Requirements for Commercial Operation



Revision 2.0 | June 14, 2017

The following summary of Xcel Energy's Section 9, Section 10 and Solar*Rewards Community program requirements is provided for your convenience; official tariffs govern should inconsistencies arise. Please read thoroughly to ensure you align your expected in-service dates with all Xcel Energy requirements.

Requirements at a Glance

	Program Requirements	● Final design	⊘ Equipment Delivery	€ Equipment Installation	4 Energization & Acceptance Testing		6 Post Activation
Solar Garden Developer	At least 4-6 weeks* prior to Acceptance Test (upload & notify SRCMN when final): • Final testing procedure • Insurance • Final Interconnection Agmt, including any updated exhibits At least 3 business days prior to Acceptance Testing: • Pay at least 2/3 of current Exhibit B • Upload at least 5 subscribers • Garden signed SRC contract • Signed REC agreement • Signed reservation letter	Upload final design documents Email SRC Vet and set Energization & Acceptance Test Dates	When ready to install, email SRCMN to schedule delivery / pickup of PT, CT & communication cabinet	Install PT, CT & communications cabinet Email SRCMN affidavit of state electrical inspection Up to 3 weeks*	 Test and tune system PE runs test Submit PE stamped testing procedure Email SRCMN to request final energization 	Activation	Final payment/true updue Up to 4 weeks*
Xcel Energy	 Validate legal entity authorized to do business in Minnesota Validate subscribers Review insurance requirements (allow 2 weeks* per revision) Review testing procedure (allow 4 weeks* per revision) 	Schedule Energization & Acceptance Test Order PT, CT & communication cabinet Allow 12 weeks for equipment procurement	Meet onsite for delivery of PT, CT & communication cabinet	Verify all program requirements are completed Verify co-location compliance Verify 24 month timeline Confirm payment Meet onsite to install main service meter Energize system for testing purposes only	Meet onsite to install production meter Perform acceptance test Verify as-built matches design Activate system Notify SRCMN	6	Send PTO confirmation Sign SRC contract Issue final invoice approx. 120 days* from Activation Commercial Operation is considered to be the date that the garden begins delivering subscriber bill credits. This occurs on the first day of the next month following Activation.

^{*}Delivery & installation timelines can be expedited by scheduling in advance. Stated timelines may take longer depending on request volumes. Requests and reviews are scheduled on a first-come, first-scheduled basis based on stated timelines. Waitlists also are first-come, first-served. Step 2 cannot begin until at least 12 weeks after equipment is ordered.

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Program Requirements

Upon completion of design, begin work to ensure all Solar*Rewards Community requirements are met. Upload documents to the online application portal and email SRCMN when complete. You can work on these steps prior to this time; confirmation of completion of these steps may take up to 4 to 6 weeks, or longer if revisions are required. **Meters will not be installed until these requirements are verified to be complete, and rescheduling may take up to 3 weeks or longer, depending on request volumes.** Program requirements include, but are not limited to:

- Signed Reservation Letter
- Fully executed final Interconnection Agreement with final, updated versions of Exhibits A & C;
- Verification of non-Co-Location (as needed);
- Validation of legal entity (as needed);
- Payment of at least 2/3 of the cost estimate in the current Interconnection Agreement Exhibit B
- Compliance with insurance requirements (allow a minimum of 2 weeks for review and each subsequent revision if
 needed). Please note that a 30-day notice is required prior to any change to existing insurance policy, including
 adding new facilities to an existing policy. As a reminder, the program requires \$2 million of insurance for EACH
 Solar*Rewards community garden. Therefore a 5 MW co-located facility requires \$10 million of insurance unless
 you also submit a signed contract amendment revising the requirement for co-located gardens.
- Compliance with 24 month timeline unless you also submit a signed contract amendment revising the requirement and agreeing to referenced delay payments;
- At least five valid subscribers uploaded into the online application system; and
- Fully executed Solar*Rewards Community Contract & REC agreement, and any associated signed amendments
- Final testing procedure (Reference section 10 sheet 155 thru 162 and allow at least 4 weeks per revision for review)

Process Details

- 1. Final Design: Upon design completion, upload final one-lines and line diagrams and other calculations/documentation that may have changed, and email SRCMN@xcelenergy.com. Xcel Energy orders Metering Equipment based on these designs (at least 15 weeks prior to requested equipment installation date). Energization and Acceptance Testing Appointments can be scheduled once your design is complete and all needed equipment is ordered. Work with your designer to schedule these appointments knowing that if you miss an appointment, reschedules are done on a first-come, first-scheduled basis with no preference for previously scheduled appointments, and waitlists occur during busy periods.
- 2. **Equipment Delivery:** Email SRCMN@xcelenergy.com to arrange for PT, CT, and communication cabinet pick up or delivery when you are ready to install equipment. This should occur at least 12 weeks after your final design date and 3 weeks prior to your expected delivery date for this equipment. Please refer to the Xcel Energy "Process for Factory Installation of Metering Equipment" guidance document email SRCMN@xcelenergy.com if you need a copy. Work with your designer at this time to schedule expected dates for the remaining steps, and be aware that if you aren't ready and need to reschedule, it can take from3 weeks to more than a month to reschedule each step
- 3. **Equipment Installation:** Email SRCMN when PT, CT and communication cabinet are set and ready, testing plan is approved and all other program

Timelines quoted assume normal business conditions and favorable field conditions. During high volume times, scheduling and rescheduling may take months for each occurrence. Scheduling new appointments or rescheduling are prioritized using a common waitlist and will be handled on a first-come, firstserved basis based on stated timelines. Appointments cancelled due to Xcel Energy crews' weather limitations will receive priority treatment for rescheduling. Per crew contracts, no scheduled appointments will occur from Dec. 22 - Jan. 2 each year, and we do not schedule on

requirements are verified to be complete, including affidavit/approval by jurisdictional authorities. <u>Scheduled Energization appointments will not be honored unless all prior required steps are verified by the SRCMN team at least 3 business days in advance.</u>

4. **Energization & Acceptance Testing:** Once Program Requirements have been completed and verified and you have approval of the testing procedure's successful execution stamped by a Professional Engineer registered in the State of MN, upload it into the online application portal with an email notice to SRCMN@xcelenergy.com. All Program Requirements, including the stamped testing procedure, must be verified at least 3 business days prior to Energization or any existing appointments will be canceled and rescheduled based on availability.

At your energization appointment, an Xcel Energy Meter Technician will install the Service Meter and the system will be energized for testing and optimization by the developer prior to Xcel Energy Acceptance Testing. The production meter will not be installed at this time and the system is not allowed to produce energy continuously. Energization typically occurs between several days and up to 4 weeks prior to Acceptance Testing. During Acceptance Testing, an Xcel Energy engineer will meet your technical staff on-site to verify you have successfully completed all Section 10 Final Test requirements.

Xcel Energy shall witness the execution of the anti-islanding and acceptance testing, and plans one day for this step. Please note that you are accountable for all system adjustments needed to pass the required Acceptance test, and wait times will be charged. A final on-site confirmation that one-lines and design documents match as-built conditions is required, or testing will fail and need to be rescheduled once inconsistencies are fixed. If the final design has significant changes from the Generation System proposed on the original Application that invalidate the engineering studies or the preliminary engineering screening, the Generation System Interconnection Application request may be rejected by Xcel Energy, and the Applicant may be requested to reapply with the revised design.

- 5. **Activation:** After the system passes Acceptance Testing, Xcel Energy will countersign the final Solar*Rewards Community contract and then issue an official Permission to Operate letter within 5 business days. Please contact SRCMN@xcelenergy.com if you need this step expedited. The Date of Commercial Operation for the purposes of bill crediting is the first calendar day of the first month following Permission to Operate. Please plan to pass Acceptance Testing at least 5 business days prior to your planned Commercial Operation date.
- 6. **Post-Activation:** Xcel Energy will collect invoices and compile costs for approximately 120 days after project completion, and will send the final invoice after final costs are compiled and calculated. The developer then has 30 days to pay any outstanding balance. If prior funds exceed the invoice amount, Xcel Energy will issue a refund.

Clarifications

- **Q**. Does it really take up to 9 weeks to energize the system after requesting installation of the metering and communications equipment?
- A. It depends on how well you are able to adhere to a schedule you set with your designer. Work with your designer prior to ordering installation of the equipment to schedule the remaining testing and installation dates. If you miss a milestone and we need to reschedule, during times of high volumes of interconnection requests and/or resource-intensive utility activity such as outage restoration, lead times for installation requests can range up to 3 weeks under normal business conditions, and can take months during times of high volumes of requests.
- Q. Can Xcel Energy sign the contract prior to Acceptance Testing?
- **A.** No, because we need to confirm that system completion occurs within 24 months and co-location requirements are met at the time of Commercial Operation. However, if you send a request we can confirm which of the program requirements have been met at a point in time.
- Q. What if my project is complete before Xcel Energy is ready?
- **A.** Your designer will work with based on the timelines provided in this guidance document. The process typically takes at least as long as the timelines shown, and even those depend on the developer responsiveness and the amount of changes that occur after design begins. Energization and Acceptance testing dates will be scheduled using the timeline shown, and are subject to change depending on developer progress and conditions beyond Xcel Energy's control.

Additional Information

If you have questions or concerns about this process, please contact SRCMN@xcelenergy.com for assistance. The current version of this and other process documents are available at the Solar*Rewards Community Developer Resources Website. (Visit xcelenergy.com; search for Solar Rewards Community Developer.)