ATTACHMENT E: TECHNICAL PLATFORM REQUIREMENTS

MasCEC requires that certain functionality exists in the Application Platform to effectively administer the Program. Additionally, there are less critical functions that are optional, but could provide MassCEC the opportunity to streamline the administrative process. These features are marked as **[Opt]**.

Program/Project management

- Only allow approved entities and Program Administrators to access the portal;
 - Allow MassCEC to open and close the Application Portal, provide approved entities with access to the Application Portal, and put an entity's access on hold at any time;
- Customized edit and view permissions for different entities/entity types;
- Allow applications/projects to be restricted from advancing until program administrator approval for certain workflows;
 - E.g., Restrict loan support request/disbursal until project completion information has been received.
- Generate unique IDs for each submitted application;
- Data must be searchable by unique ID. If applicable, any discrete forms for the same application/project should be able to be linked with associated unique ID;
- Interface with approved entities via email regarding status of application/project, missing application information, and approval/rejection through either template or custom emails. This will ideally include auto-population of applicable project information and contact information;
- Allow Program Administrators to review applications in all statuses, track workflow and status, make formal approvals to entities, and build custom data reports;
- Electronic signature capabilities;
 - Allow Program Administrators to seek electronic signatures from Program Lenders, installers, and resident homeowners.
- Meet high standards for information security;
 - The solution must ensure robust protections for personal and confidential data exchanged within the system. This includes the implementation of encryption, multi-factor authentication (MFA), and role-based access controls (RBBAC) to safeguard sensitive information at all stages.
 - The system must comply with relevant industry standards such as ISO 27001, NIST, and GDPR (where applicable) to ensure that data privacy and protection measures are in place.
 - For example, the system should utilize encryption protocols such as AES-256 for stored data and TLS 1.2+ for data in transit. Access logs should be maintained to track user activity, enabling audits to ensure only authorized personnel have access to specific types of information. The

solution should also have secure data backup mechanisms to prevent loss or corruption of critical information.

- The system must comply with any other legal requirements, including requirements under 201 CMF 17.00.
- While **borrowers' social security numbers and loan underwriting details will not be included in the system**, the solution must still account for the security of other sensitive data, such as personally identifiable information (PII), financial details, and grant information, in accordance with applicable regulations and best practices for data protection.
- Allow edits to eligible entities, required fields, communication, and application workflows throughout the Program performance period.
- Allow Program Administrators to export all data and project files on demand.
- **[Opt]** Either provide an Application Program Interface (API) compatible with MassCEC's award management system or the ability to create customized exports of application information for import. The interface should be compatible with other award management systems with little or no modification;
- **[Opt]** Automatically generate electronic award documents and emails and additional electronic communications depending on application status;
- **[Opt]** Ability to sort applications by status, unique application number, specific entity, and other application fields;
- **[Opt]** Allow MassCEC staff to make some changes to the application portal directly, without requiring a work order (e.g. managing list of eligible entities, editing required fields, editing communication, or editing application workflow);
- **[Opt]** Batch processing functionality, as applicable;
- **[Opt]** Enable Program Administrators to access the Program data for a significant period of time after the program has been sunset.

Application Intake

- Intake and store qualitative and quantitative data;
- Customization of field-specific data validation for quality assurance;
- Allow for input and/or import of technical project information;
 - Allow Program Participants to select project equipment, including solar PV modules and inverters, from a regularly updated list of equipment, as approved by the California Energy Commission or a subsequent list of similar quality, as approved by MassCEC
 - To reduce redundancy for Program Participants, it is strongly preferred that the platform be able to recall specific data from the Department of Energy Resource's SMART program technical application into the Platform's technical application. Program Administrators will have all necessary permissions to access and extract this specific data during the Program performance period. Potential solutions could look like:

- Directly linking into the SMART application platform
- Developing a platform that can import data from the SMART application, for which DOER will establish a pathway out of the SMART application platform
- Allow for applications to have branching process flows, or comparable feature;
- 'Contextual Forms' capability which will enable certain questions to appear depending on prior information provided or selected;
- **[Opt]** Integrated ability for residents to submit required documents (e.g. income verification) that attach to the application completed on their behalf by installers.
- **[Opt]** Prevent application submission until required application components are complete;
- **[Opt]** Ability to limit the number of applications an entity may submit;
- **[Opt]** Data field specific cross-referencing abilities between new and previously submitted applications;
- **[Opt]** Allow application to direct users to web pages outside of the application;

Project Completion and Loan Support

- Allow Program Lenders to calculate, document, reserve, and request loan support based on information in technical application and associated project record;
 - Notify MassCEC when loan support requests are submitted
- Allow Program Participants to edit and update application/project information in line with project completion;
 - Notify MassCEC when project information is edited after application approval
- **[Opt]** Allow a Program Lender to change the project status of an application/project once the specific application is identified, thereby preventing a project from being acted upon by more than one Program Lender;
- **[Opt]** Allow automatic generation of deadlines for project completion information to be entered based on date of technical approval or loan qualification;
 - Notify MassCEC when projects are out of compliance with project deadlines.
- **[Opt]** Automatically calculate preliminary loan support amounts, based on fields selected and information input;
- [Opt] Automatic email notification functionality based on project deadline dates;
- **[Opt]** Allow restricted ability (require permission/password from Program Administrators) for Program Lenders to update loan information, should it change after loan closing;
- **[Opt]** Allow Program Lenders to update loan principal balance monthly and generate customized data exports.