SOUTH HADLEY ELECTRIC LIGHT DEPARTMENT
Net Metering Policy
As Amended 03/23/16
By the South Hadley Municipal Light Board

Policy Description: In an effort to ensure fair treatment of all of its customers, this policy specifies the treatment of distributed generation ("DG") installations based on the size of the facility. This policy has been designed to reduce the effect of cost-shifting that can occur as a result of net metering these resources. Although SHELD encourages the installation of small scale renewable energy projects, it also understands the burden that these installations can have on other customers. SHELD may charge customers for costs associated with installing additional meter requirements and incidental administration costs. All potential DG customers must have an approved interconnection agreement with SHELD prior to the installation of a DG system. The customer must meet all requirements in the interconnection agreement prior to commercial operation. (See Table 1 for fee schedule.)

Net Metering: Net metering allows the customer to use the output of its generating equipment to exceed its own electric usage in some hours, and to have those excess kilowatt-hours credited to its usage during hours when the output of the generating equipment is less than the customer's load.

Third party Purchase Power Agreements (PPA's) are not allowed under the net metering rules above and will be treated as DG Generators as defined later in this policy. Third party PPA's allow generation developers to sell electricity to customers competing with SHELD for that customer's sales. State Law exempts municipal electric utilities from offering retail wheeling. Customers must own all equipment installed at the customer site in order to quality for Net Metering.

The net metering facility must be located on property owned or occupied by the customer-generator and must operate in parallel with the Department's existing distribution facilities. The primary intent of the net metering facility must be to offset some of the customer-generator's own on-site electric power requirements. SHELD does not allow the use of neighborhood or network net metering.

SHELD limits the cumulative generating capacity of all net metered Residential DG Installations to one percent (1%) of its 2010 annual peak demand. The cumulative capacity of all commercial installations net metered Small Customer and Large Customer DG Installations will be limited to two percent (2%) of the annual peak demand. The 2010 annual peak was 28.5 mW.

In order to provide reasonable protection to all customers but provide incentive for small scale DG projects, SHELD offers net metering for the classes described below:

> **Residential DG Installations:** In order to receive net metering benefits, the installed DG shall be smaller than 10 kW. Any kilowatt hours produced by the customer-generator will be credited at the full retail value at the normal rate for

that customer-generator's current class of service. If the customer produces more energy than it uses for the month, the customer will be credited on its bill for the excess generation at the full retail rate and the credit will be carried over to the following billing period. The customer shall not receive payment for any credit balance as a result of net metering, and credits that continue for more than a year will be deleted from the customer's account. SHELD reserves the right to purchase the DG REC's associated with this generator. For systems larger than 10 kW, the Small Customer DG Installation terms and conditions, as defined below, will apply.

Small Customer DG Installations (<100 kW): Commercial installations for net metering purposes will be limited to 50% of the customer's annual peak demand. If the customer does not have a demand meter at the premise, the installation will be limited to 40% of the annual energy usage based on a capacity factor of 15%. Installations will be limited to a maximum size of 100 kW.

All kilowatt hours supplied to the customer will be billed at the normal rate for that customer-generator's current class of service. Any kilowatt hours produced by the customer-generator will be will be credited at the *full retail value* at the normal rate for that customer-generator's current class of service. For installations that are less than 100 kW that do not meet the net metering requirements in the first paragraph of this section, the generation will be credited at the *electric retail generation rate* per the Customer Rate Schedule. If the customer has produced more energy than it has used for the month, the credit will be carried over to the following billing period. The customer shall not receive payment for any credit balance as a result of net metering. Customer credits that continue for more than a year will be deleted from the customer's account.

Large Customer DG Installations (≤ 500 kW): Commercial installations for generation net metering purposes will be limited to 60% of the customer's annual peak demand up to a maximum installed capacity of 500 kW.

All kilowatt hours supplied to the customer will be billed at the normal rate for that customer-generator's current class of service. Any kilowatt hours produced by the customer-generator will be credited at the electric customer's retail generation rate per the Customer Rate Schedule, and the credit will be carried over to the following billing period. The customer shall not receive payment for any credit balance as a result of net metering. Customer credits that continue for more than a year will be deleted from the customer's account.

DG Generators: Installations that do not meet the Net Metering requirements defined above will be listed as DG Generators. DG Generators can sell to the ISO-NE wholesale markets or to third parties outside of SHELD's service territory. DG Generators may be required to register as an ISO-NE Market Participant and sign an interconnection agreement with ISO-NE in addition

to an interconnection agreement with SHELD. These customers will be charged a wheeling charge as determined by SHELD. SHELD and the DG Generator may mutually agree to enter into a Purchase Power Agreement. Should both parties enter into a PPA, then all generation will be governed by the terms of the PPA.

SHELD reserves the right to change this policy at any time to reflect changes in its Electric Rate Schedules or to bill the customer-generator for any costs that occur as a result of charges directly related to the customer-generator.

Indemnification: SHELD shall not be liable, directly or indirectly, for permitting or continuing to allow the attachment of DG facility, or for the acts or omissions of the customer-generator that cause property damage, or loss, or injury, including death, to any party. SHELD will not be held liable for any financial harm that this policy or modifications to this policy cause the customer-generator.

Safety & Operation: Customers must not interconnect their generating facility with the Department's distribution facilities until they receive written authorization from SHELD and approval from the Wiring Inspector. Unauthorized interconnections may result in injury to persons and damage to equipment or property for which the customer may be liable. *SHELD reserves the right to disconnect generation systems when they are determined to interfere with the operation of Department or other customer equipment, in the sole judgment of the Department. Any corrections or modifications to the equipment will be at the sole expense of the customer-generator.*

Table 1 – Net Metering Fee Schedules

	≤ = 100 kW	≥ = 100 kW
	Listed DG	**Any DG**
Application Fee (covers screens)	$5/kW Minimum $100 Maximum $500	$5/kW Minimum $500 Maximum $3,000
Supplemental Review or Additional Review (if applicable)	N/A	Up to 10 Engineering hours at $100/hr $1,250 maximum
Standard Interconnection Initial Review	N/A	Included in Application Fee (if applicable)
Impact and Detailed Study (if required)	N/A	Actual Cost
Facility Upgrades	Actual Cost	Actual Cost
O&M	TBD	TBD
Witness Test	Actual Cost	Actual Cost

Application Process and Forms

Interconnection policy for 10 kW or less residential solar, wind, combined heat and power, or hybrid system.

Customers must not interconnect their generating facility with the Utility's distribution facilities until they receive written authorization from South Hadley Electric Light Department. Unauthorized interconnections may result in injury to persons and damage to equipment or property for which the customer may be liable.

Application Process and Forms

You must provide information about your specific installation, such as manufacturer, model number and rating. You will be required to pay the installation cost for a new bi-directional meter.

Single-Line Diagram

The Single-Line Diagram must show all devices for the system equipment ratings, wire sizes and a visible, accessible and lockable disconnect switch ("safety switch"). Please note that the disconnect switch must be installed in a readily accessible location normally within **10 feet** of the customer's service panel, where Utility personnel can operate the switch at any time.

Requirements

In order for South Hadley Electric Light Department to approve your project, you must meet the following regulatory and safety requirements:

- **Certified Inverters.** You must choose an inverter that meets South Hadley Electric Light Department certification requirements.
- **Approved Disconnect Switches.** Your disconnect switch must be a blade-type switch ("knife switch"). The pullout switches commonly used in air-conditioning units and spas are not acceptable and will not be approved. Additionally, the customer is solely responsible for the maintenance of all fuses in fused blade-type disconnect switches.
- **Protection Equipment.** It may be necessary for South Hadley Electric Light Department to install, possibly at your expense, protection equipment necessary to ensure safe and reliable operation of the Utility's facilities. The need for protective equipment will vary, depending on a number of factors, including the location of your facility within the South Hadley Electric Light Department distribution system.

Pre-Parallel Inspections

Upon notification of the generator's readiness for the pre-parallel inspection, scheduling an inspection can take up to 10 days for certified generators with no external relays and up to 30 days for all other generators due to the availability resources. The following items must be completed prior to the scheduling of the inspection:

1. Execute all required agreements.
2. Install net generation electric output meter (Utility owned).
3. Provide a copy of the final signed building permit.
4. Completion of all electric work by South Hadley Electric Light Department.

Once you have submitted the below documents, the Utility's engineering staff will begin review of your project. As soon as the Utility receives the final, signed application, we will contact you to schedule an onsite inspection and bi-directional meter installation. After passing the inspection, you will receive written approval from the Utility to operate your system in parallel with the Utility's distribution system.

To ensure that the application package is complete, refer to the following table:

Item	General Comments
Application	Make sure that ALL applicable sections for your generator are completed.
Application Fee	Electronic applications will not be deemed complete until the check is received (unless exempt).
Site Plan	Show generator location with respect to building, transformer, main switchboard, Utility disconnect switch and other pertinent electrical equipment.
Single-Line Drawing	Must include net generation meter (if required) and Utility disconnect switch with manufacturer and model number.
Three-Line Drawing	Required if the generator is not certified or an external relay is used.
Proposed Relay Settings	Required if the generator if not certified or an external relay is used.
Protection Operating Direction	Required if the generator is not certified or an external relay is used.

Standard Form Interconnection Application and Agreement for Power Systems 10 kW or Smaller

Section 1. Customer Information

Name: _____

Mailing Address: _____

City: _____ State: _____ Zip Code: _____

Street Address (if different from above): _____

Daytime Phone: _____ Evening Phone: _____

Utility Customer Account Number (from Utility Bill): _____

Section 2. Generating Facility Information

System Type: Solar Wind Hydro Fuel Cell Generator

Size (kW AC): _____

Inverter Manufacturer: _____ Inverter Model: _____

Inverter Serial Number: _____ Inverter Power Rating: _____

Inverter Location: _____

Disconnect Type: Separate Manual Disconnect – Location: _____

*Meter Removal (if the Generator-Owner does not install a manual disconnect device accessible to Utility, the Utility shall not be liable when a service meter is removed to disconnect the generator thereby interrupting all Utility electric service to the customer site).

Section 3. Planned Installation Information

Licensed Electrician: _____ Contractor #: _____

Mailing Address: _____

City: _____ State: _____ Zip Code: _____

Daytime Phone #:_____ Planned Installation Date: _____

Section 4. Certifications

1. The generating facility meets the requirements of applicable IEEE standards and is listed by Underwriters Laboratories (UL) or other nationally recognized testing laboratory

Signed (Equipment Vendor): _____ Date: _____

Name (Printed):_____ Company: _____

Listing: _____ (UL or other NRTL)

Section 5. Utility and Building Division Inspection and Approval (to be completed by Utility after installation)

1. Application Approved: _____ Date: _____
2. System Inspection by: _____ Inspection Date: _____