## **Technical Specifications**

Procurement for the Rehabilitation of Storm Drainage of the Main Building

Item No.				
I.	Background			
	The Engineering and Maintenance Division (EMD) of the Office of Asset Management and Support Services (OAMSS) intends to rehabilitate its existing storm drainage by improving its storm drainage system.			
	Due to deterioration of the building's storm drainage piping system the DFA main suffers flooding caused by heavy rainfall and typhoons. The project will help to me the basement and keep sensitive equipment such as transformers and power center	ninimize flooding in		
II.	Objectives			
	The Department is in need of a reputable Contractor, with experience in Government major renovation and repair projects, that will provide reliable and efficient works with the deployment of skilled manpower, materials, equipment and supervision. The project aims to:			
	<ol> <li>Give its occupants safe and convenient working environment;</li> <li>Ensure safe working conditions at the DFA premises preventing injury and loss of life;</li> <li>Comply with statutory requirements such as the National Building Code, Fire Code of the Philippines and other related codes/laws;</li> <li>Rehabilitate the building's storm drainage system;</li> <li>Protect the building's equipment located at the basement and sub-basement; and</li> <li>Prolong the DFA Building's life expectancy.</li> </ol>			
III.	Particulars	Statement of Compliance		
	Scope of works			
	<ol> <li>Provide initial inspection on site;</li> <li>Submit to OAMSS-EMD the system's initial design and technical specifications for review and approval;</li> <li>Provide shop and working drawings; program of works using Gantt chart; and bill of materials for approval of OAMSS-EMD.</li> <li>Provide all necessary tools, materials, equipment, manpower, transportation, delivery and supervision for the project;</li> <li>All works shall be done in accordance to Philippine Plumbing Code (PPC);</li> <li>Installation of sump pit systembased on approved plans;</li> <li>Install necessary electrical system for the sump pit system;</li> <li>Chipping and restoration works of pavement;</li> <li>Provide leak tests;</li> <li>Testing and commissioning of the system;</li> <li>Submit progress reports including pictures on site with before and after captions; and</li> </ol>			

12. Turn over of manuals, as-built plans, bill of quantities and other related documents. **Technical Specifications** Minimum specifications of the following items: 1. Submersible pump specifications Branded Non-clogging type (Semi-Open Impeller); Italian double mechanical seal can operate more than 8000 hours: c. Waterproof including cable; d. Fully automatic control cabinet to protect pump from electric leakage and overload; e. Application for building basement and industrial waste water drainage; Can be used for dirty and waste water drainage g. Other technical specifications: i. Power: 2.2 kW, 3 HP 220/380V; Single-phase: 60Hz ii. Voltage: Capacity: 1,033 LPM (Max) iii. Rotation: 2P/2850 P/rmp iv. Max Flow:  $70 \text{ m}^{3}/\text{h}$ v. 21 meters vi. Max Head: vii. Outlet: 75mm viii. Max Particle: 10mm: and ix. Weight: 40.2 kg. 3" Discharge: X. Motor Speed: 3450 RPM xi. Includes Float Switch xii. Direct-On-Line Controller / Magnetic Contactor includes: a. 40 Amp. Circuit breaker w/ Overload Relay b. Push button switch (On/Off) c. Pilot Light with Float switch 3. PVC Pipe series 1000, 760 mm 90° PVC Elbow series 1000, 76 mm Ø 5. 60° PVC Elbow series 1000, 76 mm Ø 6. PVC Male adaptor series 1000, 76 mm  $\varnothing$ 7. PVC Check Valve industrial PVC swing check valve, 76⊘ mm 8. Panel Board Nema with 40A, 2P, Circuit Breaker Wires: a. 8.0mm<sup>2</sup> THHN wire b. 5.5mm<sup>2</sup> THHN wire 10. Conduits a. 20 mm Ø PVC Pipe b. 20mm Ø PVC Connector c. 20mm Ø PVC Elbow 11. MIscellaneous/consumables

a. 1-½' Unistrat Channelb. 3' Unistrat Clamp

3/8" Grip Anchor d. 3/8" G.I. Full Threaded e. 3/8" G.I. Nut and Washer f. <sup>3</sup>/<sub>4</sub>' PVC Clamp g. Electrical Tape h. Solvent/PVCCement IV. **Contractor's Qualification** The Contractor shall comply with the following minimum requirements: 1. Philippine Contractors Accreditation Board (PCAB) member with license category "E" With at least 3 years' experience in private and government projects 3. PhilGEPS Red Member Manpower qualification 1. Project Manager and Safety Officer Licensed Master Plumber or equivalent at least 2-3 years experience in renovation works and as safety officer; 2. Foreman with at least 3-5 years experience in civil, plumbing and electrical works: 3. Experienced workers and helpers. V. **Contractor's Obligation** The Contractor must: 1. Supervise the entirety of the project. 2. Ensure that skilled and experienced craftsmen will undertake the works to assure first class quality, appearance and durability of the completed work. 3. Submit progress reports with photographs to OAMSS-EMD at the Contractor's expense. 4. Secure and pay the necessary permits, licenses, clearances and other documents as required by the National Building Code and other related lays, rules, and regulations, and bear all costs, duties, fees and other charges thereof. 5. Designate a licensed professional to supervise daily the work progress at the site. Assign a well-trained Safety Officer tasked to check, implement and monitors afety precautions during the project. Provide a minimum of three (3) copies each of printed and electronic copies of complete "as built" plans, bill of materials, maintenance manual and procedures as requirements for final acceptance. Provide reports, shop drawings, cost estimates and other necessary documents to be requested for any variation order to be made for as sessment, review and approval of the DFA. Teamup with OAMSS-EMD in the conduct of inspection for punch listing of work not conforming to contract specifications, if any, prior to turnover to the Department and issuance of Certificate of Acceptance.

- Provide shop drawings in one (1) electronic copy in CAD and pdf format in a USB flash disk, two (2) white print copies in A3 size drawings before starting the fabrication or installation of any work as may be required in the technical specifications and/or as instructed by DFA.
- Be solely responsible for the protection, security and safety of their personnel, third parties, equipment, installation, the public, and others
- 11. Provide trained Safety Officers in coordination with the assigned OAMSS-EMD personnel. The Contractor shall take overall responsibility on site safety. The Safety Officer shall brief the people on-site at the start of the project regarding the safety standards on site and impose all safety procedures.
- 12. Provide necessary protection, including sheet piles, barricades, sufficient warning lights, danger signals, and other signs, if needed, against harmor damage to adjacent properties, persons, shrubs, trees, lawns, structures, and utilities therein.
- 13. Ensure that the permanent connections to the local utility lines for water, drainage, electrical and sewer lines including materials, equipment, facilities, fees, and/or work are in proper working order.
- 14. Be liable for any direct or indirect loss or damage to the DFA as a result of gross negligence or wilful misconduct on the part of the Contractor, or on the part of any person or firm acting on behalf of the Contractor, in carrying the project. The Contractor shall be responsible for the repair, restoration and the charges, fees or costs incurred due to damages or loss.
- 15. Comply with and strictly observe all laws on workers' health and safety, welfare, compensation for injuries.
- 16. Solely responsible for the construction personnel's work at night, on Sundays, Holidays and Overtime shall be strictly governed by pertinent laws and regulations. Costs and expenses associated shall be paid by the Contractor and to be included in the bid offer.
- 17. Provide minimum one-year warranty against defective materials and equipment.
- 18. Submit to OAMSS, for checking, the schedule of all hardware, complete with specifications, to be purchased by the Contractor before ordering them.
- 19. Provide necessary Personal Protection Equipment (PPE) for all workers including minimum COVID-19 protocols such as face mask, face shield, vitamins and is opropyl alcohol or equivalent.
- 20. Coordinate with OAMSS-EMD for the temporary storage facility of items; Provide Storage/Sheds facilities includes the following requirements:
  - a. Provide storage and sheds for stockpiling of cement, hardware and other construction materials intended for the project;
  - b. Storage for cement shall be stored in an elevated platform and properly enclosed to protect from weather;
- 21. Remove and dispose, upon completion of work, all temporary offices, storage, bunk houses, staging, equipment, scaffoldings, paint containers, scraps and debris.
- 22. Remove paint drips, stains, oils, plaster-drop splatters on adjacent surfaces and clean the entire project site. Properly dispose of all waste at the end of the day to prevent fire hazards;

	<ul> <li>23. Include in the quotation breakdown of COVID19 related items such as face shield, face mask, COVID 19 tests and other required permits and PPE.</li> <li>24. Secure and pay the necessary securities/bonds, including the appropriate performance security upon award of contract and valid until the issuance of a Certificate of Final Acceptance, in accordance with Section 39 of RA 9184's IRR.</li> </ul>	
VII.	Warranty	
	a. The Contractor shall provide warranty, which is understood to include replacement or repair of defective Submersible pump or parts/components at no cost to the Department, after acceptance of the project, twelve (12) months for minor and electronic parts/components (motors and mechanical parts).	
	b. The Contractor shall post any allowable form of warranty security valid for at least twenty-four (24) months from the issuance of a Certificate of Final Acceptance and in the appropriate amount. The warranty security should be compliant with Section 62.2.3.3 of the RA 9184's IRR, both in terms of form and amount, but in no case shall it cover less than 10% of the total contract price.	
VIII.		
	Ownership and Confidentiality of Data	
	The Contractor shall ensure that all data and information obtained in the course of the project is strictly confidential.	
	The Contractor shall ensure that each of its personnel as signed to the Department shall execute and sign a Non-Disclosure Agreement which is to be submitted to the Department prior to the commencement of the services including period thereafter	
IX.	Deliveryschedule	
	The Contractor must:	
	<ol> <li>Submit to OAMSS list of items to be delivered including brand names and technical specifications for approval.</li> <li>Delivery will start upon issuance of certification of approval to deliver from OAMSS.</li> <li>Inform OAMSS three (3) days before delivery for issuance of Gate Pass.</li> </ol>	
VII.	Terms of Payment	
	<ol> <li>Progress billing and payment shall be as follows:</li> <li>a. 5% of the Contract Price: Upon submission of Inception Reports.</li> <li>b. 10% of Contract Price: Upon complete delivery of</li> </ol>	

- engineering design and details.
- **c.** 20% of the Contract Price: Upon delivery of construction materials.
- d. 35% of the Contract Price: Upon completion of 50% construction accomplishment and complete delivery of materials.
- **e.** 30% of the Contract Price: Upon completion and acceptance of the project.
- 2. Ten percent(10%) of the gross amount due for each of the first four (4) progress billings will be withheld by the Department as retention money.
- 3. The final payment and retention money shall be released only after the issuance of the Certificate of Final Acceptance by OAMSS, and submission by the Contractor of the required warranty security, as stated in Part VI of these Technical Specifications.
- 4. The Contractor shall be paid within thirty (30) working days upon the submission of the sales invoice, or its equivalent, certificate of completion/final acceptance, and other supporting documents to be examined by the Office of Financial Management Services-Financial Resource Management Division (OFMS FRMD). Payments shall be made through List of Due and Demandable Accounts Payable (LDDAP).
- 5. All payments shall be inclusive of all applicable taxes and other lawful charges.

## Note:

Bidders must state compliance to each of the provisions in the Terms of Reference/Technical Specifications, as well as to the Schedule of Requirements. The Statement of Compliance must be signed by the authorized representative of the Bidder, with proof of authority to sign and submit the bid for and on behalf of the Bidder concerned. If the Bidder is a joint venture, the representative must have authority to sign for and on behalf of the partners to the joint venture. All documentary requirements should be submitted on or before the deadline for the submission of bids.

Bidders must state here either "Comply" or "Not Comply" against each of the individual parameters of each Specification stating the corresponding performance parameter of the equipment offered. Statement of "Comply" or "Not Comply" must be supported by evidence in a Bidders Bid and cross-referenced to that evidence. Evidence shall be in the form of manufacturer's un-amended sales literature, unconditional statements of specification and compliance is sued by the manufacturer, samples, independent test data etc. as appropriate. A statement that is not supported by evidence or is subsequently found to be contradicted by the evidence presented will render the bid under evaluation liable for rejection. A statement either in the Bidder's statement of compliance or the supporting evidence that is found to be false either during Bid evaluation post-qualification or the execution of the Contract may be regarded as fraudulent and render the Bidder or supplier liable for prosecution subject to the provisions of ITB Clause 3.1 (a)(ii) and/or GCC Clause 2.1 (a)(ii).

Conformé;
[Signature/s]
[Name of the Bidder/Bidder's Authorized Representative/s]
[Position]