

Track I - Scope of Work Template

(Version – January 2024)

Please note, while the exact format of the Scope of Work template is not required, all information requested within the Scope of Work template must be included in some form in the project Scope of Work.

Scope of Work

The Scope of Work shall include the following:

- **Project Description**
 - Intent of Project
 - Reason why the applicant is interested in project and what will it accomplish.
 - Describe which Track I services the applicant is including in the Scope of Work (e.g. energy studies, energy benchmarking, design, etc.).
 - Building Description
 - Name and location of each building included in the project, building use, square footage of building (if the facility is mixed use, enter school space independently), number of students and number of staff.
 - Annual energy costs by fuel type
 - *For Energy Studies and Energy Efficiency and Clean Heating and Cooling Design Projects:*
 - Building(s) construction type, age, number of stories and operating hours.
 - Current configuration and condition of energy consuming systems relevant to the study.
 - *For On-Site Energy Manager:*
 - Effectively demonstrate the need for an On-Site Energy Manager.
- **Consultant or Subject-Matter Expert Information**
 - Demonstration of qualifications (*if applicable* – see Track I Consultant Requirements section of PON 4924).
 - Include the consultants name and contact information (e.g. address, phone number and e-mail address). If there are multiple consultant firms included in the Scope of Work, include the contact information for each firm and identify what tasks each consultant is responsible for.
- **Tasks and Deliverables** - Itemize project tasks and identify their corresponding deliverables. **Each task requires a deliverable (e.g. interim, draft and/or final).**

Tasks

- *For Energy Studies:*
 - Each potential energy efficiency measure (EEM) must be listed as a single task and indicate the following:
 - Scope of the EEM evaluation (including the subject system or operation & potential solutions)
 - Current condition of the system or operation (if not included in the previous section)
 - Data collection method (ex. data logging, BMS, nameplate, etc.)
 - Energy savings calculation method (modeling - specify software, spreadsheet, etc.)
- *For Energy Efficiency or Clean Heating and Cooling Design Projects:*
 - The tasks must include the following:
 - Building(s) included
 - Technologies to be designed
 - Method and type of data collected
 - Number and access needed for site visits

- Method of analysis and design
- Ground Source Heat Pump test well (if applicable)
- Depth of design to be completed (ex. 100% CDs)
- *For On-Site Energy Manager:*
 - The tasks must include the following:
 - Develop an [Energy Management Plan](#), submitted at the conclusion of the first quarter.
 - Identify the energy savings target as a percentage savings over baseline usage, by fuel type.
 - Submit [Quarterly Savings Reports](#), which document results from both capital upgrades and operational changes, in addition to a narrative discussion of work conducted during the quarter.
 - Coordinate project management check-ins with NYSERDA via conference call or memo at least once per month.
 - Develop a case study, including savings metrics, for online publishing.
 - Submit a final report that documents overall effort and progress against facility energy goal, including lessons learned.
 - The tasks below are examples and may be included in the SOW. Additional tasks related to energy management may be added.
 - Develop and/or maintain an energy tracking and monitoring system.
 - Develop and/or maintain a cross-functional energy team and hold monthly meetings.
 - Develop a strategy for energy savings Measurement & Verification.
 - Conduct walkthrough audits and reports that identify savings opportunities for further investigation.
 - Review maintenance operational schedules and procedures to identify operational savings opportunities and develop preventative (rather than reactive) maintenance plan.
 - Develop and propose energy and productivity projects; including developing the business case.
- ***For Track I projects which plan to submit Track II applications:***
 - If the Track II proposed project includes the installation of refrigerant containing equipment (such as chillers and heat pumps), then the Track I study must include a Task which evaluates:
 - The feasibility of utilizing equipment that contains a natural or other refrigerant with a global warming potential (GWP) of less than 10.

Deliverables

The final deliverable shall include the following:

- Concise summary of project, study or design work
 - The concise summary of measures evaluated shall include recommendation status, an overview of payback, costs, and savings in dollars, MMBtus, and kWh, and kW where appropriate. An example summary has been provided for reference on the Clean Green Schools Initiative [documents and resources website](#) (see Track I - Project Summary Sheet Template).
- Brief overview of project, study or design work
 - The brief overview of the project shall include intent, findings, recommendations, and the economics of the recommendations (if applicable).
 - Final deliverables shall include analysis for projects evaluated and not recommended including quantified estimated energy savings expected for all analyzed measures. The Program supports site-specific analysis and therefore, rule of thumb assumptions and percentage savings calculations are not acceptable.

- Background of project, study or design work
 - Provide information about the project that is relevant to the study (ex. type of school, size of school, annual energy costs by fuel type, electric and gas suppliers, rate tariff, etc.). A description of all existing building systems evaluated, including but not limited to sizing, location, operation, age, condition, and efficiency, should also be included.
- Project, study or design results and recommendations
 - Indicate reasoning for recommendations
 - Economic analysis (if applicable)
 - Additional benefits of recommendations
- Detailed schedule (if applicable)
- Layouts/drawings/plans/specifications (if applicable)
- Itemized project implementation costs (at minimum material and labor costs associated with each task/measure with sources of cost estimates and/or vendor quotes as applicable)
- For *Energy Study or Energy Efficiency/Clean Heating and Cooling Design* Appendices:
 - Historic energy usage and costs (12 months minimum)
 - Calculations for all studied measures. For software modeling, include software type, inputs, and outputs of analysis.
 - Load calculations (if applicable)
 - Measured data logs with accurate units of measure and indication of the measured data source(s) (if applicable)
 - Backup design considerations (if applicable)
- For Ancillary Task Project Appendices (e.g. Grant Writers, Fiscal Advisors or Clean Energy Educational Projects):
 - Proof of project completion (e.g. copy of grant application, marketing material for an event, building aid package for a project, etc.)
- **Assumptions/Responsibilities of each party**
 - *Add assumptions and responsibilities that directly correlate to the completion of the project.*
- **Itemized Schedule (by task)**
 - *Add a schedule in weeks, starting from the issuance of a NYSERDA Purchase Order for the project.*
- **Itemized Budget (by task)**
 - *See budget template on the Clean Green Schools Initiative [documents and resources website](#) (see Track I – Budget Template).*