

EXAMPLE SCOPE OF WORK – REHABILITATION PROJECT

The proposed project follows preparation of the aforementioned condition assessment and plans and specifications prepared by Miller Architects in 2012 and 2013, which were previously reviewed by SHPO. All work undertaken will meet the *Secretary of the Interior's Standards for Rehabilitation*. The City anticipates that the project will proceed according to the timeline outlined in the Work Schedule.

1. **RFP and Contractor Selection:** Once a grant agreement is executed with SHPO, the City will begin working on the Request for Proposals (RFP), which will be used to competitively select a contractor who can successfully demonstrate project capacity and proficiency, as reflected in at least three (3) years of experience of five (5) substantive examples of work with similar historic properties. The City will work closely with SHPO for review and approval of the RFP, as well as selection and approval of the contractor.
2. **Kick-Off Meeting:** At the start of the project, the City and SHPO will participate in a kick-off meeting to discuss the goals of the project, tasks to be completed, and anticipated timelines. At this time, the scope of work and methods to be employed will be confirmed. SHPO, as determined appropriate, will complete a walkthrough of the property with the City as part of the meeting to better understand the project scope.
3. **Rehabilitation Work:** Tasks anticipated to be undertaken are identified in detail in the attached plans and specifications and summarized below. Generally speaking, rehabilitation activities include repointing and selected masonry unit replacement along all elevations as indicated in the plans. All work will comply with the *Standards* and meet the following requirements:
 - All repair and replacement will match the existing historic construction in all physical and visual aspects, including color, texture, and workmanship;
 - Historic masonry will be saved to the greatest extent possible;
 - Work will be carried out using the gentlest means possible; and
 - Sound historical materials will be protected so as not to be disturbed during the project.

Brick setting and pointing mortar composition

- Aggregate: Match original aggregates, including color, particle size and shape, and gradation
- Lime Putty: ASTM C1489, lime putty for structural purposes
- Water: Clean and potable
- Setting and repointing mortars are to match existing face mortar in color, grain size, and texture. The compressive strength of the mortar will be equal to or less than the compressive strength of surrounding brick.
- Mortar will be custom-blended based on the results of the mortar analysis contained in the 2012 condition assessment, either onsite or pre-mixed at a factory.
- Applied mortar will be kept from drying out too quickly and protected from direct sun and high winds for first 72 hours after installation. Nine wet-and-dry cycles will be completed after application by misting the applied work.

Brick Unit Replacement

- Only those damaged units identified in the plans will be replaced. It is anticipated that approximately 200 brick units will be replaced by the project.
- All salvaged and new brick will match the existing masonry in color, texture, and strength. Samples, manufacturer's product information, and/or salvage source must be approved by the City and SHPO prior to use.
- Rake out setting mortar from the face of existing brick to an appropriate depth to remove existing masonry unit. Replace masonry unit and repoint approved mortar and tool joints to match historically appropriate profile
- Apply mortar in layers not greater than ½ the depth of the joint until a uniform depth is formed. Compact each layer and allow for it to become thumbprint hard before applying the next layer.

- Joint will be tooled to match the historic profile.
- All excess mortar will be removed from the face of the brick before it dries.

Repointing

- All mortar joints will be raked out back to sound, solid backup material. Raked-out joints will leave a clean, square face at the back of the joint to provide for maximum contact of the pointing mortar with the backup. Shallow joints and feature edging will not be used. Joints are to be raked out to a minimum depth of 2.5 times the width of the joint.
 - Some joints have been over struck of approximately 3/8"-thick cement mortar over the original lime-based mortar. In such instances:
 - Removal of cement mortar will be with hand chisel to minimize the potential for damage to surrounding masonry. Only upon explicit approval can a rotary blade be used in select circumstances to create a channel in the cement mortar, with the remainder to be chiseled from the joint.
 - Removal of lime mortar will also be done by hand chisel. The joint will be soaked with water to soften the lime mortar before raking or chiseling to a depth of 2.5 times the width of the joint.
 - Masonry joints will not be widened, and masonry joints will not be further spalled, chipped, or otherwise damaged. If the contractor inadvertently damages sound material, the contractor will be required to replace the unit(s) with new or salvaged material that matches the original.
 - Joints will be brushed or flushed with water to remove dirt and debris, working from the top of the wall to bottom.
 - Exposed surfaces of brick adjacent to the joint will be wetted prior to repointing. The contract will maintain a misting sprayer on site at all times during project work.
 - Mortar must be dry enough to enable the material to be tightly packed into the joint, maintaining a clean profile and preventing shrinkage as the mortar cures.
 - Apply mortar in layers not greater than half the depth of the joint until a uniform depth is formed. Compact each layer and allow for it to become thumbprint hard before applying the next layer.
 - Joint will be tooled to match the historic profile.
 - All excess mortar will be removed from the face of the brick before it dries.
4. **Project Close-out Meeting:** Upon completion of the project, the City and SHPO will have a closeout meeting to visually inspect and review the work completed to ensure it was done appropriately in consideration of the *Standards*. A final report summarizing the project, outcomes, and issues overcome, if any, will be prepared for SHPO.