HIGHLINE ELECTRIC ASSOCIATION
Generator Interconnection Procedure

The Generation Interconnection Procedure (GIP) is applicable to all generators larger than 25 kW interconnecting to the HEA transmission or distribution system and is subject in all respects to the HEA Generation Interconnection Service Rate Schedule that is in effect at the time a Generation Interconnection Agreement (GIA) is signed or service reserved, scheduled or provided as the case may be. Detailed procedures and forms of agreement for an interconnection request, studies, and an interconnection agreement are set forth in policy.

Procedures for Requesting and Arranging Interconnection Services

Customers desiring interconnection service should contact the following at HEA and request such services or information.

Contact Person:

Manager of Engineering
Highline Electric Association
1300 S. Interocean Ave.
P.O. Box 57
Holyoke, CO 80734
Office: (970) 854-2236
Fax: (970) 854-3652

Basics of Interconnection Service

1. Interconnection Application
2. Feasibility Study
3. System Impact Study
4. Facilities Study
5. Generation Interconnection Agreement (GIA)

Interconnection Request

To initiate an interconnection request, the interconnection customer must submit all of the following: (i) $4,000 deposit for generating facilities 100 kW or smaller, a $10,000 deposit for generating facilities larger than 100 kW, (ii) a completed application in the form supplied by HEA and (iii) demonstration of site control or an additional deposit of $10,000. Site control can be demonstrated by submitting to HEA proof of deed or lease to the project site or a letter from land owners stating that the interconnection customer has development rights to the site. Either of the options for demonstration site control should be accompanied by a parcel description detailed enough for HEA to ascertain project location and size. Deposits will be applied toward the cost of required interconnection studies. $1,000 of the $4,000 deposit for generating facilities 100 kW and smaller and $5,000 of the $10,000 deposit for generation facilities larger than 100 kW shall be non-refundable. Upon receipt of Interconnection Application and deposit, HEA will provide written acknowledgement of the interconnection request, identify any

deficiencies, and arrange to hold a scoping meeting with the customer in a reasonable time frame.

Queue Position

HEA will maintain a listing of all generator interconnection requests at its corporate offices in Holyoke, Colorado. The listing will include all of the pertinent data concerning the interconnection request, including the status of each interconnection request. HEA will identify HEA generation interconnection projects, but will not disclose the identity of any third party interconnection requests. HEA will not post notices of all meetings held to discuss matters pertaining to its own generation interconnection projects, nor will HEA provide a transcript of those meetings to third parties. HEA will assign a queue position based upon the date and time of receipt of the valid interconnection request. The queue position will be used to determine the order of performing the interconnection studies and determination of cost responsibility for the transmission facilities necessary to accommodate the interconnection request.

Withdrawal of an Interconnection Request

The interconnection customer may withdraw its request at any time. If the interconnection customer fails to adhere to the HEA generation interconnection procedure requirements, such as submittal of necessary information to conduct the studies, HEA will deem the interconnection request to have been withdrawn. Any deposit associated with the interconnection request as described above in excess of the cost to perform the interconnection studies up to the date of withdrawal and in excess of the non-refundable portion, will be refunded. The interconnection request will be removed from the queue.

Request Completeness/Bona Fide Request:

Any request for interconnection services shall contain the information specified below, to be reviewed by HEA in order to determine if it is a bona fide request:

(a) Identity of requesting entity.

(b) Interconnection Service Types:

i. Transmission System Interconnection Service
ii. Distribution Interconnection Service
iii. Transmission Network Resource Interconnection Service
iv. Distribution Network Resource Interconnection Service

(c) If Transmission or Distribution System Interconnection Service, point of delivery and point of receipt shall be furnished.

(d) Requested transmission service beginning date and termination date, if applicable.

Upon HEA's determination that a request submitted is complete and is a bona fide request for interconnection service, such request shall be logged with respect to the date, requester, and nature of the request.

Response to Complete/Bona Fide Requests: Feasibility Study

Following receipt of an interconnection request that meets the criteria specified above, such request shall be judged by HEA to be a bona fide request for interconnection service. HEA shall notify interconnection requester as soon as practicable after submission of its request and deposit and HEA's determination that the request is complete and a bona fide request, to inform the interconnection service requester if the requested service can be provided without performance of a Interconnection Feasibility Study or if such a study is necessary to evaluate the impact of the requester's project upon HEA's transmission or distribution system. Upon determination by HEA that a Feasibility Study is required, the interconnection customer will be required to execute an Interconnection Feasibility Study Agreement. HEA shall perform the analysis to identify the availability of transmission or distribution capacity to support HEA's ability to provide the requested interconnection service. The Feasibility Study will identify potential adverse system impacts and contain the following: (1) analysis of fault interruption equipment limit exceedance, (2) thermal overload and voltage limit violations under both system intact and contingency conditions, (3) review of grounding requirements and, (4) preliminary cost estimate to interconnect and correct adverse impacts. HEA may at its option elect to forgo a Feasibility Study for a single specific interconnection request. A final written report will be provided to the interconnection customer. HEA will make its best efforts to complete the Feasibility Study in a reasonable time frame.

Response to Complete/Bona Fide Requests: System Impact Study

After receiving a bona fide request for interconnection service, and based on the results of the Feasibility Study, if any, HEA shall determine on a non-discriminatory basis whether or not a System Impact Study is required to respond to such request. If HEA determines that there is inadequate capacity in its transmission or distribution system to accommodate the requested service, HEA shall inform the requester of the need for a System Impact Study. If the requester does not desire to withdraw the interconnection request, HEA will provide a non-binding, good faith estimate of the cost and time frame to complete the System Impact Study.

HEA will provide the interconnection customer an Interconnection System Impact Study Agreement. The interconnection customer must execute the agreement, and provide the following: (i) $10,000 study deposit for generating facilities 100 kW or smaller, a $25,000 deposit for generating facilities larger than 100 kW and (ii) demonstration of site control as defined in the HEA interconnection procedure. Such deposits will be applied toward the cost of the required interconnection study. The interconnection customer will be responsible for the actual cost to perform the study. The Interconnection Customer must pay any study costs that exceed the deposit without interest within 30 calendar days on receipt of the invoice or resolution of any dispute. If the deposit exceeds the invoiced fees, HEA shall refund such excess within 30 calendar days of the invoice without interest.

The System Impact Study will evaluate the impact of the proposed generator interconnection on the reliability of the transmission or distribution system. A transmission System Impact Study shall consist of a short circuit analysis, a stability analysis, a power flow analysis, voltage drop and flicker studies, protection and set point coordination studies, and grounding reviews as

necessary. A System Impact Study shall state the assumptions upon which it is based, state the results of the analyses, and provide the requirement or potential impediments to providing the requested interconnection service, including a preliminary indication of the cost and length of time that would be necessary to correct any problems identified in those analyses and implement the interconnection. A System Impact Study shall provide a list of facilities that are required as a result of the Interconnection Request and non-binding good faith estimates of cost responsibility and time to construct.

A distribution System Impact Study shall include a distribution load flow study, an analysis of equipment interrupting ratings, protection coordination study, voltage drop and flicker studies, protection and set point coordination studies, grounding reviews and the impact on electric system operation, as necessary.

A final written report will be provided to the interconnection customer. HEA will make its best efforts to complete the System Impact Study in a reasonable time frame.

Interconnection Facilities Study

Upon completion of the System Impact Study, if the interconnection requester desires to continue with the Interconnection Request, HEA will provide to the interconnection customer an Interconnection Facilities Study Agreement in the form provided by HEA. The interconnection customer must execute the agreement, provide all the required technical data, and submit a deposit of $10,000 for generation facility projects 100 kW or smaller and $50,000 for generation facility projects larger than 100 kW. Such deposits will be applied toward the cost of the required interconnection study. The interconnection customer will be responsible for the actual cost to perform the study. The interconnection customer must pay any study costs that exceed the deposit without interest within 30 calendar days on receipt of the invoice or resolution of any dispute. If the deposit exceeds the invoiced fees, HEA shall refund such excess within 30 calendar days of the invoice without interest. HEA will provide the interconnection customer a non-binding, good faith estimate of the cost and time frame to complete the Facilities Study.

The Facilities Study shall specify and estimate the cost of the equipment, engineering, procurement and construction work (including overheads) needed to implement the conclusions of system impact studies. The Facilities Study shall also identify (1) the electrical system configuration of equipment, including without limitation, transformer, switchgear, meters, and other equipment, (2) the nature and estimated cost of HEA's interconnection facilities and upgrades necessary to accomplish the interconnection and (3) an estimate of the time required to complete the construction and installation of such facilities.

Confirmed Interconnection Service

If HEA (i) receives a bona fide request for interconnection service, (ii) determines through analysis of interconnection studies it has sufficient transmission or distribution capacity available to allow it to provide said requested service and (iii) commits the requested transmission or distribution capacity to the requestor, then HEA shall confirm the interconnection service reservation in writing. Interconnection requestor shall accept in writing an approved

interconnection request within 30 days. If the requestor does not accept the approved interconnection request within the required time limit, the interconnection approval may be retracted by HEA.

Upon acceptance of the approved interconnection request, the requester shall then receive and pay for the requested service in accordance with the Generation Interconnection Agreement and the Generation Interconnection Service Rate Schedule. HEA will provide to the interconnection customer a written instrument to be executed by both parties setting forth any terms, provisions, and conditions governing a transmission or distribution capacity reservation.

The interconnection customer must execute the Generation Interconnection Agreement and show reasonable evidence that certain milestones as described by HEA, toward the development of the generating facility have been met by the interconnection customer. The Generation Interconnection Agreement will identify the interconnection facilities which include both the HEA-owned interconnection facilities and customer-owned interconnection facilities. Customer-owned interconnection facilities mean all facilities and equipment that are located between the generator and the point of change of ownership between HEA and the interconnection customer. The interconnection customer will be responsible at its expense, to obtain regulatory approvals and permits, design, procure, construct, and operate and maintain all of the customer-owned interconnection facilities, subject to the approval of HEA.

HEA-owned interconnection facilities mean all facilities and equipment from the point of change of ownership to the point of interconnection to HEA's transmission or distribution system. Interconnection facilities are sole-use facilities that must be paid for by the interconnection customer.

The Generation Interconnection Agreement will also identify system upgrades which mean additions, modifications and upgrades to HEA's transmission or distribution system required at or beyond the point of interconnection. The cost of the system upgrades must be paid for by the interconnection customer.

The interconnection customer will be required to submit to HEA a construction deposit in an amount determined by HEA and dependent on the scope of the project before HEA will initiate the planning, design and equipment procurement for the interconnection facilities or system upgrades required by the project. The construction deposit will be used to pay for the initial planning, design and equipment procurement costs for the HEA interconnection facilities and system upgrades. Payment terms by the interconnection customer for the HEA-owned interconnection facilities and system upgrades will be specified in the Generation Interconnection Agreement. HEA will make reasonable efforts to complete the construction of the HEA-owned interconnection facilities and system upgrades in accordance with the schedule identified in the agreement, but HEA will not provide liquidated damage payments.

The Generation Interconnection Agreement will specify or reference required operating procedures and applicable standards to which the interconnecting customer must adhere to ensure the safe and reliable operation of HEA's transmission and distribution system.

Unreserved Use of Transmission or Distribution Capacity

The terms of HEA's current Generation Interconnection Service Rate Schedule shall govern adjustments, if any, which are greater than the maximum capacity specified in the interconnection service agreement. HEA will assess a charge for unreserved use of transmission or distribution capacity at a rate equal to 150% of the maximum allowable rate for the service. The charge will be applied to use in excess of the reservation amount which shall be the difference between the maximum monthly integrated half hour amount of transmission or distribution capacity actually used by the customer less the amount of transmission or distribution capacity the customer has reserved.

Loss Compensation

For service other than HEA network interconnection service, HEA shall calculate an appropriate loss factor to be used to compensate HEA for transmission or distribution line and equipment losses beyond the point of interconnection.

Ancillary Services

For service other than HEA network interconnection service, the interconnection customer shall be responsible for all ancillary services (i.e. scheduling etc.) in regard to the generation facility required by other interconnected entities, regulatory bodies or governing agencies.

Operation during Contingency, Disturbances, Major Maintenance or Emergency

HEA, in its sole judgment may interrupt transmission or distribution service during contingencies, system disturbances, or emergency conditions on HEA's transmission and distribution system. Emergency condition means a condition or situation: (1) that in the judgment of HEA is imminently likely to endanger life or property; or (2) that in the case of HEA, is imminently likely to cause a material adverse effect on the security of, or damage to the transmission or distribution system, HEA's interconnection facilities or the transmission systems of others to which the transmission system is directly connected; (3) that, in the case of the interconnection customer, is imminently likely to cause a material adverse effect on the security of, or damage to, the generating facility or the interconnection customer's interconnection facilities. HEA may in its sole judgment during system disturbances and power outages, temporarily reconfigure the transmission or distribution line to restore service to HEA customers. Transmission or distribution service will be restored or reconfigured to a normal operating state as soon as reasonably practicable following removal of contingency, disturbance or emergency condition. HEA will make reasonable efforts to schedule with the interconnection customer for service interruptions required for major system and equipment maintenance. There shall be no liability on the part of HEA to any party for transmission and distribution services so interrupted.

The interconnection customer shall notify HEA promptly when it becomes aware of an emergency condition that may reasonably be expected to affect HEA's transmission or

distribution system or any affected systems. To the extent information is known, the notification shall describe the emergency condition, the extent of the damage or deficiency, the expected effect on the operation of both parties' facilities and operations, its anticipated duration, and the necessary corrective action.

Routine Maintenance, Construction, and Repair

HEA may interrupt interconnection service or curtail the output of the generating facility and temporarily disconnect the generating facility from HEA's transmission or distribution system when necessary for routine maintenance, construction, and repairs on HEA's transmission or distribution system. HEA will use reasonable efforts to coordinate such reduction or temporary disconnection with the interconnection customer.

Forced Outages

During any forced outage, HEA may suspend interconnection service to effect immediate repairs on HEA's transmission or distribution system. To the extent HEA receives advance notice, HEA will use reasonable efforts to provide the Interconnection Customer with prior notice.

Adverse Operating Effects

HEA will notify the Interconnection Customer as soon as practicable if, based on good utility practice, operation of the generating facility may cause disruption or deterioration of service to other customers served from the same electric system, or if operating the generating facility could cause damage to HEA's transmission or distribution system or affected systems. If, after notice, the Interconnection Customer fails to remedy the adverse operating effect within a reasonable time, HEA may disconnect the generating facility.

Reactive Power

The Interconnection Customer shall design and operate its generating facility to maintain a composite power delivery at continuous rated power output at the point of interconnection at a power factor within the range of 0.95 leading to 0.95 lagging.