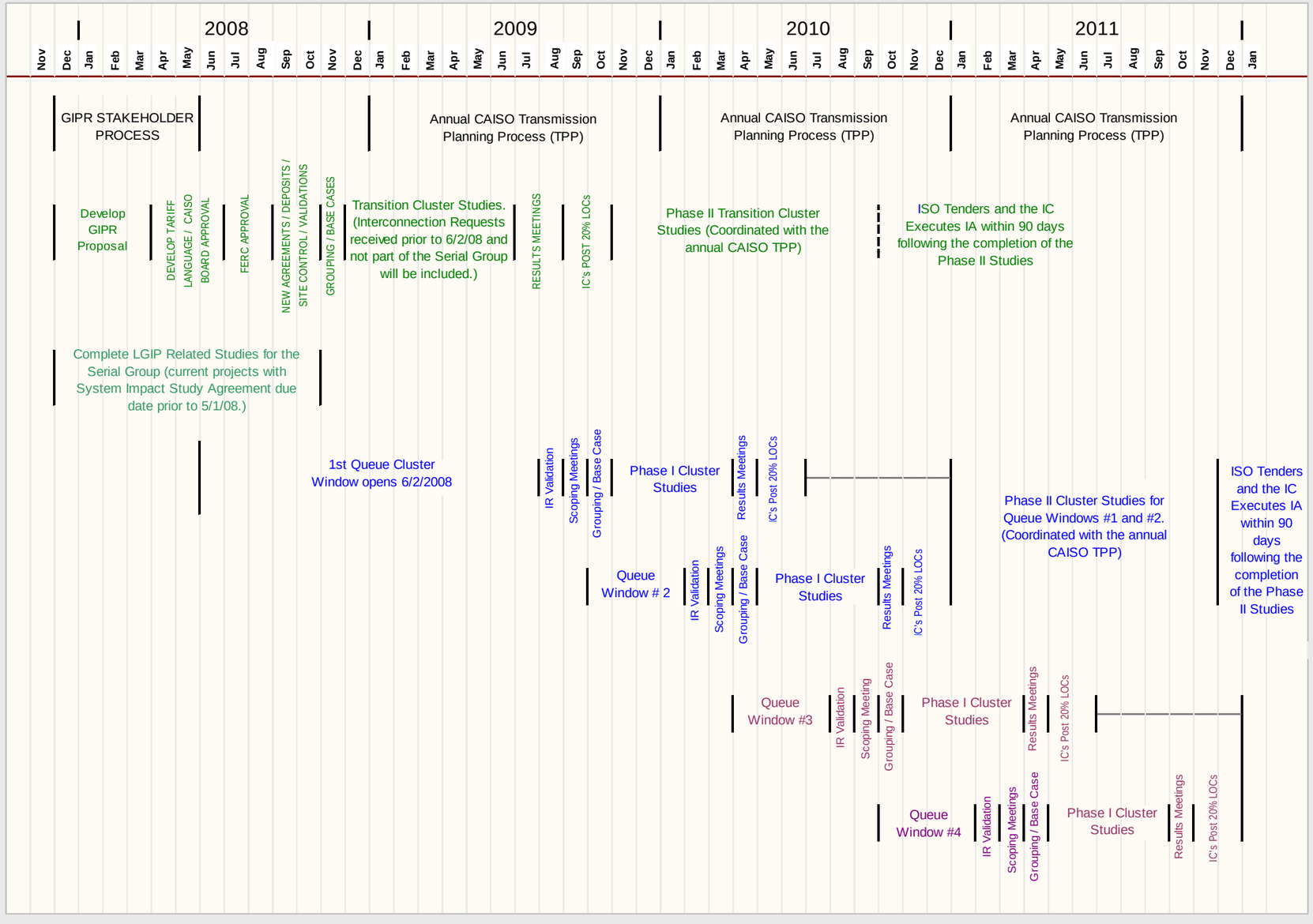
were identified and subsequently confirmed through comments received following the first stakeholder meeting. These include:

- Clear the backlog of all IRs existing in the CAISO Queue by reducing the number of projects through increased IC financial commitments or project viability tests, or a combination thereof, and by applying group study principles to the remaining projects.
- Develop procedures and requirements that lead to more accurate study outcomes that ensure a more efficient interconnection of resources which closely match system needs
- Provide ICs with reasonable cost and timing certainty
- Reduce or eliminate the need for restudies
- Create greater certainty in the timing of study outcomes
- Better integrate transmission planning with the generation interconnection process
- Allow for the integration of state efforts to identify transmission needs for Energy Resource Areas (ERAs)
- Ensure that only viable projects enter the Phase II Studies in coordination with the annual CAISO TPP

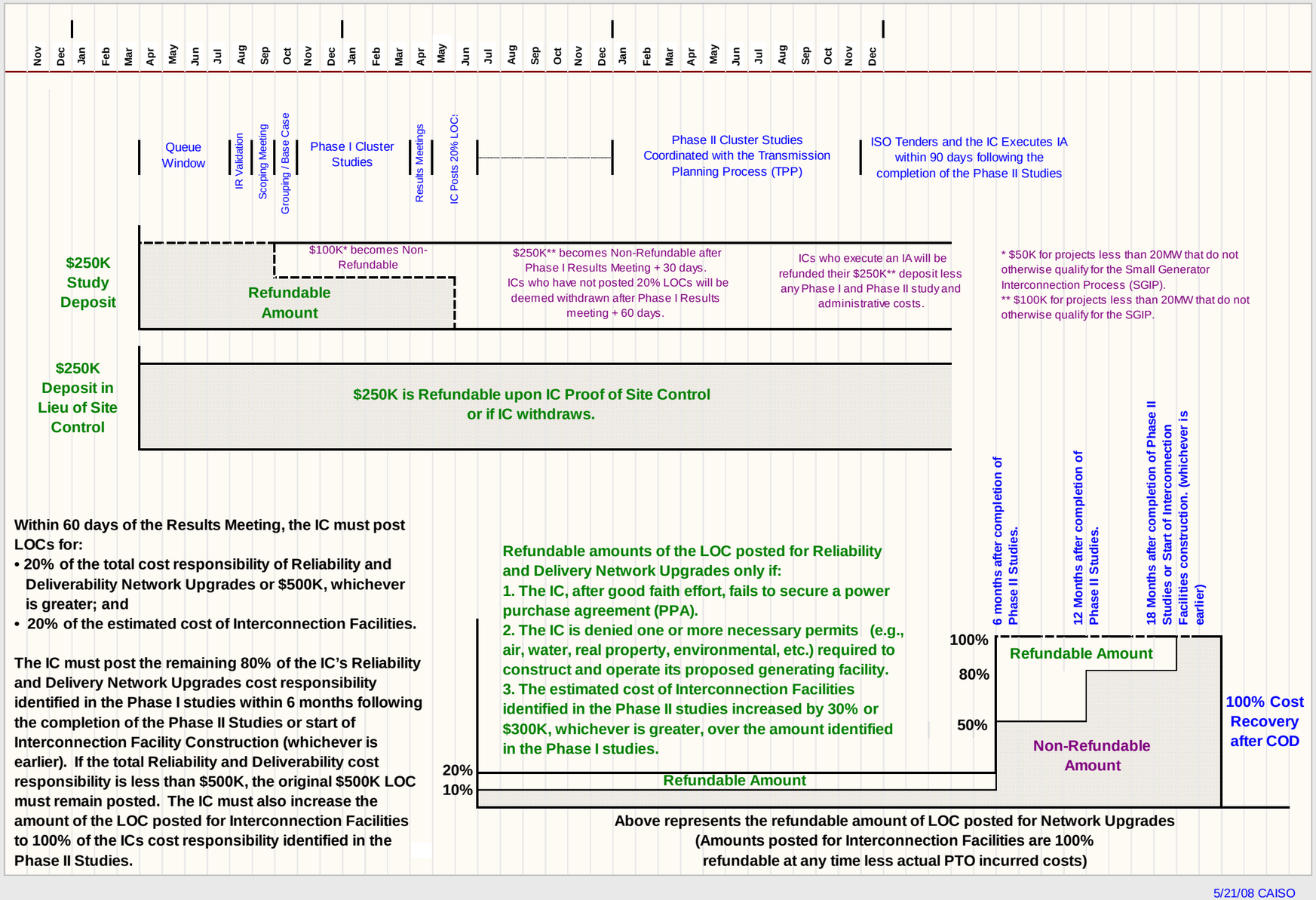
Throughout the stakeholder process, the CAISO encourages parties to measure any proposal against these and other objectives that may be identified.

Appendix B – Process Timelines

Generation Interconnection Process Reform (GIPR) Proposal Timelines
Transition Cluster and Future Cluster Windows



Generation Interconnection Process Reform (GIPR) Proposal
Deposits and Cost Allocations



5/21/08 CAISO

Appendix C – GIPR-TPP Coordination