SCOPE OF WORK WAIPAHU PUBLIC LIBRARY EXTERIOR REPAIRS AND PAINTING CSD PROJECT NO: L3300744

1.0 Existing Conditions:

- 1. The Waipahu Public Library is part of the Hawaii State Public Library System (HSPLS) and is located at 94-275 Mokuola St, Waipahu, Oahu.
- 2. The buildings' exterior has minor spalling and water-damaged soffits and soffit vents.

2.0 Scope of Work:

The Contractor shall provide labor, materials, and equipment to necessary to satisfactorily complete all items of this project listed in this scope of work. The Contractor shall be solely responsible for all work in all phases of this project.

A. Spall, Concrete, and EFS Repair

- 1. Cracks and imperfections in the concrete surface that are less than 1/4" deep shall be routed out, cleaned, and filled with a paintable polyurethane concrete filler.
- 2. Cracks and imperfections in the concrete surface that are greater than 1/4" deep shall be routed out, cleaned, filled with an injectable epoxy and finished with a paintable polyurethane concrete filler.
- 3. Cracks and imperfection greater than 1/2" in any dimension and all spalled areas shall be routed out, cleaned, and patched with a cementitious grout or compound over a compatible bonding agent. The cementitious product used shall be suitable for the depth of the repair and shall be compatible with the proposed primer and paint.
- 4. Damages to the exterior finish system shall be repaired with components and materials compatible with the existing finish system. The manufacturer's recommended means and methods for the repairs shall be followed.
- 5. Concrete around embedded metals and rebar shall be sufficiently removed to allow proper rust treatment of the metals and rebar.

B. Metal Corrosion Treatment

- 1. Rust scale on all metals and rebar shall be mechanically removed.
- 2. The descaled metals shall be treated with a rust inhibitor and coated with a sealant that is compatible with the primer and finish coating.
- 3. Metals embedded in concrete and rebar surfaces shall be treated with a rust inhibitor and coated with a sealant that is compatible with cementitious grout.

- 4. Should an area with significant rust that could structurally fail be discovered, the Contractor shall notify the CSD Engineer upon discovery.
- 5. All corroded metals shall be prepped using The Society for Protective Coatings (SSPC) SP-2 or SP-3 standards before spot priming.

C. Sealant and Expansion Joint Repair

The seals of all windows, window frames, door frames, and exterior penetrations shall be inspected for weather tightness. Sealants and joint compounds used in the expansion joints shall be inspected for flexibility and integrity.

- 1. Missing, weathered, and otherwise compromised seals shall be repaired by removing the failed sealant, preparing the area and applying new sealant. Surface preparation and application of the new sealants shall be done in accordance to the manufacturer instructions and recommendations. Replacement of window gaskets for this Scope of Work shall be limited to 60 linear feet.
 - a. Dow Corning 791 silicone weatherproofing sealant, or approved equal, shall be used for all window and glass door glazing.
 - b. Sikaflex 1a one-part polyurethane, elastomeric sealant, or approved equal, shall be used for window frames, door frames, and exterior penetrations. Backing materials specified by the sealant manufacture shall be used to ensure sealant depth does not exceed 1/2".
- 2. Expansions joints that are not continuously bonded throughout the entire length of the joint shall be removed, including backing materials, and replaced. Surface preparation and application of the new joint sealant shall be done in accordance to the manufacturer instructions and recommendations.
 - a. Sikaflex 1c SL 1-part polyurethane sealant, or approved equal shall be used for all horizontal joints.
 - b. Sikaflex 1a+ 1-part polyurethane sealant, or approved equal shall be used for all vertical joints.
 - c. Backing materials specified by the sealant manufacture shall be used to ensure joint depth does not exceed 1/2".
- 3. All sealants shall be tooled to eliminate voids and ensure full contact with substrates and backing materials.

D. Soffit and Soffit Vent Repair

1. EFS soffits boards and vents damaged beyond repair shall be identified and brought to the attention of the CSD Engineer. Upon approval of the CSD Engineer, replacement of ERS soffit boards and vents shall be performed as additional work, pursuant to General Conditions, item 15.

2. Damaged or missing vent screens shall be replaced with the same materials and finish to match the original and adjacent areas.

E. Bird Screens/Netting

- 1. Bird screens shall be removed and reinstalled in all areas where the bird screens prevent access to painted areas.
- 2. Bird screen shall be installed in the entryway of the building. The netting shall have a rope or fabric border and be securely fastened to the walls to prevent birds from entering the space.
 - a. The netting shall be:
 - 1) knotted 6-strand polyethylene twine, ¾ inch mesh, with a minimum breaking strength of 44 pounds;
 - 2) black in color;
 - 3) have a minimum 5-year material warranty;
 - 4) resistant to rot, water, UV, flame, and abrasion; and
 - 5) manufactured by: Nixalife, BirdBGone, BirdX, Bird Barrier, or equal.
 - b. The rope or fabric border shall be:
 - 1) a continuous polyethylene rope with a minimum diameter of 3/8" or a vinyl laminated polyester fabric, 16/17 ounces per square yard.
 - 2) black in color; and
 - 3) resistant to rot, water, UV, flame, and abrasion.
 - c. All fasteners and straps shall be 304 stainless steel.

F. BFPA Enclosures

- 1. Fully welded, metal enclosures shall be installed on each of the two backflow prevention assemblies (BFPAs) located on the property. The enclosure may be manufactured or custom fabricated. Approximate dimensions of the BFPAs: 32"W x 27"H and 47"W x 8"H. Contractor is responsible to verify all dimensions.
- 2. Cast-in-place concrete curbs shall be poured around the BFPAs to provide a foundation and anchor point for the enclosures. Sketch SK-3 shall be followed for the construction of these curbs. The Contractor may submit shop drawings to install concrete pads in lieu of curbs. Shop drawings for alternates shall be submitted to and approved by the CSD Engineer prior to starting construction. Section H of this Scope of Work shall be followed for the placement of the concrete.
- 3. The metal enclosures shall be:
 - a. galvanized or powder coated expanded metal;
 - b. removable to provide full, unobscured access to the BFPAs; and
 - c. lockable with a padlock.

Suitable manufacturers include Gorilla Manufacturing and Strong Box. Manufacturer's literature shall be submitted for approval. The Contractor may fabricate the enclosures.

Shop drawings for the enclosures shall be submitted to and approved by the CSD Engineer prior to starting construction.

G. Planter Removal

- 1. The existing planter in the sidewalk shall be removed and filled in with concrete.
- 2. Existing utilities to the planter shall be terminated below grade.
- 3. The planter area shall be graded to a minimum of 6" below the finish elevation. A minimum subgrade of 2" #3B fine basalt aggregate shall be watered, and thoroughly compacted.
- 4. Section H of this Scope of Work shall be followed for the placement of the concrete.
- 5. Welded wire fabric or Fibermesh 150 admixture, or approved equal, shall be used.

H, Concrete Placement

- 1. Prior to pouring of concrete, the subgrade shall be dampened. Concrete shall be poured continuously and shall be thoroughly tamped and floated to a smooth and even surface. The finished surface shall be broom finished with a finished edge and without any scoring.
- 2. The finished concrete shall be cured for 7 days following industry standards and shall be protected against damage or defacement of any kind. Damaged or defaced concrete shall be removed and replaced by the Contractor at their expense.
- 3. The concrete shall have a minimum 28-day compressive strength of 4,000 psi.

I. Painting

- 1. Exterior surfaces to receive paint shall be cleaned and prepared in accordance with the surface preparation specifications of SSPC and the paint manufacturer's instructions and recommendations.
- 2. Rust scale on metal supports, structures, railings and the like shall be mechanically removed in accordance with the surface preparation specifications of the SSPC. The descaled metal and rebar surfaces shall be treated with a rust inhibitor and coated with a sealant that is compatible with the primer and paint. Should an area with significant rust that could structurally fail be discovered, the Contractor shall notify the CSD Engineer upon discovery.
- 3. Paint shall be roller-applied using the manufacturer's recommend cover with a 3/4" nap size as much as possible. Paint specifications shall be as follows:
 - a. Primer for all surfaces, unless otherwise specified, shall be Zinsser Bulls Eye 1-2-3 or approved equal.

- b. Previously painted concrete shall be coated with 2 coats of Sherwin Williams Duration® Coating Exterior Latex Satin Extra White K33W00251, or approved equal.
- c. Concrete walkways shall be coated with 2 coats of Sherwin Williams ArmorSeal® Tread-Plex 100% Acrylic Floor Coating B90W00111 with H&C SharkGrip slipresistant additive, or approved equal.
- d. Steel doors, door frames, railings, and gates shall be primed with Sherwin Williams Kem Kromik® Universal Metal Primer Off White B50WZ0001 if the existing surface is coated with alkyd (oil-based) paint or Sherwin Williams Pro Industrial Pro-Cryl® Universal Acrylic Primer Off White B66W00310 if the existing surface is coated with a latex (acrylic) paint, or approved equal.
- e. Uncoated steel black pipe with heavy corrosion shall be prepped to SSPC-SP3 prior to coating and primed with Sherwin Williams Macropoxy® 920 PrePrime Rust Penetrating Epoxy Pre-Primer Transparent Part A B58T00101. The intermediate coat shall be Sherwin Williams Macropoxy® 646 Fast Cure Epoxy Part A Mill White B58W00610. Top coat shall be 2 coats of Sherwin Williams Pro Industrial Water-based Alkyd Urethane Enamel B53W01151, or approved equal.
- f. Exterior wood soffits shall be coated with 2 coats of Thompsons® Waterseal Advanced Tinted Wood Protector 100 VOC Natural TH.A21711.
- g. Exterior wood trim shall be coated with 2 coats of DUCKBACK® Premium Translucent Wood Finish satin SC7420, or approved equal.
- h. Exterior finish system shall be coated with 2 coats of Sherwin Williams Duration® Coating Exterior Latex Flat Extra White K32W00251, or approved equal.
- 4. Spray application must be approved by the CSD. If allowed, spraying shall be done using the pressure settings, application technique, spray tip, mesh filter screens, and mesh tip strainer as recommended by the coating manufacturer. Doubling back with spray equipment to build up film thickness of two coats in one pass is not allowed.
- 5. Paint colors and finish shall be determined by the CSD prior to the start of this project. Brush-outs with color name and tint formula shall be submitted for approval.
- 6. Any extra paint shall be turned over to the CSD.

J. Cleaning

Windows, louvers, and bare concrete walls, ledges, and walkways within the project area shall be cleaned. Cleaning equipment and agents shall be used to remove dirt, grime, droppings, and other built-up contaminants.

3.0 General Conditions

- 1. All contractors, including all subcontractors, shall be licensed by the state of Hawaii in their specialty and shall be in good standing. All contractors shall have at least 5 years of work experience in Hawaii within their specialty.
- 2. All work shall minimize impact to the building's functions and shall be scheduled.
- 3. Best practical practices and care shall be taken to protect all HVAC equipment, furnishings, and other property including, but not limited to, vehicles, plantings, and depositories that are in and around the work area. Plywood shall be used to protect the roofing from equipment, supplies, and rigging.
- 4. The construction area shall be kept clean and safe at all times. Should the construction activities pose a hazard to passersby, the construction area shall be roped off and contain warning signs to prevent passersby from entering the area.
- 5. Any damage caused by the Contractor's work shall be repaired at no additional cost to the State. Prior to beginning work, the Contractor shall document the existing condition of the building and its' contents. Documentation shall include at a minimum pictures or video of the area. This documentation shall be used to verify any damage claims made by the State against the Contractor during the construction period.
- 6. Material specifications and MSDS datasheets for all proposed products for this project and any other chemicals that will be used on site shall be submitted to and approved by the CSD Engineer prior to delivery to the jobsite. Submittals shall consist of one hardcopy or electronically submitted.
- 7. All products used for this project shall be stored, handled, applied, and disposed of following the manufacturers' instructions.
- 8. The Contractor and all of its' subcontractors shall follow and be compliant with all applicable OSHA and HIOSH requirements.
- 9. Prevailing wages shall apply to this project.
- 10. All costs, including taxes, travel, mileage, and any other expenses required to perform the work shall be included.
- 11. All work shall be completed within 120 calendar days from the date of award and be coordinated with the CSD Engineer. Time extension may be granted upon approval of the CSD Engineer. Once the work is started, the contractor shall complete the work without delay or interruption.
- 12. Upon completion of the project the Contractor shall provide a minimum two-year warranty for materials and workmanship written to "State of Hawaii, Hawaii State Public Library System".

- 13. The Contractor is responsible to verify existing job site conditions.
- 14. Product substitution requests shall be submitted to the CSD for approval prior to application. The substitution requests shall include product data sheets that clearly demonstrate that the proposed substitute product is equal to or better than the specified product.
- 15. Any additional work for this project that is not covered by this Scope of Work must be approved by the CSD Engineer prior to commencement of such work. For all additional work, the Contractor shall be compensated for the actual costs for materials, subcontractors, and labor plus 20 percent markup. The 20 percent markup shall be inclusive of all taxes, overhead, profit, and any other incidental expenses. No further compensation shall be provided.

Any additional work shall be paid separately by a purchase order or a purchasing card. Pay requests for additional work shall include copies of all invoices and the Contractors' certified payroll.

4.0 Solicitation, Bid, Award

- 1. The sketches provided are for diagrammatic purposes only and do not represent the entire scope of work. The Contractor is responsible to verify all existing conditions including all dimensions.
- 2. A pre-bid conference and site walk-through shall be held on Tuesday, May 9, 2017, 11:00 am at the entrance of the Waipahu Public Library 94-275 Mokuola St. Waiphau, HI 96797.
- 3. The question and substitute material deadline is Friday, May 12, 2017, 4:00p.m. The CSD shall respond to the questions by Friday, May 19, 2017, 2:00 p.m. Questions and answers shall be made by using HIePRO. An addendum shall be issued should changes occur to the scope of work and specifications.
- 4. Bids are due on May 24, 2017, 2:00 p.m.



One of the wood beams requiring repair, soffit vents to be painted, moss to be removed from EFS prior to painting, and concrete beam to be cleaned.



One of the soffits and vents requiring repair.



Entry area where bird netting to be installed (outlined in red). Bird spikes on top of wood beam to be removed.



Side view of Entry area where bird netting to be installed (outlined in red).



One of two BFPAs to receive enclosure. Approximate dimensions: 32"W x 27"H. Note valve box may need to be moved.



One of two BFPAs to receive enclosure. Approximate dimensions: 47"W x 8"H.



BFPA enclosure at Waipahu Civic Center. BFPA enclosures to be installed shall be of like construction.



Planter area to be filled in with concrete. Utilities to the planter shall be terminated below grade. New slab to received broom finish.



Typical, minor spall repair required



Wood soffit at drive-thru book drop



One of the control joints requiring replacement of joint sealant.