

PHILIPPINE BIDDING DOCUMENTS

Procurement of INFRASTRUCTURE PROJECTS

Government of the Republic of the Philippines

**PROPOSED INSTALLATION OF MECHANICAL,
ELECTRICAL, PLUMBING, AND FIRE PROTECTION
SYSTEM (MEPFS) AT M.I.C.E. CENTER**

**Project number:
24-00089**

**Sixth Edition
July 2020**

Preface

These Philippine Bidding Documents (PBDs) for the procurement of Infrastructure Projects (hereinafter referred to also as the “Works”) through Competitive Bidding have been prepared by the Government of the Philippines for use by all branches, agencies, departments, bureaus, offices, or instrumentalities of the government, including government-owned and/or -controlled corporations, government financial institutions, state universities and colleges, local government units, and autonomous regional government. The procedures and practices presented in this document have been developed through broad experience, and are for mandatory use in projects that are financed in whole or in part by the Government of the Philippines or any foreign government/foreign or international financing institution in accordance with the provisions of the 2016 revised Implementing Rules and Regulations (IRR) of Republic Act (RA) No. 9184.

The PBDs are intended as a model for admeasurements (unit prices or unit rates in a bill of quantities) types of contract, which are the most common in Works contracting.

The Bidding Documents shall clearly and adequately define, among others: (i) the objectives, scope, and expected outputs and/or results of the proposed contract; (ii) the eligibility requirements of Bidders; (iii) the expected contract duration; and (iv) the obligations, duties, and/or functions of the winning Bidder.

Care should be taken to check the relevance of the provisions of the PBDs against the requirements of the specific Works to be procured. If duplication of a subject is inevitable in other sections of the document prepared by the Procuring Entity, care must be exercised to avoid contradictions between clauses dealing with the same matter.

Moreover, each section is prepared with notes intended only as information for the Procuring Entity or the person drafting the Bidding Documents. They shall not be included in the final documents. The following general directions should be observed when using the documents:

- a. All the documents listed in the Table of Contents are normally required for the procurement of Infrastructure Projects. However, they should be adapted as necessary to the circumstances of the particular Project.
- b. Specific details, such as the “*name of the Procuring Entity*” and “*address for bid submission*,” should be furnished in the Instructions to Bidders, Bid Data Sheet, and Special Conditions of Contract. The final documents should contain neither blank spaces nor options.
- c. This Preface and the footnotes or notes in italics included in the Invitation to Bid, BDS, General Conditions of Contract, Special Conditions of Contract, Specifications, Drawings, and Bill of Quantities are not part of the text of the final document, although they contain instructions that the Procuring Entity should strictly follow.
- d. The cover should be modified as required to identify the Bidding Documents as to the names of the Project, Contract, and Procuring Entity, in addition to date of issue.

- e. Modifications for specific Procurement Project details should be provided in the Special Conditions of Contract as amendments to the Conditions of Contract. For easy completion, whenever reference has to be made to specific clauses in the Bid Data Sheet or Special Conditions of Contract, these terms shall be printed in bold typeface on Sections I (Instructions to Bidders) and III (General Conditions of Contract), respectively.
- f. For guidelines on the use of Bidding Forms and the procurement of Foreign-Assisted Projects, these will be covered by a separate issuance of the Government Procurement Policy Board.

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Glossary of Terms, Abbreviations, and Acronyms

ABC – Approved Budget for the Contract.

ARCC – Allowable Range of Contract Cost.

BAC – Bids and Awards Committee.

Bid – A signed offer or proposal to undertake a contract submitted by a bidder in response to and in consonance with the requirements of the bidding documents. Also referred to as *Proposal* and *Tender*. (2016 revised IRR, Section 5[c])

Bidder – Refers to a contractor, manufacturer, supplier, distributor and/or consultant who submits a bid in response to the requirements of the Bidding Documents. (2016 revised IRR, Section 5[d])

Bidding Documents – The documents issued by the Procuring Entity as the bases for bids, furnishing all information necessary for a prospective bidder to prepare a bid for the Goods, Infrastructure Projects, and/or Consulting Services required by the Procuring Entity. (2016 revised IRR, Section 5[e])

BIR – Bureau of Internal Revenue.

BSP – Bangko Sentral ng Pilipinas.

CDA – Cooperative Development Authority.

Consulting Services – Refer to services for Infrastructure Projects and other types of projects or activities of the GOP requiring adequate external technical and professional expertise that are beyond the capability and/or capacity of the GOP to undertake such as, but not limited to: (i) advisory and review services; (ii) pre-investment or feasibility studies; (iii) design; (iv) construction supervision; (v) management and related services; and (vi) other technical services or special studies. (2016 revised IRR, Section 5[i])

Contract – Refers to the agreement entered into between the Procuring Entity and the Supplier or Manufacturer or Distributor or Service Provider for procurement of Goods and Services; Contractor for Procurement of Infrastructure Projects; or Consultant or Consulting Firm for Procurement of Consulting Services; as the case may be, as recorded in the Contract Form signed by the parties, including all attachments and appendices thereto and all documents incorporated by reference therein.

Contractor – is a natural or juridical entity whose proposal was accepted by the Procuring Entity and to whom the Contract to execute the Work was awarded. Contractor as used in these Bidding Documents may likewise refer to a supplier, distributor, manufacturer, or consultant.

CPI – Consumer Price Index.

DOLE – Department of Labor and Employment.

DTI – Department of Trade and Industry.

Foreign-funded Procurement or Foreign-Assisted Project – Refers to procurement whose funding source is from a foreign government, foreign or international financing institution as specified in the Treaty or International or Executive Agreement. (2016 revised IRR, Section 5[b]).

GFI – Government Financial Institution.

GOCC – Government-owned and/or –controlled corporation.

Goods – Refer to all items, supplies, materials and general support services, except Consulting Services and Infrastructure Projects, which may be needed in the transaction of public businesses or in the pursuit of any government undertaking, project or activity, whether in the nature of equipment, furniture, stationery, materials for construction, or personal property of any kind, including non-personal or contractual services such as the repair and maintenance of equipment and furniture, as well as trucking, hauling, janitorial, security, and related or analogous services, as well as procurement of materials and supplies provided by the Procuring Entity for such services. The term “related” or “analogous services” shall include, but is not limited to, lease or purchase of office space, media advertisements, health maintenance services, and other services essential to the operation of the Procuring Entity. (2016 revised IRR, Section 5[r])

GOP – Government of the Philippines.

Infrastructure Projects – Include the construction, improvement, rehabilitation, demolition, repair, restoration or maintenance of roads and bridges, railways, airports, seaports, communication facilities, civil works components of information technology projects, irrigation, flood control and drainage, water supply, sanitation, sewerage and solid waste management systems, shore protection, energy/power and electrification facilities, national buildings, school buildings, hospital buildings, and other related construction projects of the government. Also referred to as *civil works or works*. (2016 revised IRR, Section 5[u])

LGUs – Local Government Units.

NFCC – Net Financial Contracting Capacity.

NGA – National Government Agency.

PCAB – Philippine Contractors Accreditation Board.

PhilGEPS - Philippine Government Electronic Procurement System.

Procurement Project – refers to a specific or identified procurement covering goods, infrastructure project or consulting services. A Procurement Project shall be described, detailed, and scheduled in the Project Procurement Management Plan prepared by the agency which shall be consolidated in the procuring entity's Annual Procurement Plan. (GPPB Circular No. 06-2019 dated 17 July 2019)

PSA – Philippine Statistics Authority.

SEC – Securities and Exchange Commission.

SLCC – Single Largest Completed Contract.

UN – United Nations.

Section I. Invitation to Bid

Notes on the Invitation to Bid

The Invitation to Bid (IB) provides information that enables potential Bidders to decide whether to participate in the procurement at hand. The IB shall be posted in accordance with Section 21.2 of the 2016 revised IRR of RA No. 9184.

Apart from the essential items listed in the Bidding Documents, the IB should also indicate the following:

- a. The date of availability of the Bidding Documents, which shall be from the time the IB is first advertised/posted until the deadline for the submission and receipt of bids;
- b. The place where the Bidding Documents may be acquired or the website where it may be downloaded;
- c. The deadline for the submission and receipt of bids; and
- d. Any important bid evaluation criteria.

The IB should be incorporated into the Bidding Documents. The information contained in the IB must conform to the Bidding Documents and in particular to the relevant information in the Bid Data Sheet.



REPUBLIC OF THE PHILIPPINES
QUEZON CITY GOVERNMENT

BIDS AND AWARDS COMMITTEE FOR INFRASTRUCTURE & CONSULTANCY

2nd floor, Finance Building, Procurement Department, Quezon City Hall Complex, Elliptical Road, Quezon City



July 23, 2024

Invitation to Bid

No.	Project No.	Project Name	Location	Amount	Duration Cal. Days	Office	Source Fund
<u>Building – Small B</u>							
1	24-00071	Proposed Upgrading of Waterline System and Rehabilitation of Comfort Rooms at Don Quintin Paredes High School	Quirino 2-B	1,961,350.80	120	Engineering Department	Special Education Fund (Local School Board)
2	24-00072	Proposed Upgrading of Waterline System and Rehabilitation of Comfort Rooms at Camarilla Elementary School	San Roque	3,414,099.96	120	Engineering Department	Special Education Fund (Local School Board)
3	24-00073	Proposed Rehabilitation of Youth Development Office at 7th Floor Civic Center Building A	Central	4,557,947.65	90	Engineering Department	Engineering
4	24-00074	Proposed Upgrading of Waterline System and Rehabilitation of Comfort Rooms at Aguinaldo Elementary School in Barangay San Roque	San Roque	6,557,365.27	150	Engineering Department	Special Education Fund (Local School Board)
5	24-00075	Proposed Rehabilitation of Multi-Purpose Building at Holy Spirit Barangay Complex	Holy Spirit	6,671,860.84	90	Engineering Department	20% Community Development Fund
6	24-00076	Proposed Upgrading of Waterline System and Rehabilitation of Comfort Rooms at Culiati High School in Barangay Culiati	Culiati	8,437,798.40	90	Engineering Department	Special Education Fund (Local School Board)
7	24-00077	Proposed Rehabilitation of Maclang Dialysis Clinic at Rosario Maclang Bautista General Hospital	Batasan Hills	8,530,829.81	120	Engineering Department	20% Community Development Fund
8	24-00078	Proposed Upgrading of Waterline System and Rehabilitation of Comfort Rooms at Juan Sumulong High School	San Roque	9,935,119.32	150	Engineering Department	Special Education Fund (Local School Board)
9	24-00079	Proposed Rehabilitation of QC Citizen Services Department at 14th Floor High Rise Building	Central	10,824,613.48	120	Engineering Department	Engineering – Continuing
10	24-00080	Proposed Rehabilitation of Comfort Rooms and Upgrading of Waterline System at Project 3 Elementary School	Duyan-Duyan	11,087,908.73	150	Engineering Department	Special Education Fund (Local School Board)
11	24-00081	Proposed Upgrading of Waterline System and Rehabilitation of Comfort Rooms at Culiati Elementary School in Barangay Culiati	Culiati	11,308,289.35	120	Engineering Department	Special Education Fund (Local School Board)

12	24-00082	Proposed Upgrading of Waterline System and Rehabilitation of Comfort Rooms at Balara Elementary School in Barangay Pansol	Pansol	17,249,724.10	150	Engineering Department	Special Education Fund (Local School Board)
13	24-00083	Proposed Construction of E-Vehicle Charging Stations at Quezon City Hall Compound	Central	22,883,314.41	120	Engineering Department	20% Community Development Fund - Continuing
14	24-00084	Proposed Rehabilitation of Three Storey Civic Center Building at Lagro Subdivision in Barangay Greater Lagro	Greater Lagro	26,973,817.17	180	Engineering Department	Engineering - Continuing

Building – Medium A

15	24-00085	Proposed Construction of Two (2) Storey with Deck Multi-Purpose Building (Senior Citizen, and Gathering Area) at Villilia Village, Brgy. Talipapa	Talipapa	30,740,164.41	210	Engineering Department	20% Community Development Fund
16	24-00086	Proposed Construction of Three (3) Storey with Deck Roxas Multi-Purpose Building at Barangay Roxas	Roxas	49,495,484.94	210	Engineering Department	20% Community Development Fund
17	24-00087	Proposed Construction of Catwalk and Watchtower including Appurtenances at Bureau of Jail Management and Penology (BJMP) Compound	Bagong Silangan	51,250,926.05	240	Engineering Department	Engineering
18	24-00088	Proposed Rehabilitation of Basement to Fourth Floor (Offices) Civic Center Building B at Quezon City Hall Compound	Central	69,561,520.18	270	Engineering Department	Engineering

Building – Large B

19	24-00089	Proposed Installation of Mechanical, Electrical, Plumbing, and Fire Protection System (MEPFS) at M.I.C.E. Center	Central	533,508,790.60	300	Engineering Department	Engineering
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Communication Facilities – Small B

20	24-00090	Proposed Enhanced Surveillance System Using Fiber Optic Cable Technology at U.P. Village and Barangay Hall Complex, Barangay U.P. Village	U.P. Village	10,387,429.60	90	Engineering Department	Engineering
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Electrical Work – Small B

21	24-00091	Quezon City Hall Solar PV Rehabilitation and Restoration in Civic Center Building E	Central	8,067,740.87	120	Engineering Department	Trust Fund
22	24-00092	Proposed Installation of Solar Power System at Quezon City General Hospital	Bahay Toro	21,807,334.21	150	Engineering Department	Trust Fund
23	24-00093	Proposed Installation of Streetlights in Barangay Krus Na Ligas, Pinyahan and Kamuning	Krus Na Ligas, Pinyahan and Kamuning	24,842,287.46	150	Engineering Department	20% Community Development Fund

<u>Flood Control – Medium A</u>							
24	24-00094	Proposed Rehabilitation of Retaining Wall along Magnolia Street at Spring Country Subdivision in Barangay Bagong Silangan	Bagong Silangan	49,061,995.55	210	Engineering Department	20% Community Development Fund
<u>Road – Small B</u>							
25	24-00095	Proposed Rehabilitation of Road and Drainage at Bansalangan Street (Tanguile Street to Acacia Street), Parkwood Hills Subdivision in Barangay Bagong Silangan	Bagong Silangan	6,823,382.31	60	Engineering Department	20% Community Development Fund
26	24-00096	Proposed Rehabilitation of Road and Drainage at Yakal Street (Anahaw Street to Kaymito Street), Parkwood Hills Subdivision in Barangay Bagong Silangan	Bagong Silangan	16,964,861.62	90	Engineering Department	20% Community Development Fund
27	24-00097	Proposed Rehabilitation of Road and Drainage at Anahaw Street (Tanguile Street to Golden Shower Street), Parkwood Hills Subdivision in Barangay Bagong Silangan	Bagong Silangan	21,157,781.87	90	Engineering Department	20% Community Development Fund

1. The **QUEZON CITY LOCAL GOVERNMENT**, through *funding source of various years* intends to apply the sum stated above being the Approved Budget for the Contract (ABC) to payments under the contract *for the above stated Projects*. Bids received in excess of the ABC shall be automatically rejected at bid opening.
2. The **QUEZON CITY LOCAL GOVERNMENT** now invites bids for the above Procurement Project. Completion of the Works is required *as stated above*. Bidders should have completed a contract similar to the Project. The description of an eligible bidder is contained in the Bidding Documents, particularly, in Section II (Instructions to Bidders).
3. Bidding will be conducted through open competitive bidding procedures using non-discretionary “*pass/fail*” criterion as specified in the 2016 revised Implementing Rules and Regulations (IRR) of Republic Act (RA) No. 9184.
4. Interested bidders may obtain further information from **QUEZON CITY LOCAL GOVERNMENT – BAC Secretariat** and inspect the Bidding Documents at the address given below *weekdays from 8:00 am. – 5:00 p.m.*
5. A complete set of Bidding Documents may be acquired by interested bidders on **24 July 2024 (Wednesday)** from given address and website/s below *and upon payment of a non-refundable fee for the Bidding Documents, pursuant to the latest Guidelines issued by the GPPB*. The Procuring Entity shall allow the bidder to present its proof of payment for the fees *presented in person*.

STANDARD RATES:

Approved Budget for the Contract	Maximum Cost of Bidding Documents (in Philippine Peso)
More than 500,000 up to 1 Million	1,000.00
More than 1 Million up to 5 Million	5,000.00
More than 5 Million up to 10 Million	10,000.00
More than 10 Million up to 50 Million	25,000.00
More than 50 Million up to 500 Million	50,000.00
More than 500 Million	75,000.00

The following are the requirements for purchase of Bidding Documents;

1. PhilGEPS Registration Certificate (Platinum – 3 Pages)

2. Document Request List (DRL)
3. Authorization to purchase bidding documents
 - 3.1 Secretary's Certificate (for corporation)
 - 3.2 Special Power of Attorney (for sole proprietorship)
4. Notarized Joint Venture Agreement (if applicable)
5. Letter of Intent

It must be duly received by the BAC Secretariat at 2nd Floor, Procurement Department, Finance Building, Quezon City Hall Compound.

6. The **QC- BAC- INFRASTRUCTURE & CONSULTANCY** will hold a Pre-Bid Conference¹ on **August 2, 2024 at 10:00 AM at 2nd Floor, Procurement Department-Bidding Room, Finance Building, Quezon City Hall Compound** or we encourage the prospective bidders to join through our **Virtual Conference (ZOOM APP)** which shall be open to prospective bidders.

Virtual Conference (ZOOM APP)

Meeting ID: 854 9489 0133

Password: 273320

7. Bids must be duly received by the BAC Secretariat through manual submission at the office address as indicated below, on or before **August 15, 2024 – 9:00 AM**. Late bids shall not be accepted.
8. All bids must be accompanied by a bid security in any of the acceptable forms and in the amount stated in **ITB Clause 16**.
9. Bid opening shall be on **August 15, 2024 - 10:00 AM at 2nd Floor, Procurement Department-Bidding Room, Finance Building, Quezon City Hall Compound** and/or via Zoom. Bids will be opened in the presence of the bidders' representatives who choose to attend the activity.

Virtual Conference (ZOOM APP)

Meeting ID: 810 3646 5257

Password: 201522

10. The **Quezon City Local Government** reserves the right to reject any and all bids, declare a failure of bidding, or not award the contract at any time prior to contract award in accordance with Sections 35.6 and 41 of the 2016 revised Implementing Rules and Regulations (IRR) of RA No. 9184, without thereby incurring any liability to the affected bidder or bidders.
11. For further information, please refer to:

ATTY. DOMINIC B. GARCIA

OIC, Procurement Department
 2nd Floor, Procurement Department,
 Finance Building, Quezon City Hall Compound
 Elliptical Road, Barangay Central Diliman, Quezon City.
 Tel. No. (02)8988-4242 loc. 8506/8710
 Email Add: bacinfra.procurement@quezoncity.gov.ph
 Website: www.quezoncity.gov.ph

12. You may visit the following websites:

For downloading of Bidding Documents: <https://quezoncity.gov.ph/public-notice/procurement/>

By:


ARCH. LUCILLE H. CHUA, fuap, piep
 Chairperson, BAC-Infra and Consultancy

¹ May be deleted in case the ABC is less than One Million Pesos (PhP1,000,000) where the Procuring Entity may not hold a pre-bid conference.

Section II. Instructions to Bidders

Notes on the Instructions to Bidders

This Section on the Instruction to Bidders (ITB) provides the information necessary for bidders to prepare responsive bids, in accordance with the requirements of the Procuring Entity. It also provides information on bid submission, eligibility check, opening and evaluation of bids, post-qualification, and on the award of contract.

1. Scope of Bid

The Procuring Entity, **Quezon City Government** invites Bids for the **PROPOSED INSTALLATION OF MECHANICAL, ELECTRICAL, PLUMBING, AND FIRE PROTECTION SYSTEM (MEPFS) AT M.I.C.E. CENTER**, with Project Identification Number **24-00089**.

[Note: The Project Identification Number is assigned by the Procuring Entity based on its own coding scheme and is not the same as the PhilGEPS reference number which is generated after the posting of the bid opportunity on the PhilGEPS website.]

The Procurement Project (referred to herein as “Project”) is for the construction of Works, as described in Section VI (Specifications).

2. Funding Information

2.1. The GOP through the source of funding as indicated below for **2024** in the amount of **Five Hundred Thirty-Three Million Five Hundred Eight Thousand Seven Hundred Ninety Pesos and 60/100 Cts. (P 533,508,790.60)**.

2.2. The source of funding is:

a. LGUs, the Annual or Supplemental Budget, as approved by the Sanggunian.

3. Bidding Requirements

The Bidding for the Project shall be governed by all the provisions of RA No. 9184 and its 2016 revised IRR, including its Generic Procurement Manual and associated policies, rules and regulations as the primary source thereof, while the herein clauses shall serve as the secondary source thereof.

Any amendments made to the IRR and other GPPB issuances shall be applicable only to the ongoing posting, advertisement, or invitation to bid by the BAC through the issuance of a supplemental or bid bulletin.

The Bidder, by the act of submitting its Bid, shall be deemed to have inspected the site, determined the general characteristics of the contracted Works and the conditions for this Project, such as the location and the nature of the work; (b) climatic conditions; (c) transportation facilities; (c) nature and condition of the terrain, geological conditions at the site communication facilities, requirements, location and availability of construction aggregates and other materials, labor, water, electric power and access roads; and (d) other factors that may affect the cost, duration and execution or implementation of the contract, project, or work and examine all instructions, forms, terms, and project requirements in the Bidding Documents.

4. Corrupt, Fraudulent, Collusive, Coercive, and Obstructive Practices

The Procuring Entity, as well as the Bidders and Contractors, shall observe the highest standard of ethics during the procurement and execution of the contract. They or through an agent shall not engage in corrupt, fraudulent, collusive, coercive, and obstructive practices defined under Annex “I” of the 2016 revised IRR of RA No. 9184 or other integrity violations in competing for the Project.

5. Eligible Bidders

- 5.1. Only Bids of Bidders found to be legally, technically, and financially capable will be evaluated.
- 5.2. The Bidder must have an experience of having completed a Single Largest Completed Contract (SLCC) that is similar to this Project, equivalent to at least fifty percent (50%) of the ABC adjusted, if necessary, by the Bidder to current prices using the PSA’s CPI, except under conditions provided for in Section 23.4.2.4 of the 2016 revised IRR of RA No. 9184.

A contract is considered to be “similar” to the contract to be bid if it has the major categories of work stated in the **BDS**.

- 5.3. For Foreign-funded Procurement, the Procuring Entity and the foreign government/foreign or international financing institution may agree on another track record requirement, as specified in the Bidding Document prepared for this purpose.
- 5.4. The Bidders shall comply with the eligibility criteria under Section 23.4.2 of the 2016 IRR of RA No. 9184.

6. Origin of Associated Goods

There is no restriction on the origin of Goods other than those prohibited by a decision of the UN Security Council taken under Chapter VII of the Charter of the UN.

7. Subcontracts

- 7.1. The Bidder may subcontract portions of the Project to the extent allowed by the Procuring Entity as stated herein, but in no case more than fifty percent (50%) of the Project.

The Procuring Entity has prescribed that:

a. Subcontracting is not allowed.

- 7.1. *[If Procuring Entity has determined that subcontracting is allowed during the bidding , state:]* The Bidder must submit together with its Bid the documentary requirements of the subcontractor(s) complying with the eligibility criterial stated in **ITB** Clause 5 in accordance with Section 23.4 of the 2016 revised IRR of RA No. 9184 pursuant to Section 23.1 thereof.

- 7.2. *[If subcontracting is allowed during the contract implementation stage, state:]*
The Supplier may identify its subcontractor during the contract implementation stage. Subcontractors identified during the bidding may be changed during the implementation of this Contract. Subcontractors must submit the documentary requirements under Section 23.1 of the 2016 revised IRR of RA No. 9184 and comply with the eligibility criteria specified in **ITB** Clause 5 to the implementing or end-user unit.
- 7.3. Subcontracting of any portion of the Project does not relieve the Contractor of any liability or obligation under the Contract. The Supplier will be responsible for the acts, defaults, and negligence of any subcontractor, its agents, servants, or workmen as fully as if these were the Contractor's own acts, defaults, or negligence, or those of its agents, servants, or workmen.

8. Pre-Bid Conference

The Procuring Entity will hold a pre-bid conference for this Project on the specified date and time and either at its physical address on **August 02, 2024 at 10:00 AM at 2nd Floor, Procurement Department-Bidding Room, Finance Building, Quezon City Hall Compound** and/or we encourage the prospective bidders to join through our Virtual Conference (ZOOM APP) Meeting ID: 854 9489 0133 Password: 273320

9. Clarification and Amendment of Bidding Documents

Prospective bidders may request for clarification on and/or interpretation of any part of the Bidding Documents. Such requests must be in writing and received by the Procuring Entity, either at its given address or through electronic mail indicated in the **IB**, at least ten (10) calendar days before the deadline set for the submission and receipt of Bids.

10. Documents Comprising the Bid: Eligibility and Technical Components

- 10.1. The first envelope shall contain the eligibility and technical documents of the Bid as specified in **Section IX. Checklist of Technical and Financial Documents**.
- 10.2. If the eligibility requirements or statements, the bids, and all other documents for submission to the BAC are in foreign language other than English, it must be accompanied by a translation in English, which shall be authenticated by the appropriate Philippine foreign service establishment, post, or the equivalent office having jurisdiction over the foreign bidder's affairs in the Philippines. For Contracting Parties to the Apostille Convention, only the translated documents shall be authenticated through an apostille pursuant to GPPB Resolution No. 13-2019 dated 23 May 2019. The English translation shall govern, for purposes of interpretation of the bid.
- 10.3. A valid PCAB License is required, and in case of joint ventures, a valid special PCAB License, and registration for the type and cost of the contract for this

Project. Any additional type of Contractor license or permit shall be indicated in the **BDS**.

- 10.4. A List of Contractor's key personnel (e.g., Project Manager, Project Engineers, Materials Engineers, and Foremen) assigned to the contract to be bid, with their complete qualification and experience data shall be provided. These key personnel must meet the required minimum years of experience set in the **BDS**.
- 10.5. A List of Contractor's major equipment units, which are owned, leased, and/or under purchase agreements, supported by proof of ownership, certification of availability of equipment from the equipment lessor/vendor for the duration of the project, as the case may be, must meet the minimum requirements for the contract set in the **BDS**.

11. Documents Comprising the Bid: Financial Component

- 11.1. The second bid envelope shall contain the financial documents for the Bid as specified in **Section IX. Checklist of Technical and Financial Documents**.
- 11.2. Any bid exceeding the ABC indicated in paragraph 1 of the **IB** shall not be accepted.
- 11.3. For Foreign-funded procurement, a ceiling may be applied to bid prices provided the conditions are met under Section 31.2 of the 2016 revised IRR of RA No. 9184.

12. Alternative Bids

Bidders shall submit offers that comply with the requirements of the Bidding Documents, including the basic technical design as indicated in the drawings and specifications. Unless there is a value engineering clause in the **BDS**, alternative Bids shall not be accepted.

13. Bid Prices

All bid prices for the given scope of work in the Project as awarded shall be considered as fixed prices, and therefore not subject to price escalation during contract implementation, except under extraordinary circumstances as determined by the NEDA and approved by the GPPB pursuant to the revised Guidelines for Contract Price Escalation guidelines.

14. Bid and Payment Currencies

- 14.1. Bid prices may be quoted in the local currency or tradeable currency accepted by the BSP at the discretion of the Bidder. However, for purposes of bid evaluation, Bids denominated in foreign currencies shall be converted to Philippine currency based on the exchange rate as published in the BSP reference rate bulletin on the day of the bid opening.

14.2. *Payment of the contract price shall be made in:*

a. Philippine Pesos.

15. Bid Security

15.1. The Bidder shall submit a Bid Securing Declaration or any form of Bid Security in the amount indicated in the **BDS**, which shall be not less than the percentage of the ABC in accordance with the schedule in the **BDS**.

15.2. The Bid and bid security **in no case shall exceed One Hundred Twenty (120) calendar days from the date of opening of bids, unless duly extended by the bidder upon the request of the Head of the Procuring Entity (HoPE) of the Quezon City Local Government**. Any bid not accompanied by an acceptable bid security shall be rejected by the Procuring Entity as non-responsive.

16. Sealing and Marking of Bids

Each Bidder shall submit one copy of the first and second components of its Bid.

The Procuring Entity may request additional hard copies and/or electronic copies of the Bid. However, failure of the Bidders to comply with the said request shall not be a ground for disqualification.

If the Procuring Entity allows the submission of bids through online submission to the given website or any other electronic means, the Bidder shall submit an electronic copy of its Bid, which must be digitally signed. An electronic copy that cannot be opened or is corrupted shall be considered non-responsive and, thus, automatically disqualified.

17. Deadline for Submission of Bids

The Bidders shall submit on the specified date and time and either at its physical address or through online submission as indicated in paragraph 5 of the **IB**.

18. Opening and Preliminary Examination of Bids

18.1. The BAC shall open the Bids in public at the time, on the date, and at the place specified in paragraph 9 of the **IB**. The Bidders' representatives who are present shall sign a register evidencing their attendance. In case videoconferencing, webcasting or other similar technologies will be used, attendance of participants shall likewise be recorded by the BAC Secretariat.

In case the Bids cannot be opened as scheduled due to justifiable reasons, the rescheduling requirements under Section 29 of the 2016 revised IRR of RA No. 9184 shall prevail.

18.2. The preliminary examination of Bids shall be governed by Section 30 of the 2016 revised IRR of RA No. 9184.

19. Detailed Evaluation and Comparison of Bids

- 19.1. The Procuring Entity's BAC shall immediately conduct a detailed evaluation of all Bids rated "*passed*" using non-discretionary pass/fail criteria. The BAC shall consider the conditions in the evaluation of Bids under Section 32.2 of 2016 revised IRR of RA No. 9184.
- 19.2. If the Project allows partial bids, all Bids and combinations of Bids as indicated in the **BDS** shall be received by the same deadline and opened and evaluated simultaneously so as to determine the Bid or combination of Bids offering the lowest calculated cost to the Procuring Entity. Bid Security as required by **ITB** Clause 15 shall be submitted for each contract (lot) separately.
- 19.3. In all cases, the NFCC computation pursuant to Section 23.4.2.6 of the 2016 revised IRR of RA No. 9184 must be sufficient for the total of the ABCs for all the lots participated in by the prospective Bidder.

20. Post Qualification

Within a non-extendible period of five (5) calendar days from receipt by the Bidder of the notice from the BAC that it submitted the Lowest Calculated Bid, the Bidder shall submit its latest income and business tax returns filed and paid through the BIR Electronic Filing and Payment System (eFPS), and other appropriate licenses and permits required by law and stated in the **BDS**.

21. Signing of the Contract

The documents required in Section 37.2 of the 2016 revised IRR of RA No. 9184 shall form part of the Contract. Additional Contract documents are indicated in the **BDS**.

Section III. Bid Data Sheet

Notes on the Bid Data Sheet (BDS)

The Bid Data Sheet (BDS) consists of provisions that supplement, amend, or specify in detail, information, or requirements included in the ITB found in Section II, which are specific to each procurement.

This Section is intended to assist the Procuring Entity in providing the specific information in relation to corresponding clauses in the ITB and has to be prepared for each specific procurement.

The Procuring Entity should specify in the BDS information and requirements specific to the circumstances of the Procuring Entity, the processing of the procurement, and the bid evaluation criteria that will apply to the Bids. In preparing the BDS, the following aspects should be checked:

- a. Information that specifies and complements provisions of the ITB must be incorporated.
- b. Amendments and/or supplements, if any, to provisions of the ITB as necessitated by the circumstances of the specific procurement, must also be incorporated.

Bid Data Sheet

ITB Clause																																									
5.2	For this purpose, similar contracts shall refer to contracts which have the same major categories of work.																																								
7.1	Subcontracting is not allowed.																																								
10.3	<i>No additional contractor license or permit is required</i> <i>In addition, eligible bidders shall qualify or comply with the following:</i> 1. Bidders with valid Philippine Contractors Accreditation Board (PCAB) Type Building - Large B																																								
10.4	<table><tr><td colspan="4">The minimum work experience requirements for key personnel are the following:</td></tr><tr><td>Qty.</td><td>Key Personnel</td><td>General Experience</td><td>Relevant Experience</td></tr><tr><td>1</td><td>Project Manager</td><td>3 years</td><td>3 years</td></tr><tr><td>1</td><td>Project-in-Charge (Project Engineer)</td><td>3 years</td><td>3 years</td></tr><tr><td>1</td><td>General Foreman</td><td>3 years</td><td>3 years</td></tr><tr><td>1</td><td>Trade Engineers/Leadman for Electrical Works</td><td>3 years</td><td>3 years</td></tr><tr><td>1</td><td>Trade Engineers/Leadman for Mechanical Works</td><td>3 years</td><td>3 years</td></tr><tr><td>1</td><td>Safety Officer</td><td>3 years</td><td>3 years</td></tr><tr><td>1</td><td>DPWH duly accredited Materials/QA/QC Engineer</td><td>3 years</td><td>3 years</td></tr><tr><td>1</td><td>Cost Engineer/Project Scheduler</td><td>3 years</td><td>3 years</td></tr></table> <i>In addition, the bidder must execute an affidavit of undertaking duly notarized stating that the foregoing personnel shall perform work exclusively for the project until its completion. Please see attached bid forms.</i>	The minimum work experience requirements for key personnel are the following:				Qty.	Key Personnel	General Experience	Relevant Experience	1	Project Manager	3 years	3 years	1	Project-in-Charge (Project Engineer)	3 years	3 years	1	General Foreman	3 years	3 years	1	Trade Engineers/Leadman for Electrical Works	3 years	3 years	1	Trade Engineers/Leadman for Mechanical Works	3 years	3 years	1	Safety Officer	3 years	3 years	1	DPWH duly accredited Materials/QA/QC Engineer	3 years	3 years	1	Cost Engineer/Project Scheduler	3 years	3 years
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10.5	<table><tr><td colspan="3">The minimum major equipment requirements are the following:</td></tr><tr><td>Equipment</td><td>Capacity</td><td>Number of Units</td></tr><tr><td>Chipping Gun</td><td></td><td>1</td></tr><tr><td>Metal Cutting Saw</td><td></td><td>1</td></tr><tr><td>Welding Machine</td><td>500A</td><td>1</td></tr><tr><td>Cutting outfit</td><td></td><td>1</td></tr><tr><td>Dump Truck</td><td>12cu.yd.</td><td>1</td></tr><tr><td>Truck Mounted Crane</td><td>(20-25 mT, 200HP)</td><td>1</td></tr></table>	The minimum major equipment requirements are the following:			Equipment	Capacity	Number of Units	Chipping Gun		1	Metal Cutting Saw		1	Welding Machine	500A	1	Cutting outfit		1	Dump Truck	12cu.yd.	1	Truck Mounted Crane	(20-25 mT, 200HP)	1																
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	<i>In addition, the bidder must execute an affidavit of undertaking duly notarized stating that the foregoing equipment shall be used exclusively for the project until its completion. Please see attached bid forms.</i>
12	<i>[Insert Value Engineering clause if allowed.]</i>
15.1	<p>The bid security shall be in the form of a Bid Securing Declaration with project number, or any of the following forms and amounts:</p> <ul style="list-style-type: none"> a) The amount of not less than Php 10,670,175.81 or equivalent to two percent (2%) of ABC if bid security is in cash, cashier's/manager's check, bank draft/guarantee or irrevocable letter of credit; or b) The amount of not less than Php 26,675,439.53 or equivalent to five percent (5%) of ABC if bid security is in Surety Bond.
19.2	Partial bid is not allowed. The infrastructure project is packaged in a single lot and the lot shall not be divided into sub-lots for the purpose of bidding, evaluation, and contract award.
20	No additional requirement.
21	<p>Additional Contract Documents relevant to the Project as required:</p> <ol style="list-style-type: none"> 1. Construction Schedule and S-curve, 2. Manpower Schedule, 3. Construction Methods, 4. Equipment Utilization Schedule, 5. PERT/CPM or other acceptable tools of project scheduling, shall be included in the submission of Technical Proposal.

Section IV. General Conditions of Contract

Notes on the General Conditions of Contract

The General Conditions of Contract (GCC) in this Section, read in conjunction with the Special Conditions of Contract in Section V and other documents listed therein, should be a complete document expressing all the rights and obligations of the parties.

Matters governing performance of the Contractor, payments under the contract, or matters affecting the risks, rights, and obligations of the parties under the contract are included in the GCC and Special Conditions of Contract.

Any complementary information, which may be needed, shall be introduced only through the Special Conditions of Contract.

1. Scope of Contract

This Contract shall include all such items, although not specifically mentioned, that can be reasonably inferred as being required for its completion as if such items were expressly mentioned herein. All the provisions of RA No. 9184 and its 2016 revised IRR, including the Generic Procurement Manual, and associated issuances, constitute the primary source for the terms and conditions of the Contract, and thus, applicable in contract implementation. Herein clauses shall serve as the secondary source for the terms and conditions of the Contract.

This is without prejudice to Sections 74.1 and 74.2 of the 2016 revised IRR of RA No. 9184 allowing the GPPB to amend the IRR, which shall be applied to all procurement activities, the advertisement, posting, or invitation of which were issued after the effectivity of the said amendment.

2. Sectional Completion of Works

If sectional completion is specified in the **Special Conditions of Contract (SCC)**, references in the Conditions of Contract to the Works, the Completion Date, and the Intended Completion Date shall apply to any Section of the Works (other than references to the Completion Date and Intended Completion Date for the whole of the Works).

3. Possession of Site

3.1 The Procuring Entity shall give possession of all or parts of the Site to the Contractor based on the schedule of delivery indicated in the **SCC**, which corresponds to the execution of the Works. If the Contractor suffers delay or incurs cost from failure on the part of the Procuring Entity to give possession in accordance with the terms of this clause, the Procuring Entity's Representative shall give the Contractor a Contract Time Extension and certify such sum as fair to cover the cost incurred, which sum shall be paid by Procuring Entity.

3.2 If possession of a portion is not given by the above date, the Procuring Entity will be deemed to have delayed the start of the relevant activities. The resulting adjustments in contract time to address such delay may be addressed through contract extension provided under Annex "E" of the 2016 revised IRR of RA No. 9184.

4. The Contractor's Obligations

The Contractor shall employ the key personnel named in the Schedule of Key Personnel indicating their designation, in accordance with **ITB** Clause 10.3 and specified in the **BDS**, to carry out the supervision of the Works.

The Procuring Entity will approve any proposed replacement of key personnel only if their relevant qualifications and abilities are equal to or better than those of the personnel listed in the Schedule.

5. Performance Security

- 5.1. Within ten (10) calendar days from receipt of the Notice of Award from the Procuring Entity but in no case later than the signing of the contract by both parties, the successful Bidder shall furnish the performance security in any of the forms prescribed in Section 39 of the 2016 revised IRR.
- 5.2. The Contractor, by entering into the Contract with the Procuring Entity, acknowledges the right of the Procuring Entity to institute action pursuant to RA No. 3688 against any subcontractor be they an individual, firm, partnership, corporation, or association supplying the Contractor with labor, materials and/or equipment for the performance of this Contract.

6. Site Investigation Reports

The Contractor, in preparing the Bid, shall rely on any Site Investigation Reports referred to in the **SCC** supplemented by any information obtained by the Contractor.

7. Warranty

- 7.1. In case the Contractor fails to undertake the repair works under Section 62.2.2 of the 2016 revised IRR, the Procuring Entity shall forfeit its performance security, subject its property(ies) to attachment or garnishment proceedings, and perpetually disqualify it from participating in any public bidding. All payables of the GOP in his favor shall be offset to recover the costs.
- 7.2. The warranty against Structural Defects/Failures, except that occasioned-on force majeure, shall cover the period from the date of issuance of the Certificate of Final Acceptance by the Procuring Entity. Specific duration of the warranty is found in the **SCC**.

8. Liability of the Contractor

Subject to additional provisions, if any, set forth in the **SCC**, the Contractor's liability under this Contract shall be as provided by the laws of the Republic of the Philippines.

If the Contractor is a joint venture, all partners to the joint venture shall be jointly and severally liable to the Procuring Entity.

9. Termination for Other Causes

Contract termination shall be initiated in case it is determined *prima facie* by the Procuring Entity that the Contractor has engaged, before, or during the implementation of the contract, in unlawful deeds and behaviors relative to contract acquisition and implementation, such as, but not limited to corrupt, fraudulent, collusive, coercive, and obstructive practices as stated in **ITB** Clause 4.

10. Dayworks

Subject to the guidelines on Variation Order in Annex “E” of the 2016 revised IRR of RA No. 9184, and if applicable as indicated in the **SCC**, the Dayworks rates in the Contractor’s Bid shall be used for small additional amounts of work only when the Procuring Entity’s Representative has given written instructions in advance for additional work to be paid for in that way.

11. Program of Work

- 11.1. The Contractor shall submit to the Procuring Entity’s Representative for approval the said Program of Work showing the general methods, arrangements, order, and timing for all the activities in the Works. The submissions of the Program of Work are indicated in the **SCC**.
- 11.2. The Contractor shall submit to the Procuring Entity’s Representative for approval an updated Program of Work at intervals no longer than the period stated in the **SCC**. If the Contractor does not submit an updated Program of Work within this period, the Procuring Entity’s Representative may withhold the amount stated in the **SCC** from the next payment certificate and continue to withhold this amount until the next payment after the date on which the overdue Program of Work has been submitted.

12. Instructions, Inspections and Audits

The Contractor shall permit the GOP or the Procuring Entity to inspect the Contractor’s accounts and records relating to the performance of the Contractor and to have them audited by auditors of the GOP or the Procuring Entity, as may be required.

13. Advance Payment

The Procuring Entity shall, upon a written request of the Contractor which shall be submitted as a Contract document, make an advance payment to the Contractor in an amount not exceeding fifteen percent (15%) of the total contract price, to be made in lump sum, or at the most two installments according to a schedule specified in the **SCC**, subject to the requirements in Annex “E” of the 2016 revised IRR of RA No. 9184.

14. Progress Payments

The Contractor may submit a request for payment for Work accomplished. Such requests for payment shall be verified and certified by the Procuring Entity’s Representative/Project Engineer. Except as otherwise stipulated in the **SCC**, materials and equipment delivered on the site but not completely put in place shall not be included for payment.

15. Operating and Maintenance Manuals

- 15.1. If required, the Contractor will provide “as built” Drawings and/or operating and maintenance manuals as specified in the **SCC**.

- 15.2. If the Contractor does not provide the Drawings and/or manuals by the dates stated above, or they do not receive the Procuring Entity's Representative's approval, the Procuring Entity's Representative may withhold the amount stated in the **SCC** from payments due to the Contractor.

Section V. Special Conditions of Contract

Notes on the Special Conditions of Contract

Similar to the BDS, the clauses in this Section are intended to assist the Procuring Entity in providing contract-specific information in relation to corresponding clauses in the GCC found in Section IV.

The Special Conditions of Contract (SCC) complement the GCC, specifying contractual requirements linked to the special circumstances of the Procuring Entity, the Procuring Entity's country, the sector, and the Works procured. In preparing this Section, the following aspects should be checked:

- a. Information that complements provisions of the GCC must be incorporated.
- b. Amendments and/or supplements to provisions of the GCC as necessitated by the circumstances of the specific purchase, must also be incorporated.

However, no special condition which defeats or negates the general intent and purpose of the provisions of the GCC should be incorporated herein.

Special Conditions of Contract

GCC Clause	
2	Completion of work shall be within 300 calendar days.
4.1	The Procuring Entity shall give possession of all parts of the Site to the Contractor upon receipt of the Notice to Proceed.
6	The site investigation reports are: <i>[list here the required site investigation reports.]</i>
7.2	<p><i>[Select one, delete the other.]</i></p> <p><i>[In case of permanent structures, such as buildings of types 4 and 5 as classified under the National Building Code of the Philippines and other structures made of steel, iron, or concrete which comply with relevant structural codes (e.g., DPWH Standard Specifications), such as, but not limited to, steel/concrete bridges, flyovers, aircraft movement areas, ports, dams, tunnels, filtration and treatment plants, sewerage systems, power plants, transmission and communication towers, railway system, and other similar permanent structures:]</i> Fifteen (15) years.</p> <p><i>[In case of semi-permanent structures, such as buildings of types 1, 2, and 3 as classified under the National Building Code of the Philippines, concrete/asphalt roads, concrete river control, drainage, irrigation lined canals, river landing, deep wells, rock causeway, pedestrian overpass, and other similar semi-permanent structures:]</i> Five (5) years.</p> <p><i>[In case of other structures, such as bailey and wooden bridges, shallow wells, spring developments, and other similar structures:]</i> Two (2) years.</p>
10	Dayworks are applicable at the rate shown in the Contractor's original Bid.
13	The amount of the advance payment is no more that fifteen percent (15%) of the Contract Price subject to approval by the HOPE and compliance with the conditions under RA 9184 and its IRR.
14	No further instructions.
15.1	<p>The date by which operating and maintenance manuals are required is <i>thirty (30) days</i></p> <p>The date by which "as built" drawings are required as part of final payment</p>
15.2	The amount to be withheld for failing to produce "as built" drawings and/or operating and maintenance manuals by the date required is ten (10%) percent of the contract price.

Section VI. Specifications

Notes on Specifications

A set of precise and clear specifications is a prerequisite for Bidders to respond realistically and competitively to the requirements of the Procuring Entity without qualifying or conditioning their Bids. In the context of international competitive bidding, the specifications must be drafted to permit the widest possible competition and, at the same time, present a clear statement of the required standards of workmanship, materials, and performance of the goods and services to be procured. Only if this is done will the objectives of economy, efficiency, and fairness in procurement be realized, responsiveness of Bids be ensured, and the subsequent task of bid evaluation facilitated. The specifications should require that all goods and materials to be incorporated in the Works be new, unused, of the most recent or current models, and incorporate all recent improvements in design and materials unless provided otherwise in the Contract.

Samples of specifications from previous similar projects are useful in this respect. The use of metric units is mandatory. Most specifications are normally written specially by the Procuring Entity or its representative to suit the Works at hand. There is no standard set of Specifications for universal application in all sectors in all regions, but there are established principles and practices, which are reflected in these PBDs.

There are considerable advantages in standardizing General Specifications for repetitive Works in recognized public sectors, such as highways, ports, railways, urban housing, irrigation, and water supply, in the same country or region where similar conditions prevail. The General Specifications should cover all classes of workmanship, materials, and equipment commonly involved in construction, although not necessarily to be used in a particular Works Contract. Deletions or addenda should then adapt the General Specifications to the particular Works.

Care must be taken in drafting specifications to ensure that they are not restrictive. In the specification of standards for goods, materials, and workmanship, recognized international standards should be used as much as possible. Where other particular standards are used, whether national standards or other standards, the specifications should state that goods, materials, and workmanship that meet other authoritative standards, and which ensure substantially equal or higher quality than the standards mentioned, will also be acceptable. The following clause may be inserted in the SCC.

Sample Clause: Equivalency of Standards and Codes

Wherever reference is made in the Contract to specific standards and codes to be met by the goods and materials to be furnished, and work performed or tested, the provisions of the latest current edition or revision of the relevant standards and codes in effect shall apply, unless otherwise expressly stated in the Contract. Where such standards and codes are national, or relate to a particular country or region, other authoritative standards that ensure a substantially equal or higher quality than the standards and codes specified will be accepted

subject to the Procuring Entity's Representative's prior review and written consent. Differences between the standards specified and the proposed alternative standards shall be fully described in writing by the Contractor and submitted to the Procuring Entity's Representative at least twenty-eight (28) days prior to the date when the Contractor desires the Procuring Entity's Representative's consent. In the event the Procuring Entity's Representative determines that such proposed deviations do not ensure substantially equal or higher quality, the Contractor shall comply with the standards specified in the documents.

These notes are intended only as information for the Procuring Entity or the person drafting the Bidding Documents. They should not be included in the final Bidding Documents.



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PROJECT TITLE: **PROPOSED INSTALLATION OF MECHANICAL, ELECTRICAL, PLUMBING, AND FIRE PROTECTION SYSTEM (MEPFS) AT M.I.C.E CENTER**

LOCATION: **BARANGAY CENTRAL, DISTRICT 4, QUEZON CITY**

TECHNICAL SPECIFICATIONS

I. GENERAL REQUIREMENTS

- A. Comply with the current and existing laws, ordinances and applicable codes, rules and regulations, and standards. Any works performed contrary to the existing laws, rules and regulations, ordinances and standards without notice shall bear all cost arising therefrom.
- B. Drawings, specifications, codes and standards are minimum requirements. Where requirements differ, the more stringent apply.
- C. Should there be any change(s) in drawings or specifications, it is required to comply with the governing regulations, notify the implementing agency.
- D. Photographs shall be taken as, when and where directed at intervals of not more than one month. The photographs shall be sufficient in number and location, to record the exact progress of the works. The photographs shall be retained and will become the property of the Government.
- E. Site verification / inspection shall be conducted to validate the scope of works. No extra compensation and extension of time shall be given due to negligence or inadvertence.
- F. The quality of materials shall be of the best grade of their respective kinds for the purpose. The work shall also be performed in the best and most capable manner in strict accordance with requirements of the plans and details. All materials not conforming to the requirements of these specifications shall be considered as defective.
- G. All equipment and installations shall meet or exceed minimum requirements of the standards and codes.
- H. Mobilization and Demobilization (if applicable)
 1. Mobilization shall include all activities and related costs for transportation of personnel, equipment, and operating supplies to the site, establishment of offices, buildings, and other necessary general facilities for the operations at the site.
 2. Demobilization shall include all activities and costs for transportation of personnel, equipment, and supplies not anymore required within the construction site including the disassembly, removal and site clean-up of offices and other facilities assembled on the site specifically for this contract.
- I. Execute work in strict accordance with the best practices of the trades in a thorough, substantial, workmanlike manner by competent workmen. Provide a competent, experienced, full-time supervisor who is authorized to make decisions on behalf of the Contractor.
- J. Temporary Facilities and Utilities
 1. All facilities shall be near the job site, where necessary and shall conform to the best standard for the required types.
 2. Temporary facilities shall be provided and maintained including sanitary facilities and first aid stations.

3. Temporary utilities shall be sufficiently provided until the completion of the project such as water, power and communication.
 4. Temporary enclosure shall be provided around the construction site with adequate guard lights, railings and proper signage
 5. Temporary roadways shall be constructed and maintained to sustain loads to be carried on them during the entire construction period.
 6. Upon completion of the work, the temporary facilities shall be demolished, hauled-out and disposed properly.
- K. Adequate construction safety and health protection shall be provided at all times during the execution of work to both workers and property.
1. A fully-trained Medical Aide shall be employed permanently on the site who shall be engaged solely to medical duties.
 2. The medical room shall be provided with waterproofing; it could be a building or room designated and used exclusively for the purpose and have a floor area of at least 15 square meters and a glazed window area of at least 2 square meters.
 3. The location of the medical room and any other arrangements shall be made known to all employees by posting on prominent locations and suitable notices in the site.
 4. Additional safety precautions shall be provided in the event of a pandemic. Protocols set forth by the government shall be strictly followed.
 5. Construction safety shall consist of construction canopy and safety net
- L. Necessary protections to the adjacent property shall be provided to avoid untoward incidents / accidents.
- M. A systematic approach for managing vehicular and pedestrian traffic within the project area shall be provided adhering to relevant regulations and standards, prioritizing the safety of workers, motorists, and pedestrians while maintaining the flow of traffic during construction activities. It shall delineate designated traffic routes, temporary signage, and traffic control measures such as flagging operations or temporary traffic signals.
- N. Final cleaning of the work shall be employed prior to the final inspection for the certification of final acceptance. Final cleaning shall be applied on each surface or unit of work and shall be of condition expected for a building cleaning and maintenance program.

II. SANITARY / PLUMBING WORKS

- A. Comply with the current applicable codes, ordinances, and regulations of the authority or authorities having jurisdiction, the rules, regulations and requirements of the utility companies (as applicable)
- B. Supply, installation and testing of the following:
1. Potable water supply system completes in all respects including but not limited to submittals, shop drawings, piping, water meters, valves, bibbs, insulation, all accessories required for complete and operational of the system
 2. Water service connections including but not limited to water meters, float valves. Any and all other works involve in providing the complete operation of the water supply system
 3. Soil waste and vent system complete in all respect including but not limited to connection to existing sewer, submittals, shop drawings, pipes, fittings, valves, cleanout, drains, etc. Complete and operational.
 4. Storm drainage system complete in all respect including but not limited to connection to existing storm drainage, submittals, shop drawings, pipes, fittings, valves, cleanout, drains, etc. Complete and operational.

- C. Workmanship and installation methods shall conform to the best modern practice. Employ skilled tradesmen to perform work under the direct supervision of fully qualified personnel
- D. All equipment and installations shall meet or exceed minimum requirements of the Standards and Codes as specified in plans and program of work.
- E. Install equipment in strict accordance with manufacturers written recommendations.
- F. Physical sizes of all plant and equipment are to be suitable for the space allocated for the accommodation of such plant and equipment, taking into account the requirement of access for maintenance purposes.
- G. In selecting makes and types of equipment, the Contractor shall ascertain that facilities for proper maintenance, repair and replacement are provided.
- H. Where the Contractor proposes to use an item of equipment other than that specified or detailed in the drawing, which requires any redesign of the system, drawings showing the layout of the equipment and such redesign as required therefore shall be prepared by the Contractor at his own expenses. Where such approved deviation necessitates a different quantity and arrangement of materials and equipment's from that originally specified or indicated in the drawings, the Contractor shall furnish and install any such additional materials and equipment's required by the system at no additional cost
- I. Equipment catalogue and manufacturer's specifications must be submitted for examination and details shall be submitted for approval before any equipment is to be ordered
- J. This shall include all information necessary to ascertain the equipment comply with this specification and drawings. Data and sales catalogue of a general nature will not be accepted
- K. All materials, equipment, components and accessories shall be delivered to the Site in a new condition, properly packed and protected against damage or contamination or distortion, breakage or structural weakening due to handling, adverse weather or other circumstances and, as far as practicable, they shall be kept in the packing cases or under approved protective coverings until required for use.
- L. Any items suffering from damage during manufacture, or in transit, or on site whilst in storage or during erection shall be rejected and replaced without extra cost.
- M. All sanitary fittings and pipework shall be cleaned after installation and keep them in a new condition.
- N. All installed pipelines shall be flushed through with water, rodded when necessary to ensure clearance of debris.
- O. Cleaning and flushing shall be carried out in sections as the installation becomes completed.
- P. The Contractor shall carry out hydraulic test on the complete plumbing systems and the drainage system to show that it is functioning satisfactorily within the requirements of this Specification and local regulations
- Q. The Contractor shall provide suitable test pumps and arrange for a supply of water required in connection with testing of pipework. The test pump shall be fitted with pressure gauges which shall be of suitable range for the pressure being applied
- R. Hydraulic tests shall be carried out as the pipework is installed and shall be completed before chases in walls and ducts are closed. Also, test shall be carried out prior to false ceilings and other finishes are installed.
- S. Testing apparatus shall be provided by the Contractor. Where any section of pipework or equipment is unable to withstand the maximum pipework test pressure, it shall be isolated during the pipework test then that section of pipework or equipment shall be re-tested at the appropriate test pressure.
- T. The Sanitary Contractor must carry out any additional tests required by the end-user and/or approving agency.

- U. Drainage pipe shall be tested by filling the pipe with 3m. of water higher than the test section and wait for 15 min, then check for leakage at every joints.
- V. Testing of drainage systems shall be carried out in sections by dividing the system horizontally. Each section shall comprise pipework and fitting for three floors/storey required for testing.
- W. Drainage pressure pipe shall be hydraulic tested at minimum pressure 50 psi
- X. Hangers and supports for plumbing piping and equipment shall withstand the effects of gravity loads and stresses within limits and under conditions indicated according to ASCE/SEI 7
- Y. Install hangers and supports to allow controlled thermal and seismic movement of piping systems, to permit freedom of movement between pipe anchors, and to facilitate action of expansion joints, expansion loops, expansion bends, and similar units.
- Z. Install lateral bracing with pipe hangers and supports to prevent swaying.
- AA. Install building attachments within concrete slabs or attach to structural steel. Install additional attachments at concentrated loads including valves, flanges, and strainers, NPS 2-1/2 (DN 65) and larger and at changes in direction of piping. Install concrete inserts before concrete is placed. Fasten inserts to forms and install reinforcing bars through openings at top of inserts.
- BB. Install hangers and supports so that piping live and dead loads and stresses from movement will not be transmitted to connected equipment
- CC. Install hangers and supports to provide indicated pipe slopes and to not exceed maximum pipe deflections allowed by ASME B31.9 for building services piping

III. ELECTRICAL WORKS

A. CONDUITS, BOXES AND FITTINGS

1. This item shall consist of the furnishing and installation of the complete conduit work, consisting of electrical conduits, conduit boxes such as junction boxes, pull boxes, utility boxes, octagonal and square boxes; conduit fittings, such as couplings, locknuts and bushings and other electrical materials needed to complete the conduit roughing-in work of this project.
2. All materials shall be brand new and shall be of the approved type meeting all the requirements of the Philippine Electrical Code and bearing the Philippine Standard Agency (PSA) mark.
3. All works throughout shall be executed in the best practice in a workmanlike manner by qualified and experienced electricians under the immediate supervision of a duly licensed Electrical Engineer.
4. The work to be done under this division of specifications consists of the fabrication, furnishing, delivery and installation, complete in all details of the electrical work, at the subject premises and all work materials incidental to the proper completion of the installation, except those portions of the work which are expressly stated to be done by other fields. All works shall be done in accordance with the rules and regulations and with the specifications.
5. All lighting fixtures and lamps are as specified and listed on lighting fixture schedule.
6. All grounding system installation shall be executed in accordance with the approved plans. Grounding system shall include building perimeter ground wires, ground rods, clamps, connectors, ground wells and ground wiretap as shown in the approved design.
7. All auxiliary systems such as telephone and intercom system, time clock system, fire alarm system and public address/nurse's call/paging system installations shall be done in accordance with the approved design

- 8 Upon completion of the electrical construction work the contractor shall provide all test equipment and personnel and to submit written copies of all test results.
- 9 The contractor shall guarantee the electrical installation are done and in accordance with the approved plans and specifications. The contractor shall guarantee that the electrical systems are free from all grounds and from all defective workmanship and materials and will remain so for a period of one year from date and acceptance of works. Any defect shall be remedied by the Contractor at his own expense.

B. WIRES AND WIRING DEVICES

1. This item shall consist of the furnishing and installation of all wires and wiring devices consisting of electric wires and cables, wall switches, convenience receptacles, heavy duty receptacles and other devices shown on the approved Plans but not mentioned in these specifications.
2. Wires and cables shall be of the approved type meeting all the requirements of the Philippine Electrical Code and bearing the Philippine Standard Agency (PSA) mark. Unless specified or indicated otherwise, all power and lighting conductors shall be insulated for 600 volts. All wires shall be copper, soft drawn and annealed, smooth and of cylindrical form and shall be centrally located inside the insulation.
3. Conductors or wires shall not be drawn in conduits until after the cement plaster is dry and the conduits are thoroughly cleaned and free from dirt and moisture. In drawing wires into conduits, sufficient slack shall be allowed to permit easy connections for fixtures, switches, receptacles and other wiring devices without the use of additional splices.
4. All conductors of convenience outlets and lighting branch circuit homeruns shall be wired with a minimum of 3.5 mm in size. Circuit homeruns to panelboards shall not be smaller than 3.5 mm but all homeruns to panelboard more than 30 meters shall not be smaller than 5.5 mm. No conductor shall be less than 2 mm in size.
5. All wires of 14mm and larger in size shall be connected to panels and apparatus by means of approved type lugs or connectors of the solderless type, sufficiently large enough to enclose all strands of the conductors and securely fastened. They shall not loosen under vibration or normal strain.
6. All joints, taps and splices on wires larger than 14 mm shall be made of suitable solderless connectors of the approved type and size. They shall be taped with rubber and PVC tapes providing insulation not less than that of the conductors.
7. No splices or joints shall be permitted in either feeder or branch conductors except within outlet boxes or accessible junction boxes or pull boxes. All joints in branch circuit wiring shall be made mechanically and electrically secured by approved splicing devices and taped with rubber and PVC tapes in a manner which will make their insulation as that of the conductor.
8. All wall switches and receptacles shall be fitted with standard Bakelite face plate covers. Device plates for flush mounting shall be installed with all four edges in continuous contact with finished wall surfaces without the use of coiled wire or similar devices. Plaster filling shall not be permitted. Plates installed in wet locations shall be gasketed.
9. When more than one switch or device is indicated in a single location, gang plate shall be used.

C. POWER LOAD CENTER, SWITCHGEAR AND PANELBOARDS

1. This item shall consist of the furnishing and installation of the power load center unit substation or low voltage switchgear and distribution panelboards at the location shown on the approved Plans complete with transformer, circuit breakers, cabinets and all accessories, completely wired and ready for service.

2. All materials shall be brand new and shall be of the approved type meeting all the requirements of the Philippine Electrical Code and bearing the Philippine Standard Agency (PSA) mark.

3. **Power Load Center Unit Substation.** The Contractor shall furnish and install an indoor-type Power Load Center Unit Substation at the location shown on the approved Plans if required. It shall be totally metal-enclosed, dead front and shall consist of the following coordinated component parts.

- a. **High Voltage Primary Section.** High voltage primary incoming line section consisting of the following parts and related accessories.

- i. One (1) Air-filled Interrupter Switch, 2-position (open-close) installed in a suitable air-filled metal enclosure and shall have sufficient interrupting capacity to carry the electrical load. It shall be provided with key interlock with the cubicle for the power fuses to prevent access to the fuses unless the switch is open.
- ii. Three (3)-power fuses mounted in separate compartments within the switch housing and accessible by a hinged door.
- iii. One (1) set of high voltage potheads or 3-conductor cables or three single conductor cables.
- iv. Lightning arresters shall be installed at the high voltage cubicle if required.

Items (i) and (ii) above could be substituted with a power circuit breaker with the correct rating and capacity.

- b. **Transformer Section.** The transformer section shall consist of a power transformer with ratings and capacities as shown on the plans. It shall be oil liquid-filled non-flammable type and designed in accordance with the latest applicable standards.

The transformer shall be provided with four (4) approximately 2 1/2 % rated KVA taps on the primary winding in most cases one (1) above and three (3) below rated primary voltage and shall be changed by means of externally gang-operated manual tap changer only when the transformer is de-energized. Tap changing under load is acceptable if transformer has been so designed.

The following accessories shall be provided with the transformer, namely: drain valve, sampling device, filling connection, oil liquid level gauge, ground pad, top filter press connection, lifting lugs, diagrammatic nameplate, relief valve, thermometer and other necessary related accessories.

The high-voltage and low-voltage bushings and transition flange shall be properly coordinated for field connection to the incoming line section and low voltage switchboard section, respectively.

- c. **Low Voltage Switchboard Section.** The low-voltage switchboard shall be standard modular-unitized units, metal-built, dead front, safety type construction and shall consist of the following:

- i. **Switchboard Housing.** The housing shall be heavy gauge steel sheet, dead front type, gray enamel finish complete with frame supports, steel bracings, steel sheet panelboards, removable rear plates, copper busbars, and all other necessary accessories to insure sufficient mechanical strength and safety. It shall be provided with grounding bolts and clamps.
- ii. **Secondary Metering Section.** The secondary metering section shall consist of one (1) ammeter, AC, indicating type, one (1) voltmeter, AC, indicating type, one (1) ammeter transfer switch for 3-phase, one (1) voltmeter transfer switch for 3-phase and current transformers of suitable rating and capacity.

The above-mentioned instruments shall be installed in one compartment above the main breaker and shall be complete with all necessary accessories completely wired, ready for use.

- iii. **Main Circuit Breaker.** The main circuit breaker shall be draw-out type, manually or electrically operated as required with ratings and capacity as shown on the approved Plans.

The main breaker shall include insulated control switch if electrically operated, manual trip button, magnetic tripping devices, adjustable time overcurrent protection and instantaneous short circuit trip and all necessary accessories to insure safe and efficient operation.

- iv. **Feeder Circuit Breakers.** There shall be as many feeder breakers as are shown on the single line diagram or schematic riser diagram and schedule of loads and computations on the plans. The circuit breakers shall be draw out or molded case as required. The circuit breakers shall each have sufficient interrupting capacity and shall be manually operated complete with trip devices and all necessary accessories to insure safe and efficient operation. The number, ratings, capacities of the feeder branch circuit breakers shall be as shown on the approved Plans.

Circuit breakers shall each be of the indicating type, providing "ON" - "OFF" and "TRIP" positions of the operating handles and shall each be provided with nameplate for branch circuit designation. The circuit breaker shall be so designed that an overload or short on one pole automatically causes all poles to open.

- d. **Low Voltage Switchgear** (For projects requiring low-voltage switchgear only) The Contractor shall furnish and install a low-voltage switchgear at the location shown on the plans. It shall be metal-clad, dead front, free standing, safety type construction and shall have copper busbars of sufficient size, braced to resist allowable root mean square (RMS) symmetrical short circuit stresses, and all necessary accessories. The low-voltage switchgear shall consist of the switchgear housing, secondary metering, main breaker and feeder branch circuit.
- e. **Grounding System.** All non-current carrying metallic parts like conduits, cabinets and equipment frames shall be properly grounded in accordance with the Philippine Electrical Code, latest edition.

The size of the ground rods and ground wires shall be as shown on the approved Plans. The ground resistance shall not be more than 5 ohms.

- f. **Panelboards and Cabinets.** Panelboards shall conform to the schedule of panelboards as shown on the approved Plans with respect to supply characteristics, rating of main lugs or main circuit breaker, number and ratings and capacities of branch circuit breakers.

Panelboards shall consist of a factory completed, dead front assembly mounted in an enclosing flush type cabinet consisting of code gauge galvanized sheet steel box with trim and door. Each door shall be provided with catch lock and two (2) keys. Panelboards shall be provided with directories and shall be primed to indicate load served by each circuit.

Panelboard cabinets and trims shall be suitable for the type of mounting shown on the approved Plans. The inside and outside of panelboard cabinets and trims shall be factory painted with one rust-proofing primer coat and two finish shop coats of pearl gray enamel paint.

Main and branch circuit breakers for panelboards shall have the rating, capacity and number of poles as shown on the approved Plans. Breakers shall be thermal magnetic type. Multiple breakers shall be of the common trip type having a single operating handle. For 50-ampere breaker or less, it may consist of single-pole breaker permanently assembled at the factory into a multi-pole unit.

4. The Contractor shall install the Power Load Center Unit Substation or Low-Voltage Switchgear and Panelboards at the locations shown on the approved Plans.

Standard panels and cabinets shall be used and assembled on the job. All panels shall be of dead front construction furnished with trims for flush or surface mounting as required.

- D. Comply with the current applicable codes, ordinances, and regulations of the authority or authorities having jurisdiction, the rules, regulations and requirements of the utility companies (as applicable).
- E. Drawings, specifications, codes and standards are minimum requirements. Where requirements differ, the more stringent apply.
- F. All equipment and installations shall meet or exceed minimum requirements of the Standards and Codes.
- G. Execute work in strict accordance with the best practices of the trades in a thorough, substantial, workmanlike manner by competent workmen.
- H. When the tests and inspections have been completed, a label shall be attached to all devices tested. The label shall provide the name of the testing company, the date the tests were completed, and the initials of the person who performed the tests.

I. PANELBOARDS

1. Fabricate and test panelboards according to IEEE 344 to withstand seismic forces defined in Division 16 Sections 16073 and 16074 "Hangers and Supports for Electrical Systems and Vibration and Seismic controls for Electrical Systems" respectively.
2. Enclosures: Flush, Surface, Flush- and surface-mounted cabinets.
 - a. Rated for environmental conditions at installed location.
 - i. Indoor Dry and Clean Locations: NEMA, Type 1
 - ii. Outdoor Locations: NEMA, Type 3R.
 - iii. Kitchen and Wash-Down Areas: NEMA, Type 4X, stainless steel
 - iv. Indoor Locations Subject to Dust, Falling Dirt, and Dripping Noncorrosive Liquids: NEMA, Type 12.
 - v. Outdoor Locations Subject to Dust, Falling Dirt, and Dripping Noncorrosive Liquids: NEMA, Type 5R
 - b. Front: Secured to box with concealed trim clamps. For surface-mounted fronts, match box dimensions, for flush-mounted fronts, overlap box.
 - c. Hinged Front Cover. Entire front trim hinged to box and with standard door within hinged trim cover.
 - d. Skin for Surface-Mounted Panelboards. Same gauge and finish as panelboard front with flanges for attachment to panelboard, wall, and ceiling or floor.
 - e. Gutter Extension and Barrier. Same gage and finish as panelboard enclosure, integral with enclosure body. Arrange to isolate individual panel sections.
 - f. Finishes.
 - i. Panels and Trim. Steel and galvanized steel, factory finished immediately after cleaning and pretreating with manufacturer's standard two-coat, baked-on finish consisting of prime coat and thermosetting topcoat.
 - ii. Back Boxes: Galvanized steel Same finish as panels and trim.
 - iii. Fungus Proofing. Permanent fungicidal treatment for overcurrent protective devices and other components.

- g. Directory Card: Inside panelboard door, mounted in transparent card holder metal frame with transparent protective cover.
- 3. Incoming Mains Location: Top or Bottom
- 4. Phase Neutral and Ground Buses:
 - a. Material: Hard-drawn copper, 98 percent conductivity.
 - b. Equipment Ground Bus: Adequate for feeder and branch-circuit equipment grounding conductors, bonded to box.
 - c. Neutral Bus: 100 percent of phase bus & Extra-Capacity Neutral Bus: Neutral bus rated 200 percent of phase bus and UL listed as suitable for nonlinear loads.
- 5. parts of the structure and equipment damaged by the Contractor in the prosecution of the work shall be replaced as shown on the Plans.
- A. Comply with the current applicable codes, ordinances, and regulations of the authority or authorities having jurisdiction, the rules, regulations and requirements of the utility companies (as applicable).
- B. Drawings, specifications, codes and standards are minimum requirements. Where requirements differ, the more stringent apply.

IV. MECHANICAL WORKS

A. GENERAL REQUIREMENT

- 1. Work in the Specifications is divided into descriptive Sections which are not intended to delegate functions or work to any specific Submain Contractor or identify absolute contractual limits between Submain Contractor, nor between the Main Contractor and his Submain Contractor. The requirements of any one Section apply to all other Sections, for example: the motor service factor requirement. Refer to other Divisions and Sections to ensure a completed operational product and fully coordinated standard of work.
- 2. The direction to 'provide' equipment, materials, products, Labor and services shall be interpreted to 'supply, install and test' the Division 15 work indicated on the Drawings and specified in the Specifications.
- 3. Provide and include in the Contract Price Division 15 work including mechanical components and normal system accessories not shown on the Drawings or stipulated in the Specifications, and required to ensure completed operational systems and a fully coordinated standard of Work acceptable to the MEPFS Consultant and all authorities having jurisdiction.
- 4. The work essentially shall include, but shall not be limited to the following items:
 - 4.1. Submission of technical specifications and samples of all supply items for approval by the MEPFS Consultant
 - 4.2. Submission of shop drawings of all items for fabrication for approval by the MEPFS Consultant prior to fabrication.
 - 4.3. Application and securing of required permits and licenses including facilitating inspection by governing agencies and payment of all fees levied therewith.
 - 4.4. Provide labor and materials required to install, test and place into operation the MEPFS systems as called for in the Contract Documents, and in accordance with applicable codes and regulations.
 - 4.5. Provide labor, materials, and accessories required to provide complete, operating MEPFS systems, including dismantling and/or relocation of existing utilities when required. Labor, materials or accessories not specifically called for in the Contract Documents, but required to provide complete, operating MEPFS systems shall be provided without additional cost to the Employer.

- 4.6 Termination of motors/equipment including provision of necessary connectors and insulators.
- 4.7 Roughing-ins and wiring from Motor Control Center to motor controllers.
- 4.8 Provision for Interfacing with others.
- 4.9 Fire stopping of all vertical and/or horizontal pipe penetration to fire rated
- 4.10 Miscellaneous Works:
 - a. Hacking of non-structural wall and partitions to provide opening for pipes and sealing of opening around sleeves and pipes including provision of escutcheon plates.
 - b. Grouting of opening in walls after such pipes are in place and sealing of all such openings if not used.
 - c. Flushing of newly installed plumbing system.
 - d. Restoration/repair of existing structures damaged during installation.
 - e. Miscellaneous items and other provisions required to maintain cleanliness level of adjacent areas during the entire duration of construction.
 - f. Full instruction after completing the job to the Maintenance Personnel regarding operation and maintenance operation of the entire installation. Provide complete printed/type instruction booklets (hardbound) covering maintenance operation and adjustment of each piece of equipment and list of each spare parts
- 4.11. Testing and commissioning
- 4.12. Submission of five (05) sets of operations and maintenance manuals and as-built plans.
- 4.13. Training of Employer's plant operators on the system's maintenance and operation.
- 4.14. Coordination with other trades for special requirements for this package (i.e. concrete pads, block-outs, relays, etc.)
- 4.15. Provision of guarantee as specified in the Specifications

6. INSTALLATION OF SYSTEMS

- 1. Installation and testing of Refrigerant Piping systems. Very strict compliance to manufacturer's recommendations is required with regards to quality of workmanship and testing procedures for refrigerant piping works such as pipe covering, flushing, air-tightness of soldered, flared and flanged joints, vacuum drying and nitrogen replacement. This is to ensure that no moisture and dirt is left inside the pipe and guarantee no refrigerant leaks
- 2. Installation, leak testing and cleaning of duct systems.
- 3. Control system wiring
- 4. Air balancing
- 5. Electrical service connections
- 6. Equipment suppliers pre-start checkout of the equipment installations, including controls.
- 7. Startup of various pieces of equipment and systems
- 8. Operational testing of system components.
- 9. Performance testing of equipment and systems
- 10. Acceptance testing of equipment installations and system, by authorities having jurisdiction and Contractor's insurance company
- 11. Troubleshooting
- 12. Calibration of controls and point checkout
- 13. Control software set-up and checkout including seasonal and response checkout of operating sequences, PID optimization
- 14. Emergency system checkout
- 15. Fire alarm and control system interfacing
- 16. Submittal of completed equipment and system checkout sheets
- 17. Demonstration of systems and equipment
- 18. Maintenance manual preparation and submittal
- 19. Operator training program
- 20. Record documentation submittal

C. START-UP

1. Coordinate and supervise the start-up of the various pieces of equipment and systems. Utilize the start-up services of the manufacturer's representative. Ensure that the equipment is operating in a satisfactory manner. Including, but not necessarily limited to the following:
 - 1.1 Direction of rotation
 - 1.2 Grease and lubricants
 - 1.3 Noise, if deemed to be a problem
 - 1.4 Seals
 - 1.5 Alignment of fan drives by a millwright
 - 1.6 Piping connections and safeties
 - 1.7 Electrical amp draw, starting inrush current and trip/heater settings.

V. FIRE PROTECTION WORKS

A. GENERAL REQUIREMENTS

1. The work includes providing new fire protection systems for the proposed building. The equipment materials installation, workmanship, inspection and testing shall be in strict accordance with the required advisory provisions of national fire protection association standards, fire code of the Philippines and national building code except as modified herein. The work includes the following.
 - 1.1 Complete wet pipe and standpipe system. System shall be complete including automated fire sprinkler system, fire pump, fire department connection valves, hose, hose valves, hose cabinet, etc
 - 1.2 Painting of pipe work and equipment
 - 1.3 Testing and commissioning.
 - 1.4 Provision of operating instructions and maintenance manuals
 - 1.5 Training of the building's maintenance staff for proper operation of the entire system.
2. The contractor shall be responsible for coordinating his work with the various trades as necessary to avoid conflicts and to insure the installation of all work within the available space. Requirement for portable fire extinguisher shall comply with the local fire department policy

B. STANDPIPES

1. System design and manufacturer's products shall be in accordance with the required and advisory provisions of NFPA 14, except as modified herein. System shall include materials, accessories and equipment inside and outside of the building necessary to provide the system complete and ready for use.
2. Provide all labor, material, equipment and appliances, and perform all operations for the work as outlined in the specifications and delineated on the drawings for the installation of complete system. All work shall be performed in strict accordance with these specifications and the drawings. Secure and pay for permits, fees and inspections required for the approval of wet/dry standpipe systems.
3. Contractor for this work shall be held to have read all of the tender requirements, the general conditions, and in the execution of work he will be bound by all of the conditions and requirements therein.
4. Related documents
5. Drawings and general provisions of the contract, including general and supplementary conditions and division 1 specification sections, apply to this section

C. PIPE & PIPE FITTINGS

1. Pipe
 - 1.1. Pipe shall be black carbon steel pipe, schedule 40, conforming to the latest standard specification for welded steel pipe of the ASTM A-53. For underground installation, pipe shall be protected against corrosion
2. Fittings
 - 2.1 Fittings shall be welded, threaded, or grooved-end type.

3. Fire hose
 - 3.1 Fire hose shall be of the type approved by local authority.
4. Fire Hose Valve
 - 4.1 Landing valve shall be of the type approved by local fire dept.
 - 4.2 The fire hose valve shall be closed by turning the handwheel in a clockwise direction and the direction of opening shall be permanently marked on the operating wheel by an embossed arrow and the word "open".
5. Fire Hose Cabinet
 - 5.1. Provide recessed, semi recessed, or surface-mounted cabinets. Cabinets shall be prime grade, cold-rolled, reannealed, process-leveled, furniture steel. Fabricate cabinet from 20-gauge steel and door and trim from 18-gauge steel. Provide fully welded joints ground smooth.
6. Valves
 - 6.1 Gate valves
 - 6.1.1. UL listed, bronze body, OS&Y, rising stem, flanged ends, 3,000 KP listed for fire protection service
 - 6.2. Check valves
 - 6.2.1. provide FM-approved or UL-listed standard swing-check valves with elastomer-disc seat.
7. Fire Department Connection
 - 7.1 All fire department connections (FDC) shall be equipped with a single 100 mm "hydra storz" quick-connect fitting with a 30-degree down angle and suite to couplings of local fire brigade department.
 - 7.2. Words "sprinkler and hydrant" cast-in on escutcheon.
8. Auto Ball Drip
 - 8.1. 20 mm bronze with both ends threaded.
 - 8.2. Install in horizontal position, pipe to spill over floor drain.
9. Drains
 - 9.1. Provide valves and/or plugs at base of risers and other locations required for complete drainage of system.
10. Hose Valve Assemblies
 - 10.1 Polished brass angle body polished trim and red cast iron wheel handle, 2,000 KPa.
11. Hangers And Supports
 - 11.1. Hangers and supports shall be provided and installed for all piping as required by this specification and all authorities having jurisdiction over the work, and shall be approved by the MEPF consultant. Support piping independently from structure.
 - 11.2. Hangers and supports shall be installed so as not to interfere with the free expansion and contraction of piping, and all nuts and bolts shall be drawn up tight.
 - 11.3. Except where specified elsewhere hangers for pipes shall be adjustable wrought steel clevis type, similar to Grinnell figure no 260, or approved equal. Hangers shall be complete with bolts, rod and two nuts for each bolt. The diameter of hanger rods shall be as follows:

Pipe size	Diameter of rod
20 mm – 50 mm	10 mm
65 mm – 85 mm	13 mm
100 mm – 125 mm	16 mm
150 mm	20 mm

12. Pipe Sleeves

- 12.1. Furnish, install and be responsible for the location of proper sleeves for all pipes passing through floor, walls, partitions or other building construction. Where sleeves occur in concrete construction, they shall be set before concrete is poured. Set sleeves and anchors in a suitable manner so that they will not become displaced. Sleeves for piping passing through walls and floors in concealed spaces shall be cut flush with walls or floor. All sleeves shall be scheduling 40 galvanized steel pipes, and of such a size as to permit piping and piping insulation to pass through sleeve

D. FIRE EXTINGUISHERS

1. Install fire extinguishers and mounting brackets in locations indicated and in compliance with requirements of authorities having jurisdiction.
2. Mounting brackets: 54 inches (1372 mm) above finished floor to top of fire extinguisher.
Mounting brackets: fasten mounting brackets to surfaces, square and plumb, at locations indicated.

E. AUTOMATIC FIRE SPRINKLER SYSTEM (AFSS)

1. Comply with general requirements and all documents referred to therein
2. Provide all labor, material, equipment and appliances, and perform all operations for the work as outlined in the specifications and delineated on the drawings for the installation of complete combined fire standpipe and sprinkler system. All work shall be performed in strict accordance with these specifications and the drawings. Secure and pay for permits, fees and inspections required for the approval of fire standpipe and sprinkler systems. Perform hydraulic calculations, and file the shop drawings and the calculations with factory mutual and the building authorities.
3. General contractor for this work shall be held to have read all of the tender requirements, the general conditions, and in the execution of work he will be bound by all of the conditions and requirements therein
4. Following is a brief outline and description of the work included, but shall not be considered as complete and all inclusive:
 - 4.1. Pipe and fittings
 - 4.2. Joints
 - 4.3. Hangers and supports
 - 4.4. Pipe sleeves
 - 4.5. Valves
 - 4.6. Fire department connections and auto ball drips
 - 4.7. Sprinkler cabinets
 - 4.8. Identification tags
 - 4.9. Tests
 - 4.10. Sprinkler heads
 - 4.11. Water flow switches
 - 4.12. Fire extinguishers
 - 4.13. Tamper switches
5. System descriptions
 - 5.1. System design and manufacturer's products shall be in accordance with the required and advisory provisions of NFPA 13 except as modified herein. System shall include materials, accessories and equipment inside and outside of the building necessary to provide the system complete and ready for use
 - 5.2. Provide all labor, material, equipment and appliances, and perform all operations for the work as outlined in the specifications and delineated on the drawings for the installation of complete system. All work shall be performed in strict accordance with these specifications and the drawings. Secure and pay for permits, fees and inspections required for the approval of wet/dry standpipe systems.

5.3. Contractor for this work shall be held to have read all of the tender requirements, the general conditions, and in the execution of work he will be bound by all of the conditions and requirements therein.

F. PUMPS

1. Except as modified in this section or on the drawings, install fire pumps in conformance with NFPA 20, NFPA 70 and NFPA 72. In the event of a conflict between specific provisions of this specification and applicable NFPA standards, this specification governs. Devices and equipment for fire protection service must be UL fire pro listed or FM approved.
2. Fire pump shall be electric motor driven vertical turbine type. Fire pump shall furnish not less than 150 percent of rated flow capacity at not less than 65 percent of rated net pressure. Pump shall be vertical turbine type fire pump. Pump shall be automatic start and manual stop. Pump shall conform to the requirements of UL 448. Fire pump discharge and suction gauges shall be oil-filled type.

Motors, controllers, contactors, and disconnects shall be provided, as specified herein. Motor shall conform to nema mg 1 design b type. Integral size motors shall be the premium efficiency type in accordance with nema mg 1. Motor wattage/ horsepower shall be of sufficient size so that the nameplate wattage/ horsepower rating will not be exceeded throughout the entire published pump characteristic curve. The motor and fire pump controller shall be fully compatible.


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Section VII. Drawings

[Insert here a list of Drawings. The actual Drawings, including site plans, should be attached to this section, or annexed in a separate folder.]

Section VIII. Bill of Quantities

Notes on the Bill of Quantities

Objectives

The objectives of the Bill of Quantities are:

- a. to provide sufficient information on the quantities of Works to be performed to enable Bids to be prepared efficiently and accurately; and
- b. when a Contract has been entered into, to provide a priced Bill of Quantities for use in the periodic valuation of Works executed.

In order to attain these objectives, Works should be itemized in the Bill of Quantities in sufficient detail to distinguish between the different classes of Works, or between Works of the same nature carried out in different locations or in other circumstances which may give rise to different considerations of cost. Consistent with these requirements, the layout and content of the Bill of Quantities should be as simple and brief as possible.

Daywork Schedule

A Daywork Schedule should be included only if the probability of unforeseen work, outside the items included in the Bill of Quantities, is high. To facilitate checking by the Entity of the realism of rates quoted by the Bidders, the Daywork Schedule should normally comprise the following:

- a. A list of the various classes of labor, materials, and Constructional Plant for which basic daywork rates or prices are to be inserted by the Bidder, together with a statement of the conditions under which the Contractor will be paid for work executed on a daywork basis.
- b. Nominal quantities for each item of Daywork, to be priced by each Bidder at Daywork rates as Bid. The rate to be entered by the Bidder against each basic Daywork item should include the Contractor's profit, overheads, supervision, and other charges.

Provisional Sums

A general provision for physical contingencies (quantity overruns) may be made by including a provisional sum in the Summary Bill of Quantities. Similarly, a contingency allowance for possible price increases should be provided as a provisional sum in the Summary Bill of Quantities. The inclusion of such provisional sums often facilitates budgetary approval by avoiding the need to request periodic supplementary approvals as the future need arises. Where such provisional sums or contingency allowances are used, the SCC should state the manner in which they will be used, and under whose authority (usually the Procuring Entity's Representative's).

The estimated cost of specialized work to be carried out, or of special goods to be supplied, by other contractors should be indicated in the relevant part of the Bill of Quantities as a particular provisional sum with an appropriate brief description. A separate procurement procedure is normally carried out by the Procuring Entity to select such specialized contractors. To provide an element of competition among the Bidders in respect of any facilities, amenities, attendance, etc., to be provided by the successful Bidder as prime Contractor for the use and convenience of the specialist contractors, each related provisional sum should be followed by an item in the Bill of Quantities inviting the Bidder to quote a sum for such amenities, facilities, attendance, etc.

Signature Box

A signature box shall be added at the bottom of each page of the Bill of Quantities where the authorized representative of the Bidder shall affix his signature. Failure of the authorized representative to sign each and every page of the Bill of Quantities shall be a cause for rejection of his bid.

These Notes for Preparing a Bill of Quantities are intended only as information for the Procuring Entity or the person drafting the Bidding Documents. They should not be included in the final documents.

PROJECT TITLE : PROPOSED INSTALLATION OF MECHANICAL, ELECTRICAL, PLUMBING, AND FIRE PROTECTION SYSTEM (MEPFS) AT M.I.C.E CENTER

LOCATION : BARANGAY CENTRAL, DISTRICT 4, QUEZON CITY

PROJECT NO. : 24 - 00089

DURATION : Three Hundred (300) Calendar Days

BREAKDOWN OF COST

ITEM NO.	DESCRIPTION	ESTIMATED DIRECT COST	TOTAL MARK-UP		VAT	TOTAL INDIRECT COST	TOTAL COST
			%	VALUE			
PART I	FACILITIES FOR THE ENGINEER						
PART II	OTHER GENERAL REQUIREMENTS						
PART III	PLUMBING / SANITARY, ELECTRICAL, MECHANICAL AND FIRE PROTECTION WORKS						
	PLUMBING / SANITARY WORKS						
	ELECTRICAL WORKS						
	MECHANICAL WORKS						
	FIRE PROTECTION WORKS						
TOTAL							

TOTAL COST P_____

LUMP SUM BID IN WORDS : _____

Contractor : _____

BILL OF QUANTITIES
(Building Construction/Rehabilitation Project)

PROJECT TITLE : PROPOSED INSTALLATION OF MECHANICAL, ELECTRICAL, PLUMBING, AND FIRE PROTECTION SYSTEM (MEPFS) AT M.I.C.E CENTER
LOCATION : BARANGAY CENTRAL, DISTRICT 4, QUEZON CITY
PROJECT NO. : 24 - 00089
DURATION : Three Hundred (300) Calendar Days

ITEM CODE	DESCRIPTION	QUANTITY	UNIT	ESTIMATED DIRECT COST	MARK-UP IN %		TOTAL MARK-UP		VAT	TOTAL INDIRECT COST	TOTAL COST	UNIT COST
					OCM	PROFIT	%	VALUE				
PART I	FACILITIES FOR THE ENGINEER											
A.1.1(8)	Provision of Field Office for the Engineer (Rental Basis)	10	month									
	TOTAL OF PART I											
PART II	OTHER GENERAL REQUIREMENTS											
B.5	Project Billboard / Signboard	1	each									
B.7(2)	Occupational Safety and Health Program	10	month									
B.9	Mobilization	1	lot									
B.9	Demobilization	1	lot									
B.24	Scaffolding (Rental)	18,442	sq.m.									
	TOTAL OF PART II											
PART III	PLUMBING / SANITARY, ELECTRICAL, MECHANICAL AND FIRE PROTECTION WORKS											
PART III.A	PLUMBING / SANITARY WORKS											
PART III.A.1	Sewer Line Works											
1001 (1) a5	50mm Ø PVC Pipe and Fittings with Hanger/Support	1,355	Lm.									
1001 (1) a6	75mm Ø PVC Pipe and Fittings with Hanger/Support	375	Lm.									
1001 (1) a7	100mm Ø PVC Pipe and Fittings with Hanger/Support	715	Lm.									
1001 (1) d	Elevator Pit Assembly	1	set									
PART III.A.2	Waterline Works											
1002 (2) a3	20mm Ø PPR Pipe and Fittings with Hanger/Support	426	Lm.									
1002 (2) b3	25mm Ø PPR Pipe and Fittings with Hanger/Support	218	Lm.									
1002 (2) c3	32mm Ø PPR Pipe and Fittings with Hanger/Support	73	Lm.									
1002 (2) d3	40mm Ø PPR Pipe and Fittings with Hanger	80	Lm.									
1002 (2) e3	50mm Ø PPR Pipe and Fittings with Hanger/Support	173	Lm.									
1002 (2) f3	65mm Ø PPR Pipe and Fittings with Hanger/Support	67	Lm.									
1002 (2) h3	90mm Ø PPR Pipe and Fittings with Hanger/Support	13	Lm.									
1002 (2) i3	110mm Ø PPR Pipe and Fittings with Hanger/Support	111	Lm.									
PART III.A.3	Storm Drainage and Downspouts											
1001 (1) a6	75mm Ø PVC Pipe and Fittings with Hanger/Support	290	Lm.									
1001 (1) a7	100mm Ø PVC Pipe and Fittings with Hanger/Support	850	Lm.									
1001 (1) a9	200mm Ø PVC Pipe and Fittings with Hanger/Support	145	Lm.									
1001 (1) a11	315mm Ø PVC Pipe and Fittings with Hanger/Support	65	Lm.									
PART III.A.4	Plumbing / Sanitary Fixtures											
1002 (5) a	Water Closet, Elongated, Tank Type, with Complete Accessories, Pipes and Fittings	93	set									
1002 (9) b	Urinal, Flush Valve Lever Type, with Complete Accessories, Pipes and Fittings	58	set									
1002 (11) a	Kitchen Sink with Faucet, Single Tub with Grease Trap (Sgpm) and Complete Accessories, Pipes and Fittings	9	set									
1002 (14) a	Lavatory Wall Hung with Faucet and Complete Accessories, Pipes and Fittings	7	set									
1002 (15) a	Lavatory Counter Top with Faucet and Complete Accessories, Pipes and Fittings	71	set									
1002 (16) a3	Floor Drain, 100mmØ, Stainless with Complete Accessories and Fittings	164	set									
1002 (16) c3	Deck Drain, 100mmØ with Complete Accessories and Fittings	18	set									
1002 (16) d3	Trench Drain, 75mmØ, Stainless with Complete Accessories and Fittings	42	set									
1002 (16) e3	Roof Drain, 150mmØ with Complete Accessories and Fittings	15	set									
1002 (22)	Hose Bibb	12	set									
1002 (23)	PVC Roof Vent with Grilles	2	set									
PART III.A.5	Valves and Fittings											
1201(12) b1	25mm Ø Gate Valve	9	pc									
1201(12) c1	32mm Ø Gate Valve	20	pc									
1201(12) d1	40mm Ø Gate Valve	6	pc									
1201(12) e1	50mm Ø Gate Valve	2	pc									
1201(12) f1	65mm Ø Gate Valve	1	pc									
1201(12) h3	90mm Ø Foot Valve	2	pc									
1201(12) h4	90mm Ø OS&Y Valve	3	pc									
1201(12) i2	100mm Ø Check Valve	5	pc									
1201(12) i3	100mm Ø Float Valve	2	pc									
1201(12) i4	100mm Ø OS&Y Valve	3	pc									
	TOTAL OF PART III.A											

ITEM CODE	DESCRIPTION	QUANTITY	UNIT	ESTIMATED DIRECT COST	MARK-UP IN %		TOTAL MARK-UP		VAT	TOTAL INDIRECT COST	TOTAL COST	UNIT COST
					OCM	PROFIT	%	VALUE				
PART III.B	ELECTRICAL WORKS											
PART III.B.1 Conduit, Boxes and Fittings												
1100 (2) a	15mmØ IMC Pipe	7,409	piece									
1100 (2) b	20mmØ IMC Pipe	1,061	piece									
1100 (2) c	25mmØ IMC Pipe	280	piece									
1100 (2) d	32mmØ IMC Pipe	286	piece									
1100 (2) e	40mmØ IMC Pipe	489	piece									
1100 (2) f	50mmØ IMC Pipe	130	piece									
1100 (2) g	65mmØ IMC Pipe	86	piece									
1100 (2) h	75mmØ IMC Pipe	92	piece									
1100 (2) i	90mmØ IMC Pipe	416	piece									
1100 (2) j	100mmØ IMC Pipe	148	piece									
1100	Cable Tray, 200mm x 400mm x 2400mm, with Nuts and Bolts	40	unit									
1100	15mmØ Flexible Metal Conduit	5,156	Lm.									
1100	15mmØ Straight Connector	6,034	piece									
1100	Liquid Tight Flexible metal conduit 3/4" dia.	111	Lm.									
1100	25mmØ Liquid Tight Straight Connector	84	piece									
1100	100mm x 100mm Metal Junction Box with Cover	3,061	set									
1100	50mm x 100mm Metal Utility Box	185	set									
1100	4-11/16" Square Box with cover	475	set									
1100	Fabricated Pull Box (0.30m x 0.30m x 0.35m)	36	piece									
1100	Wire Gutter, 300mm x 300mm x 2000mm, with Terminal Lugs	10	piece									
1100	Electrical Pullbox, gal#16 with support and other related accessories	2	piece									
1100 (2)	15mmØ IMC Locknut and Bushing	5,674	piece									
1100 (2)	20mmØ IMC Locknut and Bushing	1,869	piece									
1100 (2)	25mmØ IMC Locknut and Bushing	7	piece									
1100 (2)	40mmØ IMC Locknut and Bushing	26	piece									
1100 (2)	50mmØ IMC Locknut and Bushing	10	piece									
1100 (2)	65mmØ IMC Locknut and Bushing	8	piece									
1100 (2)	90mmØ IMC Locknut and Bushing	8	piece									
1100 (2)	100mmØ IMC Locknut and Bushing	38	piece									
1100	15mmØ IMC Elbow	1,625	13.50									
1100	20mmØ IMC Elbow	101	piece									
1100	25mmØ IMC Elbow	5	piece									
1100	40mmØ IMC Elbow	34	piece									
1100	50mmØ IMC Elbow	14	piece									
1100	65mmØ IMC Elbow	8	piece									
1100	90mmØ IMC Elbow	8	piece									
1100	100mmØ IMC Elbow	38	piece									
PART III.B.2 Wires and Wiring Devices												
1101	250mm² THHN Wire	7,948	Lm.									
1101	200mm² THHN Wire	1,003	Lm.									
1101	150mm² THHN Wire	673	Lm.									
1101	125mm² THHN Wire	794	Lm.									
1101	80mm² THHN Wire	543	Lm.									
1101	60mm² THHN Wire	2,625	Lm.									
1101	50mm² THHN Wire	3,107	Lm.									
1101	38mm² THHN Wire	2,255	Lm.									
1101	30mm² THHN Wire	3,523	Lm.									
1101	22mm² THHN Wire	3,173	Lm.									
1101	14mm² THHN Wire	4,343	Lm.									
1101	8.0mm² THHN Wire	7,114	Lm.									
1101	5.5mm² THHN Wire	4,453	Lm.									
1101	3.5mm² THHN Wire	55,110	Lm.									
1101	2.0mm² THHN Wire	16,255	Lm.									
1101	200mm² Fire Rate Cable	515	Lm.									
1101	30mm² Fire Rated Cable	172	Lm.									
1101	3-Core XLPE 100mm² 133% Insulation	112	Lm.									
1101	Outlet with Grounding, One-Gang	86	piece									
1101	Outlet with Grounding, Two-Gang	308	piece									
1101	Two-Gang Floor mounted Outlet with cover	66	piece									
1101	Ground Fault Circuit Interrupter Outlet 250V/20A	31	piece									
1101	Special Outlet with Grounding	13	piece									
1101	Switch with Plate and Cover, One-Gang	50	piece									
1101	Switch with Plate and Cover, Two-Gang	57	piece									
1101	Switch with Plate and Cover, Three-Gang	33	piece									
1101	Switch with Plate and Cover, One-Gang, Three Way	76	piece									
1101	Switch with Plate and Cover, Two-Gang, Three Way	16	piece									

ITEM CODE	DESCRIPTION	QUANTITY	UNIT	ESTIMATED DIRECT COST	MARK-UP IN %		TOTAL MARK-UP		VAT	TOTAL INDIRECT COST	TOTAL COST	UNIT COST
					OCM	PROFIT	%	VALUE				
PART III.B.3 Panelboard with Main and Branch Breakers												
1102	ATS-1 (LVSG MAIN) GROUND FLOOR	1	assy									
1102	MECB (POWER HOUSE) GROUND FLOOR	1	assy									
1102	ATS-2 (BLSS MAIN) GROUND FLOOR	1	assy									
1102	MFPJP (GROUND FLOOR)	1	assy									
1102	MDPACU (AIRCON-GROUND FLOOR)	1	assy									
1102	DPCHWP (GROUND FLOOR)	1	assy									
1102	DPMECH (GROUND FLOOR)	1	assy									
1102	DPA (GROUND FLOOR)	1	assy									
1102	DPB (SECOND FLOOR)	1	assy									
1102	DPC (THIRD FLOOR)	1	assy									
1102	DPD (FOURTH FLOOR)	1	assy									
1102	DPE (FIFTH FLOOR)	1	assy									
1102	DPTH (THEATER)	1	assy									
1102	DPAC1 (GROUND FLOOR)	1	assy									
1102	DPAC2 (GROUND FLOOR)	1	assy									
1102	PPACB1 (BASEMENT)	1	assy									
1102	PPACGF1 (GROUND FLOOR)	1	assy									
1102	PPACGF2 (GROUND FLOOR)	1	assy									
1102	PPACGF3 (GROUND FLOOR)	1	assy									
1102	PPAC2F1 (SECOND FLOOR)	1	assy									
1102	PPAC2F2 (SECOND FLOOR)	1	assy									
1102	PPFC3F1 (THIRD FLOOR)	1	assy									
1102	PPAC4F1 (FOURTH FLOOR)	1	assy									
1102	PPAC4F2 (FOURTH FLOOR)	1	assy									
1102	PPAC5F1 (FIFTH FLOOR)	1	assy									
1102	PPAC5F2 (FIFTH FLOOR)	1	assy									
1102	PP-PUMP (BASEMENT 1)	1	assy									
1102	PP-ESC (FOURTH FLOOR) TYP. TO PP-ESC 3F AND 2F	3	assy									
1102	PP-ELEV (FIFTH FLOOR)	1	assy									
1102	PPBLSB1 (BASEMENT 1)	1	assy									
1102	PPSEF 2F (SECOND FLOOR)	1	assy									
1102	PPSEF 5F (FIFTH FLOOR)	1	assy									
1102	PP-BLS 5F (FIFTH FLOOR)	1	assy									
1102	L1S1 (THEATER)	1	assy									
1102	L1S2 (THEATER)	1	assy									
1102	L1S3 (THEATER)	1	assy									
1102	L1F (KIOSK - GROUND FLOOR)	1	assy									
1102	L01 (GROUND FLOOR)	1	assy									
1102	L1 (GROUND FLOOR)	1	assy									
1102	L1B (GROUND FLOOR)	1	assy									
1102	L1G (KIOSK - GROUND FLOOR)	1	assy									
1102	L1K (KIOSK - GROUND FLOOR)	1	assy									
1102	L1R (KIOSK - GROUND FLOOR)	1	assy									
1102	L1L (KIOSK - GROUND FLOOR)	1	assy									
1102	LPPR (RAMP)	1	assy									
1102	L2 (SECOND FLOOR)	1	assy									
1102	L2S (SECOND FLOOR)	1	assy									
1102	L2S1 (SECOND FLOOR)	1	assy									
1102	L2R (SECOND FLOOR)	1	assy									
1102	L3 (THIRD FLOOR)	1	assy									
1102	L3S (THIRD FLOOR)	1	assy									
1102	L4 (FOURTH FLOOR)	1	assy									
1102	L4S (FOURTH FLOOR)	1	assy									
1102	L5 (FIFTH FLOOR)	1	assy									
1102	L5S (FIFTH FLOOR)	1	assy									
1102	L5S1 (FIFTH FLOOR)	1	assy									
1102	ECB, 1200AT , 3P, 400V	3	assy									
1102	ECB, 600AT , 3P, 400V	4	assy									
1102	ECB, 250AT , 3P, 400V	1	assy									
1102	ECB, 200AT , 3P, 400V	2	assy									
1102	ECB, 175AT , 3P, 400V	4	assy									
1102	ECB, 150AT , 3P, 400V	5	assy									
1102	ECB, 125AT , 3P, 400V	4	assy									
1102	ECB, 100AT , 3P, 400V	13	assy									
1102	ECB, 70AT , 3P, 400V	8	assy									
1102	ECB, 60AT , 3P, 400V	11	assy									
1102	ECB, 50AT , 3P, 400V	7	assy									
1102	ECB, 40AT , 3P, 400V	4	assy									
1102	ECB, 50AT , 1P, 230V	2	assy									
1102	ECB, 40AT , 1P, 230V	4	assy									
1102	ECB, 30AT , 1P, 230V	20	assy									
1102	ECB, 20AT , 1P, 230V	66	assy									

ITEM CODE	DESCRIPTION	QUANTITY	UNIT	ESTIMATED DIRECT COST	MARK-UP IN %		TOTAL MARK-UP		VAT	TOTAL INDIRECT COST	TOTAL COST	UNIT COST
					OCM	PROFIT	%	VALUE				
1102	800kW/1000KVA, 400V, 3P, 60Hz, 1800rpm, Diesel Engine Generator Set (Stand-by)	1	assy									
1102	600kW/750KVA, 400V, 3P, 60Hz, 1800rpm, Diesel Engine Generator Set (Stand-by)	2	assy									
1102	2500KVA, 34.5kV, 400Y/230V, 3phase, 4 Wire Dry-Type Cast Resin	1	assy									
1102	MVSG(Medium Voltage Switchgear) NEMA 3R	1	assy									
1102	EMDP (GSSB SYNCHRONIZING PANEL)	1	assy									
1102	Electric Sub-meter	6	set									
PART III.B.4 Lighting Fixtures and Lamps												
1103(1)	14watts Suspended Downlight	341	set									
1103(1)	14watts surfaced mounted Downlight	368	set									
1103(1)	1200mm x 300mm Surface Mounted Troffer Type Lighting Fixture, 1-18Watts Daylight LED Tube with complete	305	set									
1103(1)	1200mm x 600mm, 60W LED Surface Mounted Panel Light with complete accessories	12	set									
1103(1)	40Watts Industrial Pendant Lighting Fixture	216	set									
1103(1)	Dustproof Lighting Fixture with 2-18Watts T8 Daylight LED Tube, Recessed Type with complete accessories	301	set									
1103(1)	Chandelier	5	set									
1103(1)	1200x70x40mm Hanging Linear Pendent Lighting 18watts	110	set									
1103(1)	100 Watts LED Economy High Bay Lighting Fixture	95	set									
1103(1)	7 watts LED Strip Light (warm white)	926	lm.									
1103(1)	7 watts LED Strip Light(outdoor)	25	set									
1103(1)	7watts Garden light(Uplight) (Day light)	54	set									
1103(1)	Step Light	42	set									
1103(1)	Emergency Light, Twin-Head	183	piece									
1103(1)	Exit Light (Ceiling Mounted)	56	piece									
1103(1)	11 watts SpotLight (warm white)	8	set									
1103(1)	1200mm Box Type Lighting Fixture 18watts T8 LED Tube	95	set									
1103(1)	40watts hallway Lighting Fixture Dome Light	78	set									
1103(1)	9watts Pinlight	272	set									
1103(1)	15watts Pinlight	135	set									
1103(1)	6 lights Track Light	1	set									
PART III.B.5 Auxiliary System												
1104(1)	15mmØ EMT Pipe	55	piece									
1104(1)	20mmØ EMT Pipe	1,600	piece									
1104(1)	40mmØ EMT Pipe	90	piece									
1104(1)	15mmØ EMT Coupling, Compression type	55	piece									
1104(1)	20mmØ EMT Coupling, Compression type	1,600	piece									
1104(1)	40mmØ EMT Coupling, Compression type	90	piece									
1104(1)	15mmØ EMT Elbow	60	piece									
1104(1)	20mmØ EMT Elbow	432	piece									
1104(1)	40mmØ EMT Elbow	25	piece									
1104(1)	15mmØ EMT Connector, Compression type	68	piece									
1104(1)	20mmØ EMT Connector, Compression type	1,067	piece									
1104(1)	40mmØ EMT Connector, Compression type	60	piece									
1104(1)	100mm x 100mm Metal Junction Box with Cover	841	piece									
1104(1)	50mm x 100mm Metal Utility Box	86	piece									
1104(1)	4-11/16" Square Box with cover	200	piece									
1104(1)	Fabricated Pull Box (0.30m x 0.30m x 0.35m)	1	piece									
1104(1)	Pull Box (6x6x8)	12	piece									
1104(1)	20mmØ Flexible Metal Conduit	654	piece									
1104(1)	20mmØ Straight Connector	654	piece									
1104(1)	1.25mm² TF Wire	9,000	lm									
1104(1)	UTP Cable, CAT6, 4-Pairs	305	lm									
1104(1)	Smoke Detector	208	piece									
1104(1)	Heat Detector	13	piece									
1104(1)	Manual Pull Station and Horn with Strobe Light	43	set									
1104(1)	Fire Alarm Control Panel (Addressable)	1	piece									
1104(1)	6002-02 Loop Expansion Card	2	piece									
1104(1)	12V 7AH Battery	2	piece									
1104(1)	Input/Output Module	74	piece									
1104(1)	Beam Detector	3	piece									
1105(1)	Beam Detector Module	3	piece									
1105(1)	Reflector	12	piece									
1105(1)	24V External Power Supply	3	piece									

ITEM CODE	DESCRIPTION	QUANTITY	UNIT	ESTIMATED DIRECT COST	MARK-UP IN %		TOTAL MARK-UP		VAT	TOTAL INDIRECT COST	TOTAL COST	UNIT COST
					OCM	PROFIT	%	VALUE				
PART III.B.6 Network Cabling System												
1105	20mmØ PVC Pipe	154	piece									
1105	25mmØ PVC Pipe	42	piece									
1105	40mmØ PVC Pipe	36	piece									
1105	20mmØ EMT Pipe	113	piece									
1105	25mmØ EMT Pipe	55	piece									
1105	40mmØ EMT Pipe	23	piece									
1105	20mmØ PVC Elbow	47	piece									
1105	25mmØ PVC Elbow	14	piece									
1105	40mmØ PVC Elbow	8	piece									
1105	20mmØ EMT Elbow	35	-									
1105	25mmØ EMT Elbow	17	piece									
1105	40mmØ EMT Elbow	8	piece									
1105	20mmØ PVC Locknut and Bushing	103	piece									
1105	25mmØ PVC Locknut and Bushing	29	piece									
1105	40mmØ PVC Locknut and Bushing	24	piece									
1105	20mmØ EMT Connector, Compression type	76	piece									
1105	25mmØ EMT Connector, Compression type	37	piece									
1105	40mmØ EMT Connector, Compression type	16	piece									
1105	20mmØ EMT Coupling, Compression type	113	piece									
1105	25mmØ EMT Coupling, Compression type	55	piece									
1105	40mmØ EMT Coupling, Compression type	23	piece									
1105	100mm x 100mm Metal Junction Box with Cover	90	piece									
1105	50mm x 100mm Metal Utility Box	127	piece									
1105	4-11/16" Square Box with cover	27	piece									
1105	Fabricated Pull Box (4x4x2)	30	piece									
1105	Fabricated Pull Box (4x4x4)	4	piece									
1105	Fabricated Pull Box (6x6x4)	13	piece									
1105	Cable Tray w/ Coupling and Connector 100mmx50mm (2.5m each)	130	piece									
1105	Cable Tray Horizontal Elbow 100MMx50MM	10	piece									
1105	Cable Tray TEE 100MMx50MM	4	piece									
1105	Cable Tray CROSS 100MMx50MM	3	piece									
1105	UTP Cable, CAT6, 4-Pairs	8,540	1m									
1105	Fiber Optic (2-Core) Plenum Cable	865	1.m.									
1105	Universal LAN Outlet, Dual-Port	29	piece									
1105	Universal LAN Outlet, Single-Port	59	piece									
1105	I/O Dual Gang / Duplex Faceplate with Black Insert White	166	piece									
1105	Outlet for Wireless Access Device	11	piece									
1105	MDF (41U)	1	assy									
1105	IDF 1 (10U)	1	assy									
1105	IDF 2 (10U)	1	assy									
1105	IDF 3 (10U)	1	assy									
1105	IDF 4 (10U)	1	assy									
1105	IDF 5 (10U)	1	assy									
1105	IDF 6 (10U)	1	assy									
1105	IDF 7 (10U)	1	assy									
1105	IP Phone	42	piece									
1105	Fiber Patch Cable (SC, Duplex, SM)	8	piece									
1105	SFP Module (SC, Duplex, SM)	16	piece									
1105	Fiber Pigtail (SC, Duplex,SM 1m)	16	piece									
1105	Horizontal Cable Manager 1RU	20	piece									
1105	Cantilever Tray	18	piece									
1105	CAT6 Patch Cable 1m	181	1.m.									
1105	CAT6 Patch Cable 2m	2	1.m.									
1105	RJ-45 Connector CAT6	500	piece									
1105	Pop up Data Outlet (Simplex)	29	piece									
1105	Pop up Data Outlet (Duplex)	10	piece									

ITEM CODE	DESCRIPTION	QUANTITY	UNIT	ESTIMATED DIRECT COST	MARK-UP IN %		TOTAL MARK-UP		VAT	TOTAL INDIRECT COST	TOTAL COST	UNIT COST
					OCM	PROFIT	%	VALUE				
PART III.B.7 CCTV System												
1106	20mmØ EMT Pipe	500	piece									
1106	25mmØ EMT Pipe	140	piece									
1106	40mmØ EMT Pipe	143	piece									
1106	20mmØ PVC Pipe	33	piece									
1106	20mmØ EMT Connector, Compression type	334	piece									
1106	25mmØ EMT Connector, Compression type	94	piece									
1106	40mmØ EMT Connector, Compression type	96	piece									
1106	20mmØ PVC Locknut and Bushing	23	piece									
1106	20mmØ EMT Coupling, Compression type	500	piece									
1106	25mmØ EMT Coupling, Compression type	140	piece									
1106	40mmØ EMT Coupling, Compression type	143	piece									
1106	20mmØ EMT Elbow	151	piece									
1106	25mmØ EMT Elbow	43	piece									
1106	40mmØ EMT Elbow	44	piece									
1106	20mmØ PVC Elbow	11	piece									
1106	100mm x 100mm Metal Junction Box	238	piece									
1106	100mm x 100mm Metal Junction Box	95	piece									
1106	100mm x 100mm PVC Junction Box	12	piece									
1106	100mm x 100mm PVC Square Box	5	piece									
1106	100mmx100mm Weatherproof Junction Box With Cover	27	piece									
1106	Pull Box (6x6x4)	6	piece									
1106	Pull Box (8x8x4)	5	piece									
1106	15mm Metal Flexible Cduit	71	l.m.									
1106	15mm Straight Connector	142	piece									
1106	15mm Liquid tight Metal Flexible Cduit	27	l.m.									
1106	15mm Liquid tight Straight Connector	54	piece									
1106	UTP Cable, CAT6, 4-Pairs	8,160	l.m									
1106	HD CCTV Camera, IP-based, Bullet Type	27	piece									
1106	HD CCTV Camera, IP-based, Dome Type	71	piece									
1106	43" 4K UHD Smart Monitor LED Display	4	piece									
1106	NVR 32 Channel	4	piece									
1106	Uninterruptible Power Supply, 650VA	5	piece									
1106	Uninterruptible Power Supply, 2kVA	1	piece									
1106	MDF PoE	1	set									
1106	Monitor Mounting Bracket	4	piece									
1106	SFP Module (SC , Duplex, SM)	4	piece									
1106	Fiber Pigtail (SC , Duplex, SM 1m)	4	piece									
1106	HDD (6TB)	12	piece									
1106	Data Cabinet 6 ft. 600x600	5	piece									
1106	Data Cabinet 6 ft. 600x600	1	piece									
1106	Fiber Cable (2 core)	208	l.m.									
1106	24-Port Patch Panel (loaded Cat6)	8	piece									
1106	Horizontal Cable Manager 1RU	10	piece									
1106	Cat6 Patch Cable 1m	100	piece									
1106	Cat6 Patch Cable 2m	5	piece									
1106	RJ-45 Connecto Cat6	300	piece									
1106	HDMI Cable (10m)	4	piece									
1106	Cable Duct 4"x2"x2.5m	4	piece									

ITEM CODE	DESCRIPTION	QUANTITY	UNIT	ESTIMATED DIRECT COST	MARK-UP IN %		TOTAL MARK-UP		VAT	TOTAL INDIRECT COST	TOTAL COST	UNIT COST
					OCM	PROFIT	%	VALUE				
PART III.B.8 Public Address System												
1107	20mmØ EMT Pipe	690	piece									
1107	25mmØ EMT Pipe	45	piece									
1107	20mmØ EMT Elbow	207	piece									
1107	25mmØ EMT Elbow	14	piece									
1107	20mmØ EMT Connector, Compression type	460	piece									
1107	25mmØ EMT Connector, Compression type	30	piece									
1107	20mmØ EMT Coupling, Compression type	690	piece									
1107	25mmØ EMT Coupling, Compression type	45	piece									
1107	100mm x 100mm Metal Junction Box	679	piece									
1107	Metal Square Box with cover	135	piece									
1107	Utility Box	6	piece									
1107	Fabricated Pull Box (0.30mx0.30mx0.35m)	1	piece									
1107	Pull Box (6x6x6)	12	piece									
1107	20mm Metal Flexible Cduit	306	l.m.									
1107	20mm Straight Connector	408	piece									
1107	Ceiling Speaker	198	piece									
1107	Volume control	6	piece									
1107	Voice Alarm Call Station, 6 Zones	1	piece									
1107	BGM Source (DVD,CD/MP3 Player + Tuner)	1	piece									
1107	Voice Alarm Controller	1	piece									
1107	AWG #16 TF Wire	25	roll									
1107	Wall Speaker (20W)	6	piece									
1107	Voice Alarm System Controller Extender (500W + 8 ZONES)	2	piece									
1107	2.2kVA UPS	1	piece									
1107	UTP CAT6 Patch Cable 5m	1	piece									
1107	UTP CAT6 Patch Cable 2m	2	piece									
1107	RCA-RCA Cable 2m	1	piece									
1107	PA Equipment Cabinet	1	piece									
PART III.B.9 Grounding System												
1109	32mmØ PVC Pipe	47	piece									
1109	50mm² Bare Copper Wire	88	l.m.									
1109	100mm² Bare Copper Wire	77	l.m.									
1109	Grounding Busbar	7	piece									
1109	20mm Ø x 3000mm Grounding Rod (Copper Clad) with Ground Clamp	18	set									
1109	Ground Well with Cover	3	set									
1109	Lightning Protection Terminal (ESE) 100m radius	1	piece									
1109	Pull Box (200mm X 200mm X 150mm)	8	piece									
PART III.B.10 Miscellaneous Electrical / Civil Works												
1111	Concrete Encasement, 25-110mm dia. PVC	32.88	l.m.									
1111	Concrete Pedestal 5-110mm dia. PVC	22	l.m.									
1111	Manhole (1800mm x 1800mm x 1400mm)	2	piece									
1111	First Private Pole	1	piece									
	TOTAL OF PART III.B											

ITEM CODE	DESCRIPTION	QUANTITY	UNIT	ESTIMATED DIRECT COST	MARK-UP IN %		TOTAL MARK-UP		VAT	TOTAL INDIRECT COST	TOTAL COST	UNIT COST
					OCM	PROFIT	%	VALUE				
PART III.C	MECHANICAL WORKS											
PART III.C.1	Air-Conditioning System - Roughing-ins											
1200 (15)	6.35mm Ø Refrigerant Pipe with Insulation and Hanger	81	Lm.									
1200 (15) a	9.50mm Ø Refrigerant Pipe with Insulation and Hanger	714	Lm.									
1200 (15) b	12.70mm Ø Refrigerant Pipe with Insulation and Hanger	231	Lm.									
1200 (15) c	15.90mm Ø Refrigerant Pipe with Insulation and Hanger	663	Lm.									
1200 (15) d	19mm Ø Refrigerant Pipe with Insulation and Hanger	74	Lm.									
1200 (15) e	22mm Ø Refrigerant Pipe with Insulation and Hanger	83	Lm.									
1200 (15) f	28.60mm Ø Refrigerant Pipe with Insulation and Hanger	432	Lm.									
1200 (15) g	38mm Ø Refrigerant Pipe with Insulation and Hanger	37	Lm.									
PART III.C.2	Air-Conditioning System - Split Type											
1200 (13) a1	FCU Wall Mounted Type with Cooling Capacity of 0.75 TR	1	unit									
1200 (13) a2	FCU Ceiling Cassette Type with Cooling Capacity of 2.0 TR	1	unit									
1200 (13) a3	FCU Wall Mounted Type with Cooling Capacity of 1.0 TR	1	unit									
1200 (13) a4	FCU Ceiling Concealed Ducted Type with Cooling Capacity of 2.0 TR	2	unit									
PART III.C.3	Air-Conditioning System - VRV / VRF FCU Equipment											
1200 (13) b1	FCU Ceiling Cassette Type with Cooling Capacity of 1.0 TR	10	unit									
1200 (13) b2	FCU Ceiling Cassette Type with Cooling Capacity of 1.5 TR	16	unit									
1200 (13) b3	FCU Ceiling Cassette Type with Cooling Capacity of 2.0 TR	7	unit									
1200 (13) b4	FCU Ceiling Cassette Type with Cooling Capacity of 2.5 TR	10	unit									
1200 (13) b5	FCU Ceiling Cassette Type with Cooling Capacity of 3.0 TR	2	unit									
1200 (13) b6	FCU Ceiling Cassette Type with Cooling Capacity of 3.5 TR	31	unit									
1200 (13) b7	FCU Ceiling Cassette Type with Cooling Capacity of 4.0 TR	2	unit									
1200 (13) b8	FCU Ceiling Cassette Type with Cooling Capacity of 4.5 TR	2	unit									
1200 (13) b9	FCU Wall Mounted Type with Cooling Capacity of 1.0 TR	4	unit									
1200 (13) b10	FCU Wall Mounted Type with Cooling Capacity of 1.5 TR	3	unit									
1200 (13) b11	FCU Wall Mounted Type with Cooling Capacity of 2.0 TR	6	unit									
1200 (13) b12	FCU Wall Mounted Type with Cooling Capacity of 2.5 TR	2	unit									
1200 (13) b13	FCU Ceiling Concealed Ducted Type with Cooling Capacity of 4.0 TR	1	unit									
1200 (13) b14	PFCU Ceiling Concealed Ducted Type with Cooling Capacity of 4.0 TR	18	unit									
1200 (13) b15	PFCU Ceiling Concealed Ducted Type with Cooling Capacity of 8.0 TR	1	unit									
PART III.C.4	Air-Conditioning System - VRV / VRF ACCU Equipment											
1200 (13) b16	ACCU with Cooling Capacity of 9.60 TR	2	unit									
1200 (13) b17	ACCU with Cooling Capacity of 11.20 TR	1	unit									
1200 (13) b18	ACCU with Cooling Capacity of 14.40 TR	10	unit									
1200 (13) b19	ACCU with Cooling Capacity of 16.00 TR	2	unit									
1200 (13) b20	ACCU with Cooling Capacity of 17.60 TR	5	unit									
1200 (13) b21	ACCU with Cooling Capacity of 19.20 TR	1	unit									
1200 (13) b22	ACCU with Cooling Capacity of 20.80 TR	1	unit									

ITEM CODE	DESCRIPTION	QUANTITY	UNIT	ESTIMATED DIRECT COST	MARK-UP IN %		TOTAL MARK-UP		VAT	TOTAL INDIRECT COST	TOTAL COST	UNIT COST
					OCM	PROFIT	%	VALUE				
PART III.C.5	Air-Conditioning System - Centralized Airconditioning Roughing-ins											
1202 (9)	20mmØ, B.I. Pipe, Fittings and Hanger/Support with Insulation	36	Lm.									
1202 (9) a	25mmØ, B.I. Pipe, Fittings and Hanger/Support with Insulation	282	Lm.									
1202 (9) b	32mmØ, B.I. Pipe, Fittings and Hanger/Support with Insulation	48	Lm.									
1202 (9) c	40mmØ, B.I. Pipe, Fittings and Hanger/Support with Insulation	300	Lm.									
1202 (9) d	50mmØ, B.I. Pipe, Fittings and Hanger/Support with Insulation	102	Lm.									
1202 (9) e	65mmØ, B.I. Pipe, Fittings and Hanger/Support with Insulation	204	Lm.									
1202 (9) f	75mmØ, B.I. Pipe, Fittings and Hanger/Support with Insulation	288	Lm.									
1202 (9) h	100mmØ, B.I. Pipe, Fittings and Hanger/Support with Insulation	606	Lm.									
1202 (9) i	125mmØ, B.I. Pipe, Fittings and Hanger/Support with Insulation	30	Lm.									
1202 (9) j	150mmØ, B.I. Pipe, Fittings and Hanger/Support with Insulation	120	Lm.									
1202 (9) k	200mmØ, B.I. Pipe, Fittings and Hanger/Support with Insulation	30	Lm.									
1202 (9) l	250mmØ, B.I. Pipe, Fittings and Hanger/Support with Insulation	108	Lm.									
PART III.C.6	Air-Conditioning System - Centralized Airconditioning Air Cooled Chiller Equipment											
1200 (13) c1	Air Cooled Chiller with Cooling Capacity of 256.20TR and Complete Accessories	3	unit									
PART III.C.7	Air-Conditioning System - Centralized Chilled Airconditioning Equipment											
1200 (13) c2	Air Handling Unit with Cooling Capacity of 70.00 TR	4	unit									
1200 (13) c3	Air Handling Unit with Cooling Capacity of 50.00 TR	2	unit									
1200 (13) c4	Air Handling Unit with Cooling Capacity of 15.00 TR	2	unit									
1200 (13) c5	FCU Ceiling Cassette Type with Cooling Capacity of 5.0 TR	31	unit									
1200 (13) c6	FCU Ceiling Concealed Ducted Type with Cooling Capacity of 4.0 TR	2	unit									
1200 (13) c7	PFCU Ceiling Concealed Ducted Type with Cooling Capacity of 4.5 TR	1	unit									
1200 (13) c8	FCU Ceiling Concealed Ducted Type with Cooling Capacity of 5.0 TR	18	unit									
1200 (13) c9	PFCU Ceiling Concealed Ducted Type with Cooling Capacity of 6.0 TR	1	unit									
1200 (13) c10	PFCU Ceiling Concealed Ducted Type with Cooling Capacity of 8.0 TR	2	unit									
PART III.C.8	Air-Conditioning System - Chilled Water Pump and Tanks											
1200 (13) c11	Chilled Water Pump, 600 GPM, 150ft TDH	3	unit									
1200 (13) c12	Chemical Pot Feeder	1	assy									
1200 (13) c13	Expansion Tank	1	assy									
PART III.C.9	Ventilation System - Roughing-ins											
1200 (17) a	100mm Ø PVC Exhaust Pipe and Fittings with Hanger	15	Lm.									

ITEM CODE	DESCRIPTION	QUANTITY	UNIT	ESTIMATED DIRECT COST	MARK-UP IN %		TOTAL MARK-UP		VAT	TOTAL INDIRECT COST	TOTAL COST	UNIT COST
					OCM	PROFIT	%	VALUE				
PART III.C.10	Ventilation System - Equipment											
1200 (4) a	Ceiling Fan	2	set									
1200 (4) a1	Ceiling Mounted Exhaust Fan, 25 LPS	11	set									
1200 (4) a2	Ceiling Mounted Exhaust Fan, 50 LPS	1	set									
1200 (4) a3	In-Line Centrifugal Fan, 75 LPS	1	set									
1200 (4) a4	In-Line Centrifugal Fan, 150 LPS	3	set									
1200 (4) a5	In-Line Centrifugal Fan, 175 LPS	2	set									
1200 (4) a6	In-Line Centrifugal Fan, 200 LPS	2	set									
1200 (4) a7	In-Line Centrifugal Fan, 225 LPS	7	set									
1200 (4) a8	In-Line Centrifugal Fan, 275 LPS	1	set									
1200 (4) a9	In-Line Centrifugal Fan, 300 LPS	1	set									
1200 (4) a10	In-Line Centrifugal Fan, 350 LPS	1	set									
1200 (4) a11	In-Line Centrifugal Fan, 385 LPS	1	set									
1200 (5) a1	Belt Driven Axial Flow Fan, 750 LPS	2	set									
1200 (5) a2	Belt Driven Axial Flow Fan, 920 LPS	1	set									
1200 (5) a3	Belt Driven Axial Flow Fan, 1020 LPS	1	set									
1200 (5) a4	Belt Driven Axial Flow Fan, 1380 LPS	1	set									
1200 (5) a5	Belt Driven Axial Flow Fan, 8050 LPS	2	set									
1200 (5) a6	Belt Driven Axial Flow Fan, 14580 LPS	4	set									
1200 (5) a7	Belt Driven Axial Flow Fan, 33500 LPS	1	set									
1200 (5) b1	Wall Mounted Exhaust Fan, 400 LPS	1	set									
1200 (5) b2	Wall Mounted Exhaust Fan, 455 LPS	1	set									
1200 (5) b3	Wall Mounted Exhaust Fan, 1700 LPS	2	set									
1200 (5) b4	Wall Mounted Exhaust Fan, 1900 LPS	1	set									
1200 (5) b5	Wall Mounted Exhaust Fan, 2100 LPS	1	set									
1200 (5) b6	Wall Mounted Exhaust Fan, 3500 LPS	2	set									
1200 (5) c1	Single Inlet Single Width Centrifugal Fan, 3540 LPS	2	set									
1200 (5) c2	Single Inlet Single Width Centrifugal Fan, 6600 LPS	2	set									
1200 (5) d1	One Way Nozzle Jet Fan, 2500 LPS	5	set									
PART III.C.11	Ventilation System - Duct Works											
1200 (6) a1	Ducting, 26 Gauge G.I. Sheet, Longest Dimension not Exceeding 300mm	571	Lm.									
1200 (6) a2	Ducting, 24 Gauge G.I. Sheet, Longest Dimension not Exceeding 301mm - 750mm	967	Lm.									
1200 (6) a3	Ducting, 22 Gauge G.I. Sheet, Longest Dimension not Exceeding 751mm - 1300mm	185	Lm.									
1200 (6) a4	Ducting, 20 Gauge G.I. Sheet, Longest Dimension not Exceeding 1301mm - 2100mm	1,500	Lm.									
1200 (6) a5	Ducting, 18 Gauge G.I. Sheet, Longest Dimension not Exceeding 2100mm	1,112	Lm.									
1200 (6) b1	Flexible Duct	1	set									
1200 (6) b4	Rockwool Insulation, 25mm Thick	4,150	Lm.									
1200 (6) c1	Ball Spout Jet Diffuser	1	set									
1200 (6) c2	Supply Ceiling Diffuser	1	set									
1200 (6) c3	Exhaust Air Grille	1	set									
1200 (6) c4	Fresh Air Grille	1	set									
1200 (6) c5	Kitchen Fresh Air Grille	2	pc									
1200 (6) c6	Return Air Grille	1	set									
1200 (6) c7	Smoke Extraction Grille	1	set									
1200 (6) c8	Supply Air Grille	1	set									
1200 (6) c9	Volume Damper	1	set									
1200 (6) c10	Fire Damper	1	set									
1200 (6) c11	Back Damper	2	pc									
1200 (6) c12	Dughouse Type Exhaust Wall Louver	1	pc									
1200 (6) c13	Exhaust Wall Louver with Insect Screen	1	set									
1200 (6) c14	Fresh Wall Louver with Insect Screen	1	set									
1200 (6) c15	Kitchen Exhaust Wall Louver with Insect Screen	1	pc									
1200 (6) c16	Kitchen Exhaust Wall Louver with Insect Screen	1	pc									
1200 (6) c17	Smoke Extraction Wall with Insect Screen	1	set									
1200 (6) c18	Exhaust Air Louver	4	pc									
1200 (6) c19	Fresh Air Louver	1	set									
1200 (6) c20	Radiator Exhaust Louver	2	pc									
1200 (6) c21	Plenum Box	1	set									
PART III.C.12	ESCALATOR											
1203(1)c1	Passenger Escalator	6	unit									
	TOTAL OF PART III.C											

ITEM CODE	DESCRIPTION	QUANTITY	UNIT	ESTIMATED DIRECT COST	MARK-UP IN %		TOTAL MARK-UP		VAT	TOTAL INDIRECT COST	TOTAL COST	UNIT COST
					OCM	PROFIT	%	VALUE				
PART III.D	FIRE PROTECTION WORKS											
PART III.D.1	FIRE PROTECTION WORKS - Roughing-Ins											
1202 (9) a	25mmØ, B.I. Pipe and Fittings with Hanger/Support	1,296	Lm.									
1202 (9) b	32mmØ, B.I. Pipe and Fittings with Hanger/Support	324	Lm.									
1202 (9) c	40mmØ, B.I. Pipe and Fittings with Hanger/Support	306	Lm.									
1202 (9) d	50mmØ, B.I. Pipe and Fittings with Hanger/Support	366	Lm.									
1202 (9) e	65mmØ, B.I. Pipe and Fittings with Hanger/Support	120	Lm.									
1202 (9) f	75mmØ, B.I. Pipe and Fittings with Hanger/Support	60	Lm.									
1202 (9) h	100mmØ, B.I. Pipe and Fittings with Hanger/Support	1,662	Lm.									
1202 (9) i	150mmØ, B.I. Pipe and Fittings with Hanger/Support	456	Lm.									
PART III.D.2	FIRE PROTECTION WORKS - Valves and Accessories											
1202 (10) a	Floor Control Valve Assembly	1	set									
1202 (10) b	Fire Pump Assembly	1	set									
1202(3)a	Sprinkler Head, Upright / Pendant / Sidewall	1,520	pc									
1202(5)	Fire Hose Cabinet Assembly	25	set									
1202(5) a3	Fire Extinguisher (ABC)	77	set									
1202(5) a4	Fire Extinguisher - Wheel Type	10	set									
PART III.D.3	FIRE PROTECTION WORKS - Pumps and											
1202 (2)	Fire Pump with complete control and standard accessories	2	set									
1202 (3)	Jockey Pump with complete control and standard accessories	1	set									
1201 (4)	Submersible Sump Pump with Control	2	set									
1201 (5)	Submersible Sewage Ejector Pump with Control	3	set									
1201 (6)	Booster Pump with Pressure Tank and Control	1	assy									
	TOTAL OF PART III.D											
	TOTAL OF PART III											
	GRAND TOTAL											

Section IX. Checklist of Technical and Financial Documents

Notes on the Checklist of Technical and Financial Documents

The prescribed documents in the checklist are mandatory to be submitted in the Bid, but shall be subject to the following:

- a. GPPB Resolution No. 09-2020 on the efficient procurement measures during a State of Calamity or other similar issuances that shall allow the use of alternate documents in lieu of the mandated requirements; or
- b. any subsequent GPPB issuances adjusting the documentary requirements after the effectivity of the adoption of the PBDs.

The BAC shall be checking the submitted documents of each Bidder against this checklist to ascertain if they are all present, using a non-discretionary “pass/fail” criterion pursuant to Section 30 of the 2016 revised IRR of RA No. 9184.

Checklist of Technical and Financial Documents

I. TECHNICAL COMPONENT ENVELOPE

Class “A” Documents

Legal Documents

- ☐ (a) Valid PhilGEPS Registration Certificate (Platinum Membership) (all pages);
and
- ☐ (b) Registration certificate from Securities and Exchange Commission (SEC), Department of Trade and Industry (DTI) for sole proprietorship, or Cooperative Development Authority (CDA) for cooperatives or its equivalent document;
and
- ☐ (c) Mayor’s or Business permit issued by the city or municipality where the principal place of business of the prospective bidder is located, or the equivalent document for Exclusive Economic Zones or Areas;
and
- ☐ (e) Tax clearance per E.O. No. 398, s. 2005, as finally reviewed and approved by the Bureau of Internal Revenue (BIR).

Technical Documents

- ☐ (f) Statement of the prospective bidder of all its ongoing government and private contracts, including contracts awarded but not yet started, if any, whether similar or not similar in nature and complexity to the contract to be bid (*please see attached prescribed forms required by the QC – BAC for Infrastructure and Consultancy*);
and
- ☐ (g) Statement of the bidder’s Single Largest Completed Contract (SLCC) similar to the contract to be bid, except under conditions provided under the rules with an attached Notice of Award, Notice to Proceed, Contract and Certificate of Acceptance (*please see attached prescribed form required by the QC – BAC for Infrastructure and Consultancy*); **and**
- ☐ (h) Philippine Contractors Accreditation Board (PCAB) License;
or
Special PCAB License in case of Joint Ventures;
and registration for the type and cost of the contract to be bid; **and**
- ☐ (i) Original copy of Bid Security. If in the form of a Surety Bond, submit also a certification issued by the Insurance Commission;
or
Original copy of Notarized Bid Securing Declaration; **and**
- ☐ (j) Project Requirements, which shall include the following:
 - ☐ a. Organizational chart for the contract to be bid;
 - ☐ b. List of contractor’s key personnel (*e.g.*, Project Manager, Project Engineers, Materials Engineers, and Foremen), to be assigned to the contract to be bid, with their complete qualification and experience data (*please see attached prescribed form required by the QC – BAC for Infrastructure and Consultancy*);
 - ☐ c. List of contractor’s major equipment units, which are owned, leased, and/or under purchase agreements, supported by proof of ownership or certification of availability of equipment from the equipment lessor/vendor for

the duration of the project, as the case may be (*please see attached prescribed form required by the QC – BAC for Infrastructure and Consultancy*); **and**

- ☐ (k) Original duly signed Omnibus Sworn Statement (OSS); **and** if applicable, Original Notarized Secretary's Certificate in case of a corporation, partnership, or cooperative; or Original Special Power of Attorney of all members of the joint venture giving full power and authority to its officer to sign the OSS and do acts to represent the Bidder.

Additional Technical Requirements:

- ☐ • Certificate of Site Inspection or Affidavit of Site Inspection as part of Omnibus Sworn Statement
- ☐ • Affidavit of Undertaking for Key Personnel and Equipment (*please see attached prescribed form required by the QC – BAC for Infrastructure and Consultancy*)
- ☐ • Equipment Utilization Schedule
- ☐ • Manpower Schedule
- ☐ • Construction Schedule and S-Curve
- ☐ • PERT-CMP
- ☐ • Construction Methods

Financial Documents

- ☐ (l) The prospective bidder's audited financial statements, showing, among others, the prospective bidder's total and current assets and liabilities, stamped "received" by the BIR or its duly accredited and authorized institutions, for the preceding calendar year which should not be earlier than two (2) years from the date of bid submission; **and**
- ☐ (m) The prospective bidder's computation of Net Financial Contracting Capacity (NFCC) (*please see attached prescribed form required by the QC – BAC for Infrastructure and Consultancy*).

Class "B" Documents

- ☐ (n) If applicable, duly signed joint venture agreement (JVA) in accordance with RA No. 4566 and its IRR in case the joint venture is already in existence;
or
duly notarized statements from all the potential joint venture partners stating that they will enter into and abide by the provisions of the JVA in the instance that the bid is successful.

II. FINANCIAL COMPONENT ENVELOPE

- ☐ (o) Original of duly signed and accomplished Financial Bid Form; **and**

Other documentary requirements under RA No. 9184

- ☐ (p) Original of duly signed Bid Prices in the Bill of Quantities; **and**
- ☐ (q) Duly accomplished Detailed Estimates Form, including a summary sheet indicating the unit prices of construction materials, labor rates, and equipment rentals used in coming up with the Bid; **and**
- ☐ (r) Cash Flow by Quarter.

Bid Form for the Procurement of Infrastructure Projects
[shall be submitted with the Bid]

BID FORM

Date : _____
Project Identification No. : _____

To: *[name and address of Procuring Entity]*

Having examined the Philippine Bidding Documents (PBDs) including the Supplemental or Bid Bulletin Numbers *[insert numbers]*, the receipt of which is hereby duly acknowledged, we, the undersigned, declare that:

- a. We have no reservation to the PBDs, including the Supplemental or Bid Bulletins, for the Procurement Project: *[insert name of contract]*;
- b. We offer to execute the Works for this Contract in accordance with the PBDs;
- c. The total price of our Bid in words and figures, excluding any discounts offered below is: *[insert information]*;
- d. The discounts offered and the methodology for their application are: *[insert information]*;
- e. The total bid price includes the cost of all taxes, such as, but not limited to: *[specify the applicable taxes, e.g. (i) value added tax (VAT), (ii) income tax, (iii) local taxes, and (iv) other fiscal levies and duties]*, which are itemized herein and reflected in the detailed estimates,
- f. Our Bid shall be valid within the a period stated in the PBDs, and it shall remain binding upon us at any time before the expiration of that period;
- g. If our Bid is accepted, we commit to obtain a Performance Security in the amount of *[insert percentage amount]* percent of the Contract Price for the due performance of the Contract, or a Performance Securing Declaration in lieu of the the allowable forms of Performance Security, subject to the terms and conditions of issued GPPB guidelines¹ for this purpose;
- h. We are not participating, as Bidders, in more than one Bid in this bidding process, other than alternative offers in accordance with the Bidding Documents;
- i. We understand that this Bid, together with your written acceptance thereof included in your notification of award, shall constitute a binding contract between us, until a formal Contract is prepared and executed; and
- j. We understand that you are not bound to accept the Lowest Calculated Bid or any other Bid that you may receive.

¹ currently based on GPPB Resolution No. 09-20^^

- k. We likewise certify/confirm that the undersigned, is the duly authorized representative of the bidder, and granted full power and authority to do, execute and perform any and all acts necessary to participate, submit the bid, and to sign and execute the ensuing contract for the [Name of Project] of the [Name of the Procuring Entity].

- l. We acknowledge that failure to sign each and every page of this Bid Form, including the Bill of Quantities, shall be a ground for the rejection of our bid.

Name: _____

Legal Capacity: _____

Signature: _____

Duly authorized to sign the Bid for and behalf of: _____

Date: _____

Bid Securing Declaration Form

[shall be submitted with the Bid if bidder opts to provide this form of bid security]

REPUBLIC OF THE PHILIPPINES)
CITY OF _____) S.S.

BID SECURING DECLARATION **Project Identification No.: *[Insert number]***

To: *[Insert name and address of the Procuring Entity]*

I/We, the undersigned, declare that:

1. I/We understand that, according to your conditions, bids must be supported by a Bid Security, which may be in the form of a Bid Securing Declaration.
2. I/We accept that: (a) I/we will be automatically disqualified from bidding for any procurement contract with any procuring entity for a period of two (2) years upon receipt of your Blacklisting Order; and, (b) I/we will pay the applicable fine provided under Section 6 of the Guidelines on the Use of Bid Securing Declaration, within fifteen (15) days from receipt of the written demand by the procuring entity for the commission of acts resulting to the enforcement of the bid securing declaration under Sections 23.1(b), 34.2, 40.1 and 69.1, except 69.1(f), of the IRR of RA No. 9184; without prejudice to other legal action the government may undertake.
3. I/We understand that this Bid Securing Declaration shall cease to be valid on the following circumstances:
 - a. Upon expiration of the bid validity period, or any extension thereof pursuant to your request;
 - b. I am/we are declared ineligible or post-disqualified upon receipt of your notice to such effect, and (i) I/we failed to timely file a request for reconsideration or (ii) I/we filed a waiver to avail of said right; and
 - c. I am/we are declared the bidder with the Lowest Calculated Responsive Bid, and I/we have furnished the performance security and signed the Contract.

IN WITNESS WHEREOF, I/We have hereunto set my/our hand/s this ____ day of *[month]* *[year]* at *[place of execution]*.

[Insert NAME OF BIDDER OR ITS AUTHORIZED REPRESENTATIVE]

[Insert signatory's legal capacity]
Affiant

[Jurat]

[Format shall be based on the latest Rules on Notarial Practice]

GPPB Resolution No. 16-2020, dated 16 September 2020

Omnibus Sworn Statement (Revised)

[shall be submitted with the Bid]

REPUBLIC OF THE PHILIPPINES)
CITY/MUNICIPALITY OF _____) S.S.

AFFIDAVIT

I, [Name of Affiant], of legal age, [Civil Status], [Nationality], and residing at [Address of Affiant], after having been duly sworn in accordance with law, do hereby depose and state that:

1. *[Select one, delete the other:]*

[If a sole proprietorship:] I am the sole proprietor or authorized representative of [Name of Bidder] with office address at [address of Bidder];

[If a partnership, corporation, cooperative, or joint venture:] I am the duly authorized and designated representative of [Name of Bidder] with office address at [address of Bidder];

2. *[Select one, delete the other:]*

[If a sole proprietorship:] As the owner and sole proprietor, or authorized representative of [Name of Bidder], I have full power and authority to do, execute and perform any and all acts necessary to participate, submit the bid, and to sign and execute the ensuing contract for [Name of the Project] of the [Name of the Procuring Entity], as shown in the attached duly notarized Special Power of Attorney;

[If a partnership, corporation, cooperative, or joint venture:] I am granted full power and authority to do, execute and perform any and all acts necessary to participate, submit the bid, and to sign and execute the ensuing contract for [Name of the Project] of the [Name of the Procuring Entity], as shown in the attached [state title of attached document showing proof of authorization (e.g., duly notarized Secretary's Certificate, Board/Partnership Resolution, or Special Power of Attorney, whichever is applicable)];

3. [Name of Bidder] is not "blacklisted" or barred from bidding by the Government of the Philippines or any of its agencies, offices, corporations, or Local Government Units, foreign government/foreign or international financing institution whose blacklisting rules have been recognized by the Government Procurement Policy Board, **by itself or by relation, membership, association, affiliation, or controlling interest with another blacklisted person or entity as defined and provided for in the Uniform Guidelines on Blacklisting;**

4. Each of the documents submitted in satisfaction of the bidding requirements is an authentic copy of the original, complete, and all statements and information provided therein are true and correct;

5. [Name of Bidder] is authorizing the Head of the Procuring Entity or its duly authorized representative(s) to verify all the documents submitted;

6. *[Select one, delete the rest:]*

[If a sole proprietorship:] The owner or sole proprietor is not related to the Head of the Procuring Entity, Procurement Agent if engaged, members of the Bids and Awards Committee (BAC), the Technical Working Group, and the BAC Secretariat, the head of the Project Management Office or the end-user unit, and the project consultants by consanguinity or affinity up to the third civil degree;

[If a partnership or cooperative:] None of the officers and members of *[Name of Bidder]* is related to the Head of the Procuring Entity, Procurement Agent if engaged, members of the Bids and Awards Committee (BAC), the Technical Working Group, and the BAC Secretariat, the head of the Project Management Office or the end-user unit, and the project consultants by consanguinity or affinity up to the third civil degree;

[If a corporation or joint venture:] None of the officers, directors, and controlling stockholders of *[Name of Bidder]* is related to the Head of the Procuring Entity, Procurement Agent if engaged, members of the Bids and Awards Committee (BAC), the Technical Working Group, and the BAC Secretariat, the head of the Project Management Office or the end-user unit, and the project consultants by consanguinity or affinity up to the third civil degree;

7. *[Name of Bidder]* complies with existing labor laws and standards; and
8. *[Name of Bidder]* is aware of and has undertaken the responsibilities as a Bidder in compliance with the Philippine Bidding Documents, which includes:
 - a. Carefully examining all of the Bidding Documents;
 - b. Acknowledging all conditions, local or otherwise, affecting the implementation of the Contract;
 - c. Making an estimate of the facilities available and needed for the contract to be bid, if any; and
 - d. Inquiring or securing Supplemental/Bid Bulletin(s) issued for the *[Name of the Project]*.
9. *[Name of Bidder]* did not give or pay directly or indirectly, any commission, amount, fee, or any form of consideration, pecuniary or otherwise, to any person or official, personnel or representative of the government in relation to any procurement project or activity.
10. **In case advance payment was made or given, failure to perform or deliver any of the obligations and undertakings in the contract shall be sufficient grounds to constitute criminal liability for Swindling (Estafa) or the commission of fraud with unfaithfulness or abuse of confidence through misappropriating or converting any payment received by a person or entity under an obligation involving the duty to deliver certain goods or services, to the prejudice of the public and the government of the Philippines pursuant to Article 315 of Act No. 3815 s. 1930, as amended, or the Revised Penal Code.**
11. We pledge that the project will be completed in accordance and congruency with the approved plans and programs.

IN WITNESS WHEREOF, I have hereunto set my hand this ____ day of ____, 20__ at _____, Philippines.

[Insert NAME OF BIDDER OR ITS AUTHORIZED REPRESENTATIVE]
[Insert signatory's legal capacity]
Affiant

[Jurat]

[Format shall be based on the latest Rules on Notarial Practice]

Contract Agreement Form for the Procurement of Infrastructure Projects (Revised)

*[not required to be submitted with the Bid, but it shall be submitted within ten (10) days after
receiving the Notice of Award]*

CONTRACT AGREEMENT

THIS AGREEMENT, made this *[insert date]* day of *[insert month]*, *[insert year]* between *[name and address of PROCURING ENTITY]* (hereinafter called the "Entity") and *[name and address of Contractor]* (hereinafter called the "Contractor").

WHEREAS, the Entity is desirous that the Contractor execute *[name and identification number of contract]* (hereinafter called "the Works") and the Entity has accepted the Bid for *[contract price in words and figures in specified currency]* by the Contractor for the execution and completion of such Works and the remedying of any defects therein.

NOW THIS AGREEMENT WITNESSETH AS FOLLOWS:

1. In this Agreement, words and expressions shall have the same meanings as are respectively assigned to them in the Conditions of Contract hereinafter referred to.
2. The following documents as required by the 2016 revised Implementing Rules and Regulations of Republic Act No. 9184 shall be deemed to form and be read and construed as part of this Agreement, viz.:
 - a. Philippine Bidding Documents (PBDs);
 - i. Drawings/Plans;
 - ii. Specifications;
 - iii. Bill of Quantities;
 - iv. General and Special Conditions of Contract;
 - v. Supplemental or Bid Bulletins, if any;
 - b. Winning bidder's bid, including the Eligibility requirements, Technical and Financial Proposals, and all other documents or statements submitted;

Bid form, including all the documents/statements contained in the Bidder's bidding envelopes, as annexes, and all other documents submitted (e.g., Bidder's response to request for clarifications on the bid), including corrections to the bid, if any, resulting from the Procuring Entity's bid evaluation;

- c. Performance Security;
- d. Notice of Award of Contract and the Bidder's conforme thereto; and
- e. Other contract documents that may be required by existing laws and/or the Procuring Entity concerned in the PBDs. **Winning bidder agrees that additional contract documents or information prescribed by the GPPB that are subsequently required for submission after the contract execution, such as the Notice to Proceed, Variation Orders, and Warranty Security, shall likewise form part of the Contract.**

3. In consideration for the sum of *[total contract price in words and figures]* or such other sums as may be ascertained, *[Named of the bidder]* agrees to *[state the object of the contract]* in accordance with his/her/its Bid.
4. The *[Name of the procuring entity]* agrees to pay the above-mentioned sum in accordance with the terms of the Bidding.

IN WITNESS whereof the parties thereto have caused this Agreement to be executed the day and year first before written.

[Insert Name and Signature]

[Insert Name and Signature]

[Insert Signatory's Legal Capacity]

[Insert Signatory's Legal Capacity]

for:

for:

[Insert Procuring Entity]

[Insert Name of Supplier]

Acknowledgment

[Format shall be based on the latest Rules on Notarial Practice]

LIST OF ALL ON-GOING GOVERNMENT AND PRIVATE CONTRACTS

NAME OF CONTRACTOR: _____

[illegible]

PHOTOCOPY ADDITIONAL FORMS, IF NECESSARY

Page _____ of _____

SINGLE LARGEST COMPLETED CONTRACT SIMILAR TO THE CONTRACT TO BE BID

NAME OF CONTRACTOR: _____

PROJECT TITLE: _____

PROJECT TITLE (Name of the Contract) & EXACT PROJECT LOCATION	DATE OF CONTRACT	CONTRACT DURATION	PROJECT OWNER & POSTAL ADDRESS	NATURE OF WORK	CONTRACTOR'S ROLE (SOLE CONTRACTOR, SUBCONTRACTOR, PARTNER IN A /S) and PERCENTAGE OF PARTICIPATION	TOTAL CONTRACT VALUE AT AWARD	DATE OF COMPLETION or ESTIMATED COMPLETION TIME	TOTAL CONTRACT VALUE AT COMPLETION IF APPLICABLE

PHOTOCOPY ADDITIONAL FORMS, IF NECESSARY

Page _____ of _____

LIST OF MAJOR EQUIPMENT TO BE USED FOR THE PROJECT

NAME OF CONTRACTOR: _____

PROJECT TITLE: _____

TYPE	DESCRIPTION / CAPACITY	SERIAL NO.	YEAR ACQUIRED	PRESENT LOCATION (SPECIFIC ADDRESS)	STATUS OF AVAILABILITY (OWNED/LEASED)

PHOTOCOPY ADDITIONAL FORMS, IF NECESSARY

Page _____ of _____

A. LIST OF KEY CONSTRUCTION PERSONNEL TO BE ASSIGNED TO THE PROJECT

NAME OF CONTRACTOR: _____

PROJECT TITLE: _____

NAME	POSITION	AGE	EDUCATIONAL ATTAINMENT	TYPE OF CONSTRUCTION EXPERIENCE	NO.OF YEARS WITH THE CONTRACTOR	PROFESSION	PRC NO.

PHOTOCOPY ADDITIONAL FORMS, IF NECESSARY

Page _____ of _____

COMPUTATION OF NET FINANCIAL CONTRACTING CAPACITY (NFCC)

NAME OF BIDDER: _____

CURRENT ASSETS*		PHP	_____
(LESS) CURRENT LIABILITIES*	(LESS)	PHP	_____
NETWORTH		PHP	_____
NETWORTH x 15	x 15	PHP	_____
(LESS) VALUE OF ALL OUTSTANDING ON-GOING CONTRACTS**	(LESS)	PHP	_____
(LESS) VALUE OF ALL AWARDED BUT NOT YET STARTED CONTRACTS AS OF DATE**	(LESS)	PHP	_____
NET FINANCIAL CONTRACTING CAPACITY		PHP	_____

- NOTES:
- * CURRENT ASSETS AND LIABILITIES BASED ON AUDITED FINANCIAL STATEMENT FOR THE PRECEDING CALENDAR YEAR SUBMITTED TO B.I.R.
 - ** BASED ON LIST OF ON-GOING AND AWRDED BUT NOT YEY STARTED CONTRACTS SUBMITTED

REPUBLIC OF THE PHILIPPINES)
_____) S. S.

AFFIDAVIT OF UNDERTAKING

I, _____, of legal age, Filipino, [OFFICER OR REPRESENTATIVE]

with office address at _____ after
having been duly sworn to in accordance with law, hereby voluntary depose and state:

That I am duly authorized representative of the [Name of Bidder] to execute this
undertaking as evidenced by Secretary's Certificate and Board Resolution.

That [Name of Bidder] bidding for the (Name of Project)

That relative to the aforementioned Project, the [Name of Bidder] hereby undertake that
the equipment to be use and the key personnel to be assign shall exclusively be used and will
only perform to the project until its completion.

That I am executing this affidavit to attest to the truth of the foregoing and in compliance with
the submission of the technical requirements for the public bidding of the said project.

IN WITNESS HEREOF, I have hereunto signed my name below this _____ day of _____
_____ at _____.

AFFIANT FURTHER SAYETH NAUGHT.

Affiant

SUBSCRIBED AND SWORN TO BEFORE ME this _____ day of _____
_____ in _____
affiant exhibiting to me his/her _____ issued at
_____ on _____.

Doc. No. ;
Page No. ;
Book No. ;
Series of 2020

Notary Public

