

PHILIPPINE BIDDING DOCUMENTS

Procurement of GOODS

Government of the Republic of the Philippines

**SUPPLY, DELIVERY AND
INSTALLATION OF VARIOUS
ENGINEERING SIMULATION
AND AUTOMATION
LABORATORY EQUIPMENT FOR
COLLEGE OF ENGINEERING
THE UNIVERSITY
(PR-21-02-061)**

**Sixth Edition
July 2020**

Preface

These Philippine Bidding Documents (PBDs) for the procurement of Goods through Competitive Bidding have been prepared by the Government of the Philippines for use by any branch, constitutional commission or office, agency, department, bureau, office, or instrumentality of the Government of the Philippines, National Government Agencies, including Government-Owned and/or Controlled Corporations, Government Financing Institutions, State Universities and Colleges, and Local Government Unit. 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 of Republic Act No. 9184.

The Bidding Documents shall clearly and adequately define, among others: (i) the objectives, scope, and expected outputs and/or results of the proposed contract or Framework Agreement, as the case may be; (ii) the eligibility requirements of Bidders; (iii) the expected contract or Framework Agreement duration, the estimated quantity in the case of procurement of goods, delivery schedule and/or time frame; 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 Goods 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 Goods. However, they should be adapted as necessary to the circumstances of the particular Procurement 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, Bid Data Sheet, General Conditions of Contract, Special Conditions of Contract, Schedule of Requirements, and Specifications 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 Procurement Project, Project Identification Number, and Procuring Entity, in addition to the 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 Acronyms, Terms, and Abbreviations

ABC – Approved Budget for the Contract.

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.

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])

CDA - Cooperative Development Authority.

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.

CIF – Cost Insurance and Freight.

CIP – Carriage and Insurance Paid.

CPI – Consumer Price Index.

DDP – Refers to the quoted price of the Goods, which means “delivered duty paid.”

DTI – Department of Trade and Industry.

EXW – Ex works.

FCA – “Free Carrier” shipping point.

FOB – “Free on Board” shipping point.

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]).

Framework Agreement – Refers to a written agreement between a procuring entity and a supplier or service provider that identifies the terms and conditions, under which specific purchases, otherwise known as “Call-Offs,” are made for the duration of the agreement. It is in the nature of an option contract between the procuring entity and the bidder(s) granting the procuring entity the option to either place an order for any of the goods or services identified in the Framework Agreement List or not buy at all, within a minimum period of one (1) year to a maximum period of three (3) years. (GPPB Resolution No. 27-2019)

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.

GPPB – Government Procurement Policy Board.

INCOTERMS – International Commercial Terms.

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.

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.

Supplier – refers to a citizen, or any corporate body or commercial company duly organized and registered under the laws where it is established, habitually established in business and engaged in the manufacture or sale of the merchandise or performance of the general services covered by his bid. (Item 3.8 of GPPB Resolution No. 13-2019, dated 23 May 2019). Supplier as used in these Bidding Documents may likewise refer to a distributor, manufacturer, contractor, or consultant.

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 (*e.g.*, the application of a margin of preference in bid evaluation).

The IB should be incorporated in 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
WESTERN MINDANAO STATE UNIVERSITY
Zamboanga City
Telefax.: 062-991-7875
www.wmsu.edu.ph

INVITATION TO BID FOR
Supply, Delivery and Installation of Various Engineering Simulation and Automation Laboratory Equipment for the CoE of the University (PR-21-02-061)

1. The *Western Mindanao State University*, through the *CHED Fund 2021* intends to apply the sum of *Ten Million Pesos (Php.10,000,000.00)* being the ABC to payments under the contract for *Supply, Delivery and Installation of Various Engineering Simulation and Automation Laboratory Equipment for the CoE of the University (PR-21-02-061)*. Bids received in excess of the ABC shall be automatically rejected at bid opening.
2. The *Western Mindanao State University* now invites bids for the above Procurement Project. Delivery of the Goods is required within *thirty (30) calendar days*. Bidders should have completed, within *three (3) years* from the date of submission and receipt of bids, 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 a non-discretionary “*pass/fail*” criterion as specified in the 2016 revised Implementing Rules and Regulations (IRR) of Republic Act (RA) No. 9184.

Bidding is open to all interested bidders, whether local or foreign, subject to the conditions for eligibility provided in the 2016 revised IRR of RA No. 9184.

4. Prospective Bidders may obtain further information from *WMSU-BAC Office* and inspect the Bidding Documents at the address given below during *8:00 AM to 5:00 PM*.
5. A complete set of Bidding Documents may be acquired by interested Bidders on *March 23-April 20, 2021* from the given address and website(s) and upon payment of the applicable fee for the Bidding Documents, pursuant to the latest Guidelines issued by the GPPB, in the amount of *Ten Thousand Pesos (Php.10,000.00)*. The Procuring Entity shall allow the bidder to present its proof of payment for the fees in person, by facsimile, or through electronic means.

6. The *Western Mindanao State University* will hold a Pre-Bid Conference¹ on **April 6, 2021, 10:00AM at the BAC Office, Western Mindanao State University, Ground Floor Executive Building, Normal Road, Baliwasan, Zamboanga City** and/or through video conferencing or webcasting *via Zoom*, which shall be open to prospective bidders. All interested bidder/s who intent to join the Pre-Bid Conference online, you may contact the BAC Secretariat not later than March 18, 2021.
7. Bids must be duly received by the BAC Secretariat through manual submission at the office address indicated below, on or before *April 20, 2021 at 10:00AM*. 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 14.
9. Bid opening shall be on *April 20, 2021 at 10:00AM* at the *BAC Office, Western Mindanao State University, Ground Floor Executive Building, Normal Road, Baliwasan, Zamboanga City*. Bids will be opened in the presence of the bidders' representatives who choose to attend the activity.
10. The Western Mindanao State University 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 IRR of RA No. 9184, without thereby incurring any liability to the affected bidder or bidders.
11. For further information, please refer to:

Ms. Carolina E. Tejero
Head Secretariat
Western Mindanao State University
Normal Road, Baliwasan
Zamboanga City
Tel. No.: (062)991-7875 / 991-1771 local 1015
Mobile No.: 0975-3379581
Email: bacsecretariate@wmsu.edu.ph
12. You may visit the following websites:

For downloading of Bidding Documents: ***www.wmsu.edu.ph***

March 23, 2021

MA. LOURDES B. ALBA
BAC Chairperson

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, *Western Mindanao State University* wishes to receive Bids for the *Supply, Delivery and Installation of Various Engineering Simulation and Automation Laboratory Equipment for the College of Engineering of the University (PR-21-02-061)*.

The Procurement Project (referred to herein as “Project”) is composed of Four (4) items, the details of which are described in Section VII (Technical Specifications).

2. Funding Information

2.1. The GOP through the source of funding as indicated below for *GAA 2021* in the amount of *Ten Million Pesos (Php.10,000,000.00)*.

2.2. The source of funding is:

- a. NGA, the General Appropriations Act or Special Appropriations.

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 Manuals 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 **IB** 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 verified and accepted the general requirements of this Project, including 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, and Coercive Practices

The Procuring Entity, as well as the Bidders and Suppliers, 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. Foreign ownership exceeding those allowed under the rules may participate pursuant to:
 - i. When a Treaty or International or Executive Agreement as provided in Section 4 of the RA No. 9184 and its 2016 revised IRR allow foreign bidders to participate;
 - ii. Citizens, corporations, or associations of a country, included in the list issued by the GPPB, the laws or regulations of which grant reciprocal rights or privileges to citizens, corporations, or associations of the Philippines;
 - iii. When the Goods sought to be procured are not available from local suppliers; or
 - iv. When there is a need to prevent situations that defeat competition or restrain trade.
- 5.3. Pursuant to Section 23.4.1.3 of the 2016 revised IRR of RA No.9184, the Bidder shall have an SLCC that is at least one (1) contract similar to the Project the value of which, adjusted to current prices using the PSA's CPI, must be at least equivalent to:
 - a. For the procurement of Non-expendable Supplies and Services: The Bidder must have completed a single contract that is similar to this Project, equivalent to at least fifty percent (50%) of the ABC.
 - b. For the procurement of Expendable Supplies: The Bidder must have completed a single contract that is similar to this Project, equivalent to at least twenty-five percent (25%) of the ABC.
 - c. For procurement where the Procuring Entity has determined, after the conduct of market research, that imposition of either (a) or (b) will likely result to failure of bidding or monopoly that will defeat the purpose of public bidding: the Bidder should comply with the following requirements:
 - i. Completed at least two (2) similar contracts, the aggregate amount of which should be equivalent to at least *fifty percent (50%) in the case of non-expendable supplies and services or twenty-five percent (25%) in the case of expendable supplies*] of the ABC for this Project; and
 - ii. The largest of these similar contracts must be equivalent to at least half of the percentage of the ABC as required above.

- 5.4. The Bidders shall comply with the eligibility criteria under Section 23.4.1 of the 2016 IRR of RA No. 9184.

6. Origin of 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, subject to Domestic Preference requirements under **ITB** Clause 18.

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 twenty percent (20%) of the Project.

a. The Procuring Entity has prescribed that: Subcontracting is not allowed.

- 7.2. Subcontracting of any portion of the Project does not relieve the Supplier 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 Supplier'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 April 6, 2021, 10:00 AM at the BAC Office, Western Mindanao State University, Normal Road, Baliwsan, Zamboanga City and/or through videoconferencing/webcasting as indicated in paragraph 6 of the **IB**.

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 VIII (Checklist of Technical and Financial Documents)**.

- 10.2. The Bidder's SLCC as indicated in **ITB** Clause 5.3 should have been completed within three (3) years as provided in paragraph 2 of the **IB** prior to the deadline for the submission and receipt of bids.
- 10.3. 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. Similar to the required authentication above, 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.

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 VIII (Checklist of Technical and Financial Documents)**.
- 11.2. If the Bidder claims preference as a Domestic Bidder or Domestic Entity, a certification issued by DTI shall be provided by the Bidder in accordance with Section 43.1.3 of the 2016 revised IRR of RA No. 9184.
- 11.3. Any bid exceeding the ABC indicated in paragraph 1 of the **IB** shall not be accepted.
- 11.4. 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. Bid Prices

- 12.1. Prices indicated on the Price Schedule shall be entered separately in the following manner:
 - a. For Goods offered from within the Procuring Entity's country:
 - i. The price of the Goods quoted EXW (ex-works, ex-factory, ex-warehouse, ex-showroom, or off-the-shelf, as applicable);
 - ii. The cost of all customs duties and sales and other taxes already paid or payable;
 - iii. The cost of transportation, insurance, and other costs incidental to delivery of the Goods to their final destination; and

- iv. The price of other (incidental) services, if any, listed in e.
- b. For Goods offered from abroad:
 - i. Unless otherwise stated in the **BDS**, the price of the Goods shall be quoted delivered duty paid (DDP) with the place of destination in the Philippines as specified in the **BDS**. In quoting the price, the Bidder shall be free to use transportation through carriers registered in any eligible country. Similarly, the Bidder may obtain insurance services from any eligible source country.
 - ii. The price of other (incidental) services, if any, as listed in **Section VII (Technical Specifications)**.

13. Bid and Payment Currencies

- 13.1. For Goods that the Bidder will supply from outside the Philippines, the 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.
- 13.2. Payment of the contract price shall be made in: Philippine Pesos

14. Bid Security

- 14.1. The Bidder shall submit a Bid Securing Declaration² 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**.
- 14.2. The Bid and bid security shall be valid within 120 calendar days. Any Bid not accompanied by an acceptable bid security shall be rejected by the Procuring Entity as non-responsive.

15. 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.

² In the case of Framework Agreement, the undertaking shall refer to entering into contract with the Procuring Entity and furnishing of the performance security or the performance securing declaration within ten (10) calendar days from receipt of Notice to Execute Framework Agreement.

If the Procuring Entity allows the submission of bids through online submission 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.

16. Deadline for Submission of Bids

- 16.1. The Bidders shall submit on the specified date and time and either at its physical address or through online submission as indicated in paragraph 7 of the **IB**.

17. Opening and Preliminary Examination of Bids

- 17.1. 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.

- 17.2. The preliminary examination of bids shall be governed by Section 30 of the 2016 revised IRR of RA No. 9184.

18. Domestic Preference

- 18.1. The Procuring Entity will grant a margin of preference for the purpose of comparison of Bids in accordance with Section 43.1.2 of the 2016 revised IRR of RA No. 9184.

19. Detailed Evaluation and Comparison of Bids

- 19.1. The Procuring 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 the 2016 revised IRR of RA No. 9184.
- 19.2. If the Project allows partial bids, bidders may submit a proposal on any of the lots or items, and evaluation will be undertaken on a per lot or item basis, as the case maybe. In this case, the Bid Security as required by **ITB** Clause 15 shall be submitted for each lot or item separately.
- 19.3. The descriptions of the lots or items shall be indicated in **Section VII (Technical Specifications)**, although the ABCs of these lots or items are

indicated in the **BDS** for purposes of the NFCC computation pursuant to Section 23.4.2.6 of the 2016 revised IRR of RA No. 9184. The NFCC must be sufficient for the total of the ABCs for all the lots or items participated in by the prospective Bidder.

19.4. The Project shall be awarded as follows:

One Project having several items grouped into several lots, which shall be awarded as separate contracts per lot.

19.5. Except for bidders submitting a committed Line of Credit from a Universal or Commercial Bank in lieu of its NFCC computation, all Bids must include the NFCC computation pursuant to Section 23.4.1.4 of the 2016 revised IRR of RA No. 9184, which must be sufficient for the total of the ABCs for all the lots or items participated in by the prospective Bidder. For bidders submitting the committed Line of Credit, it must be at least equal to ten percent (10%) of the ABCs for all the lots or items participated in by the prospective Bidder.

20. Post-Qualification

20.2. 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

21.1. 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

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																					
5.3	<p>For this purpose, contracts similar to the Project shall be:</p> <p style="margin-left: 40px;">a. <i>similar contracts: Multi-Technology Design and Simulation Software, Electronic Circuit Design and 3D Simulation Software, Electro-Pneumatic Trainer with PLC, Advance Virtual/Augmented Reality Welding</i></p> <p style="margin-left: 40px;">b. completed within relevant period prior to the deadline for the submission and receipt of bids.</p>																				
7.1	Not Applicable.																				
12	The price of the Goods shall be quoted DDP WMSU or the applicable International Commercial Terms (INCOTERMS) for this Project.																				
14.1	<p>The bid security shall be in the form of a Bid Securing Declaration, or any of the following forms and amounts:</p> <p style="margin-left: 40px;">a. The amount of not less than two percent (2%) of ABC, if bid security is in cash, cashier's/manager's check.</p>																				
19.3	<p>List each item indicating its quantity and ABC:</p> <table style="width: 100%; border-collapse: collapse;"> <tbody> <tr> <td style="width: 5%;">1.)</td> <td style="width: 5%;">1</td> <td style="width: 5%;">Lot</td> <td style="width: 55%;">Multi-Technology Design and Simulation Software</td> <td style="width: 30%;">ABC – Php.2,846,300.00</td> </tr> <tr> <td>2.)</td> <td>1</td> <td>Lot</td> <td>Electronic Circuit Design and 3D Simulation Software</td> <td>ABC – Php.889,900.00</td> </tr> <tr> <td>3.)</td> <td>1</td> <td>Lot</td> <td>Electro-Pneumatic Trainer with PLC</td> <td>ABC – Php.1,678,000.00</td> </tr> <tr> <td>4.)</td> <td>1</td> <td>Lot</td> <td>Advance Virtual/Augmented Reality Welding</td> <td>ABC – Php.4,585,800.00</td> </tr> </tbody> </table>	1.)	1	Lot	Multi-Technology Design and Simulation Software	ABC – Php.2,846,300.00	2.)	1	Lot	Electronic Circuit Design and 3D Simulation Software	ABC – Php.889,900.00	3.)	1	Lot	Electro-Pneumatic Trainer with PLC	ABC – Php.1,678,000.00	4.)	1	Lot	Advance Virtual/Augmented Reality Welding	ABC – Php.4,585,800.00
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20.2	All licenses and permits relevant to the Project and the corresponding law requiring it.																				
21.2	All additional contract documents relevant to the Project that may be required by existing laws and/or the Procuring Entity.																				

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 Supplier, 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.

Additional requirements for the completion of this Contract shall be provided in the **Special Conditions of Contract (SCC)**.

2. Advance Payment and Terms of Payment

2.1. Advance payment of the contract amount is provided under Annex “D” of the revised 2016 IRR of RA No. 9184.

2.2. The Procuring Entity is allowed to determine the terms of payment on the partial or staggered delivery of the Goods procured, provided such partial payment shall correspond to the value of the goods delivered and accepted in accordance with prevailing accounting and auditing rules and regulations. The terms of payment are indicated in the **SCC**.

[Include the following clauses if Framework Agreement will be used:]

2.3. For a single-year Framework Agreement, prices charged by the Supplier for Goods delivered and/or services performed under a Call-Off shall not vary from the prices quoted by the Supplier in its bid.

2.4. For multi-year Framework Agreement, prices charged by the Supplier for Goods delivered and/or services performed under a Call-Off shall not vary from the prices quoted by the Supplier during conduct of Mini-Competition.

3. Performance Security

Within ten (10) calendar days from receipt of the Notice of Award by the Bidder from the Procuring Entity but in no case later than prior to 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 of RA No. 9184.

[[Include if Framework Agreement will be used:] In the case of Framework Agreement, the Bidder may opt to furnish the performance security or a Performance

Securing Declaration as defined under the Guidelines on the Use of Framework Agreement.}

4. Inspection and Tests

The Procuring Entity or its representative shall have the right to inspect and/or to test the Goods to confirm their conformity to the Project specifications at no extra cost to the Procuring Entity in accordance with the Generic Procurement Manual. In addition to tests in the **SCC, Section IV (Technical Specifications)** shall specify what inspections and/or tests the Procuring Entity requires, and where they are to be conducted. The Procuring Entity shall notify the Supplier in writing, in a timely manner, of the identity of any representatives retained for these purposes.

All reasonable facilities and assistance for the inspection and testing of Goods, including access to drawings and production data, shall be provided by the Supplier to the authorized inspectors at no charge to the Procuring Entity.

5. Warranty

5.1 In order to assure that manufacturing defects shall be corrected by the Supplier, a warranty shall be required from the Supplier as provided under Section 62.1 of the 2016 revised IRR of RA No. 9184.

5.2 The Procuring Entity shall promptly notify the Supplier in writing of any claims arising under this warranty. Upon receipt of such notice, the Supplier shall, repair or replace the defective Goods or parts thereof without cost to the Procuring Entity, pursuant to the Generic Procurement Manual.

6. Liability of the Supplier

The Supplier's liability under this Contract shall be as provided by the laws of the Republic of the Philippines.

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

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 Goods purchased. 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	
1	<p>Delivery and Documents –</p> <p>For purposes of the Contract, “EXW,” “FOB,” “FCA,” “CIF,” “CIP,” “DDP” and other trade terms used to describe the obligations of the parties shall have the meanings assigned to them by the current edition of INCOTERMS published by the International Chamber of Commerce, Paris. The Delivery terms of this Contract shall be as follows:</p> <p>“The delivery terms applicable to this Contract are delivered <i>WMSU Supply Office</i>. Risk and title will pass from the Supplier to the Procuring Entity upon receipt and final acceptance of the Goods at their final destination.”</p> <p>Delivery of the Goods shall be made by the Supplier in accordance with the terms specified in Section VI (Schedule of Requirements).</p> <p>For purposes of this Clause the Procuring Entity’s Representative at the Project Site is <i>Mr. ALFREDO D. MONTERO, University Supply Officer</i>.</p> <p>Incidental Services –</p> <p>The Supplier is required to provide all of the following services, including additional services, if any, specified in Section VI. Schedule of Requirements:</p> <ol style="list-style-type: none"> a. performance or supervision of on-site assembly and/or start-up of the supplied Goods; b. furnishing of tools required for assembly and/or maintenance of the supplied Goods; c. furnishing of a detailed operations and maintenance manual for each appropriate unit of the supplied Goods; d. performance or supervision or maintenance and/or repair of the supplied Goods, for a period of time agreed by the parties, provided that this service shall not relieve the Supplier of any warranty obligations under this Contract; and e. training of the Procuring Entity’s personnel, at the Supplier’s plant and/or on-site, in assembly, start-up, operation, maintenance, and/or repair of the supplied Goods.
	<p>The Contract price for the Goods shall include the prices charged by the Supplier for incidental services and shall not exceed the prevailing rates charged to other parties by the Supplier for similar services.</p> <p>Spare Parts –</p>

The Supplier is required to provide all of the following materials, notifications, and information pertaining to spare parts manufactured or distributed by the Supplier:

- a. such spare parts as the Procuring Entity may elect to purchase from the Supplier, provided that this election shall not relieve the Supplier of any warranty obligations under this Contract; and
- b. in the event of termination of production of the spare parts:
 - i. advance notification to the Procuring Entity of the pending termination, in sufficient time to permit the Procuring Entity to procure needed requirements; and
 - ii. following such termination, furnishing at no cost to the Procuring Entity, the blueprints, drawings, and specifications of the spare parts, if requested.

The spare parts and other components required are listed in **Section VI (Schedule of Requirements)** and the cost thereof are included in the contract price.

The Supplier shall carry sufficient inventories to assure ex-stock supply of consumable spare parts or components for the Goods for a period of three times the warranty period.

Spare parts or components shall be supplied as promptly as possible, but in any case, within appropriate time period of placing the order.

Packaging –

The Supplier shall provide such packaging of the Goods as is required to prevent their damage or deterioration during transit to their final destination, as indicated in this Contract. The packaging shall be sufficient to withstand, without limitation, rough handling during transit and exposure to extreme temperatures, salt and precipitation during transit, and open storage. Packaging case size and weights shall take into consideration, where appropriate, the remoteness of the Goods' final destination and the absence of heavy handling facilities at all points in transit.

The packaging, marking, and documentation within and outside the packages shall comply strictly with such special requirements as shall be expressly provided for in the Contract, including additional requirements, if any, specified below, and in any subsequent instructions ordered by the Procuring Entity.

The outer packaging must be clearly marked on at least four (4) sides as follows:

Name of the Procuring Entity

	<p>Name of the Supplier Contract Description Final Destination Gross weight Any special lifting instructions Any special handling instructions Any relevant HAZCHEM classifications</p>
	<p>A packaging list identifying the contents and quantities of the package is to be placed on an accessible point of the outer packaging if practical. If not practical the packaging list is to be placed inside the outer packaging but outside the secondary packaging.</p> <p>Transportation –</p> <p>Where the Supplier is required under Contract to deliver the Goods CIF, CIP, or DDP, transport of the Goods to the port of destination or such other named place of destination in the Philippines, as shall be specified in this Contract, shall be arranged and paid for by the Supplier, and the cost thereof shall be included in the Contract Price.</p> <p>Where the Supplier is required under this Contract to transport the Goods to a specified place of destination within the Philippines, defined as the Project Site, transport to such place of destination in the Philippines, including insurance and storage, as shall be specified in this Contract, shall be arranged by the Supplier, and related costs shall be included in the contract price.</p>
	<p>Where the Supplier is required under Contract to deliver the Goods CIF, CIP or DDP, Goods are to be transported on carriers of Philippine registry. In the event that no carrier of Philippine registry is available, Goods may be shipped by a carrier which is not of Philippine registry provided that the Supplier obtains and presents to the Procuring Entity certification to this effect from the nearest Philippine consulate to the port of dispatch. In the event that carriers of Philippine registry are available but their schedule delays the Supplier in its performance of this Contract the period from when the Goods were first ready for shipment and the actual date of shipment the period of delay will be considered force majeure.</p> <p>The Procuring Entity accepts no liability for the damage of Goods during transit other than those prescribed by INCOTERMS for DDP deliveries. In the case of Goods supplied from within the Philippines or supplied by domestic Suppliers risk and title will not be deemed to have passed to the Procuring Entity until their receipt and final acceptance at the final destination.</p> <p>Intellectual Property Rights –</p> <p>The Supplier shall indemnify the Procuring Entity against all third-party claims of infringement of patent, trademark, or industrial design rights arising from use of the Goods or any part thereof.</p>

2.2	Not Applicable
4	The inspections and tests that will be conducted are: all the applicable inspections and tests.

Section VI. Schedule of Requirements

The delivery schedule expressed as weeks/months stipulates hereafter a delivery date which is the date of delivery to the project site.

Item Number	Description	Quantity	Total	Delivered, Weeks/Months
1.	<p>Supply, Delivery and installation of Various Engineering Simulation and Automation Laboratory Equipment, consisting of:</p> <p>a.) Multi-Technology Design and Simulation Software, 20+1 user licenses (20 for students and 1 for teacher)</p> <p><u>Technical Specifications:</u> This software contains libraries and modules for: Hydraulics, Pneumatics, components sizing-energy, bill of material and report, catalogue manager, Manufacturers catalogues, Control panels and 2D-3D HMI, Teach ware- workflow, Didactic support, SFC Compilers, Sequential function chart, Digital electronics, APIs/, Script language, PLC ladder logic, CAN bus, Block Diagram-Math, electrical Controls, electro technical One-line, Electro technical Mechanical</p> <p><u>Descriptions:</u></p> <ul style="list-style-type: none"> * Interactive lab exercise; These exercises include simple schematic that can be simulated and animated in order to be analyzed. Teachers can also modify these exercises and create ones. * Online remote Access Licensing; You can prepare and simulate your courses and homework from home, school or workplace. * Teach ware; This software offers guides, lectures, animations and lab notes for all levels of discipline. * Workflow; Allows teachers to create and sequence content in order to evaluate students knowledge retention. * Configuration tools; allows you to create and configure valves, cylinders, motors etc. to obtain components which are graphically compliant with your requirements and respectful of real technical performance. * Create and customize your own symbols, libraries and templates; * Component sizing; Provides calculation worksheets specific to each category of pneumatic, hydraulic and electrical components which include calculation tool necessary for component sizing. * Adjustable component simulation parameters; This includes parameters such as applied loads, dimensions angles, internal leakages, force, torque, etc. * Dynamic, Realistic and Visual Simulation; Accurately reproduce the systems behavior in a dynamic and visual way. <p>During simulation components are animated and lines and</p>	and 1 Lot		

	<p>wires are color-coded according to their state</p> <ul style="list-style-type: none"> * Virtual System; Using the electrical, PLC libraries and SFC/GRAFNET module, the student simply links sensors, switches, lights, conveyors, etc., in order to make the virtual systems operate according to teacher's instructions. * 3D Editing and Animations; * Mechanical Links; Mechanical bodies can be linked to fluid power actuators to simulate and animate their effects * Cross-section Animation; Users can build cross-section animated views and link them to the simulation results in order to produce synchronized animations. * System behavior analysis; You can monitor and visualize simulation variables during simulation * Troubleshooting Modules; * Circuit Modification during Simulation; Simulation to isolate parts of a circuits, perform measurements, Provides tools for disconnecting wires and pipes during and repair or replace components to fix suspected failures * Diagnostic Tools; Provides extensive diagnostic tools allowing to detect inconsistencies or errors such as non-compliance with ISO standards, free connectors, redundant or overlapping lines, etc. * Interfaces to programmable logic controllers and equipment; * Manufacturers Catalogues; Offering teachers and students an extensive library with thousands of preconfigured components that reproduce real world functions * Can Bus Links to Operate Virtual Machines; * PLC Export; * Block Diagram; It is possible to create a graphical environment for component and system modeling using predefined function blocks. <p>It can also be used to create and test complete control loops</p> <ul style="list-style-type: none"> * Sequential function charts; * HMI and Control Panels; User can easily create Animated shapes that reproduce the behavior of the equipment they represent. * Electrical Controls; Interacts with all components from other libraries so as to create electrically controlled systems. * Electro technical; Offers wide array of components to create AC and DC electrical circuits, from basic to advanced uses. <p>It supports IEC and NEMA standards.</p> <p>Motor soft starters and VFDs are available</p> <ul style="list-style-type: none"> * Electro technical One-line; Enables the design of diagrams for all voltage levels in a typical one-line representation of networks for power generation, transmission and distribution * Digital Electronics; Includes standard devices such as inverters, logic gates, flip-flop counters, shift registers, 			
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	<p>comparators, switches, LEDs, 7-bar display, decoders, multiplexers, etc.</p> <p>* Programmable logic controller; Offers PLC logic libraries for different brands of PLC</p> <p>* Pneumatics; Includes all the symbols necessary to create pneumatic, electro pneumatic and logic systems.</p> <p>* Hydraulics; Offers all component symbols required to create mobile and industrial hydraulic systems and functions.</p>			
2.	<p>b.) Electronic Circuit Design and 3D Simulation Software (20 user licenses)</p> <p>Technical Specifications:</p> <p><u>Features and Capabilities:</u></p> <ol style="list-style-type: none"> 1. Schematic Editor 2. Schematic Symbol Editor 3. Footprint Editor 4. Netlist Editor 5. Live 3D Breadboard Tool 6. Advanced PCB Designer <ol style="list-style-type: none"> a. Automatic and Manual Design Tools b. Creating flex PCB's c. Animated 3D view 7. Electrical Rules Check (ERC) 8. Interpreter 9. Library Manager 10. Parameter Extractor 11. Text and Equation Editor 12. DC analysis 13. Transient Analysis 14. Fourier analysis 15. Digital Simulation 16. HDL Simulation (VHDL, Verilog, Verilog-A, Verilog-AMS) 17. Microcontrollers (MCU) Simulation 18. Flowchart Editor and Debugger 19. AC analysis 20. Network analysis 21. Noise analysis 22. Symbolic analysis 23. Monte-Carlo and Worst-case analysis 24. Design Tool 25. Optimization 26. Post-processor 27. Presentation 28. Interactive mode 29. Virtual Instruments <ol style="list-style-type: none"> a. Digital Multimeter b. Function Generator 	1 Lot		

	<p>c. Storage Oscilloscope d. Signal and Network Analyzer e. Digital Signal Generator f. Logic Analyzer 30. Real-time Test & Measurements 31. Training and Examination a. Learning Management Tool – Simulator's Training Supervisor b. Teach and Learn Troubleshooting c. Problem Solving d. 1200 circuits and Integrated E-Books</p> <p>Component Models Included in the Software:</p> <ol style="list-style-type: none"> 1. Passive components such as resistors, potentiometer, thermistor, lamp, capacitor, inductor, transformer, relay, diodes, etc. 2. Active components such as bipolar transistor, thermistor, thyristor, operational amplifier, etc. 3. Sources such as current source, voltage source, current generator, voltage generator, linear and nonlinear controlled sources, digital pulse source, etc. 4. Basic digital components such as AND, OR, NAND, NOR, XOR gates with 2, 3 and 4 inputs, tri-state buffer, inverter, D SR JK flip-flop, D latch, etc. 5. Digital IC, such as, 4000 logic family, 74000 logic family, VHDL to test and build your own logic components, FPGA and CPLD libraries 6. Measuring Instruments, such as voltage meter, ampere meter, current arrow, power meter, impedance meter 7. Other components that includes, time controlled switch, voltage controlled switch, AD and DA converter, timers, analog control blocks, pull-up resistor, seven-segment display, keypad, voltage regulator, vacuum tube, passive and active RF components, two ports (S, Z, YH) 			
3.	<p>c.) Electro-Pneumatic Trainer with PLC</p> <p>Technical Specifications:</p> <ul style="list-style-type: none"> * includes some basic pneumatic training set * users can have training from basic principle of electro-pneumatic controls to advance training * can be interfaced with any PLC <p><u>Training Components:</u></p> <ul style="list-style-type: none"> * physical principles of electrical systems and pneumatics * function and use of electro-pneumatic components * recognizing and drawing of electro-pneumatic symbols * representation of motion sequences and operating status * drawing of pneumatic and electrical circuit diagrams * direct and indirect manual controls * direct and indirect position-dependent control * logical AND/OR function of switch-on signals * representing motion sequences and switching states * constructing control systems using relays * electrical latching circuits 	1 Lot		

	<ul style="list-style-type: none"> * application and function of 3/2 and 5/2-way solenoid valves * analyzing circuits * application and function of limit switches * end-position monitoring using electronic proximity sensors * realizing oscillating movement * time-dependent controls with timer relays * using pressure switches * troubleshooting simple electro pneumatic circuits <p><u>Components:</u></p> <ul style="list-style-type: none"> * Service Unit (1 unit) <ul style="list-style-type: none"> - Pressure range: 0.5~12 bar - Air filter, pressure, regulator, lubricator - Shut off valve - Filter degree: 40µm - Connection plastic hose: Outside diameter 6mm - Flow rate: 750 LPM * Air Distributor (1 unit) <ul style="list-style-type: none"> - Pressure range: 0~10 bar - Input: 1 ea (6 mm) - Output: 8 ea, check connector included (4 mm) - One-touch connector * Single-acting cylinder (1 unit) <ul style="list-style-type: none"> - Pressure range: 0~10 bar - Max. pressure: 15 bar - Piston diameter: 25 mm - Stroke: 50 mm * Double-acting cylinder with cushion (2 units) <ul style="list-style-type: none"> - Pressure range: 0~10 bar - Max. pressure: 15 bar - Piston diameter: 25 mm - Stroke: 125 mm - Magnetic for sensor detection - Adjustable cushion included * One-way flow control, valve (4 units) <ul style="list-style-type: none"> - Pressure range: 0~10 bar - 1(A)-->2(B): 0~150 LPM - 2(B)-->1(A): 160/130 LPM * 3/2-way solenoid valve (Normally closed) (1 unit) <ul style="list-style-type: none"> - Pressure range: 0.5~10 bar - Response time: 20 ms - Normally closed type valve - Spring return - LED and protection circuit included - Manual override * 5/2-way single solenoid valve (2 units) <ul style="list-style-type: none"> - Pressure range: 0.5~10 bar - Response time: 20 ms - LED and protection circuit included 			
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	<ul style="list-style-type: none"> - Return: spring and pilot - Manual override * 5/2-way double solenoid valve (2 units) <ul style="list-style-type: none"> - Pressure range: 0.5~10 bar - Response time: 20 ms - LED and protection circuit included - Manual override * Pressure switch (1 unit) <ul style="list-style-type: none"> - Pressure range: 0.5~10 bar - Control setting pressure - Pressure display * Push-button switch set (3 fold) (1 unit) <ul style="list-style-type: none"> - Power: DC 24V - Consists of: 2 momentary push-buttons, 1 locking push-button - Contact: 2a-contact, 2 b-contact - Contact allowable: Max, 1A - Power consumption: 0.48 W * T-Connector (10 units) <ul style="list-style-type: none"> - Pressure range: 0~10 bar * Relay Unit (3 fold) (2 units) <ul style="list-style-type: none"> - Power: DC 24V - Contact: 4C (Changeover) - Contact load: Max. 5A - Allowable: Max.120W - Operating time: < 20 ms - Block time: < 20 ms * Digital Time Relay (1 unit) <ul style="list-style-type: none"> - Power: DC 24V - Contact: 2a-2b - Contact load: Max. 5A - Allowable: Max. 100W - Delay time: 1~99 sec - On-delay / Off delay * Digital Counter (1 unit) <ul style="list-style-type: none"> - Power: DC 24V - Contact: 1C(Changeover) - Contact load: Max. 5A - Power Consumption: 2.4W - Counter pulse: 20 ms - Display: 4 digits * Pilot Lamp and Buzzer unit (1 unit) <ul style="list-style-type: none"> - Power: DC 24V - Lamp Power consumption: 1.2W - Buzzer Power consumption: 0.04W - Buzzer frequency: 420Hz * Inductive Sensor (1 unit) <ul style="list-style-type: none"> - Operating voltage: DC10~30V 			
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	<ul style="list-style-type: none"> - Sensing distance: 5mm - Switching frequency: Max. 500Hz - Output: Normally open, PNP - Output Current: Max. 200mA - Short-circuit protection included * Capacitive Sensor (1 unit) <ul style="list-style-type: none"> - Switching power: DC10~30V - Sensing distance: 8mm - Response time: 1ms - Output: Normally open, PNP - Output Current: Max. 200mA - Short-circuit protection included * Optical Sensor (1 unit) <ul style="list-style-type: none"> - Switching power: DC10~30V - Switching distance: 100mm - Response time: 1ms - Output: Normally open, PNP - Output Current: Max. 200mA * Electrical limit switch (left) (2 units) <ul style="list-style-type: none"> - Contact: DC 24V,5A - Contact: 1 c - Switching frequency: Max,200Hz - Roller lever electric switch * Electrical limit switch (right) (2 units) <ul style="list-style-type: none"> - Contact: DC 24V,5A - Contact: 1 c - Switching frequency: Max,200Hz - Roller lever electric switch * Plastic Hose (1M) (10 units) <ul style="list-style-type: none"> - Operating temperature: -40°C ~ 60°C - Color: blue - Size: outside diameter 4 mm * Hose Cutter (1 unit) <ul style="list-style-type: none"> - PVC Grip - Multi-purpose - Type: 190 mm - Cutting material: Air Hose (0~16mm) * Cable Set (1 set) <ul style="list-style-type: none"> - Color: red, blue, black - Length: 1500mm, 1000mm, 500mm, 300mm,100mmm - High elasticity and special coating * Power Supply (1 unit) <ul style="list-style-type: none"> - Power: AC 220 V,50/60Hz - Output power: DC 24V - Output current: 5A * Electro-pneumatics textbook (1 unit) <ul style="list-style-type: none"> - Fundamentals of electrical technology - Components in the electrical signal control section 			
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	<ul style="list-style-type: none"> - Electrically actuated directional control valves * Electro-pneumatics workbook (Basic Level) (1 unit) * Cable Hanger (1 unit) * Profile panel (750 x 1200) (1 unit) <ul style="list-style-type: none"> - Size: 1200 (L) x 750 (W) x 30 (T) * Pneumatic basic working table (1 unit) * Air Compressor (1 unit) * Single four layered drawer * Programmable Logic Controller Trainer <ul style="list-style-type: none"> - Digital Input: 16 channels - Digital Output: 16 channels - 4mm socket - Power Supply included 			
4.	<p>d.) Advance Virtual/augmented Reality Welding Trainer</p> <p>Technical Specifications:</p> <p>1 Unit Welding Simulator Specifications:</p> <ul style="list-style-type: none"> * Welding Processes Supported: <ul style="list-style-type: none"> - GMAW (MIG/MAG) & FCAW G/S, SMAW (MMA Electrode), GTAW (TIG) * Welding Positions: <ul style="list-style-type: none"> - PA, PB, PC, PD, PF/PG, PE, PH/PJ, HL045/JL045, - 1F, 2F, 3F, 4F, 1G, 2G, 3G, 4G, 5G, 5F, 6G, 6F * Welding Joints: <ol style="list-style-type: none"> 1. Overlapped plate, 2. V - Butt plate, 3. T -Angled plate to plate, 4. V - Butt pipe, 5. T - Angled pipe to plate 6. Advanced Welding Multijointed GMAW welding part in carbon steel (Plate-Tube Butt Vertical). Three welding beads, one of them circular 7. Advanced Welding Multijointed Part for GMAW welding in carbon steel. It has internal welds in different angles and different positions in the same trajectory (horizontal, vertical, 6G, under the ceiling) 8. Advanced Welding Multijointed Part for GMAW welding in carbon steel. Butt and horizontal welding with splice and obstacle. Corner weld with continuity in PB position, PB-PD corner weld with appendages and splices. J" and "V" shaped return weld. * With Real Welding Torches * With Welding Sounds * Accessories: <ol style="list-style-type: none"> 1. Welding Mask, 2. Welding torches, 3. Filler rod, 4. Welding gloves, 5. Workstand, 6. Mobile covercase, 7. GTAW (TIG) Pedal, 8. Basic Welding Multijoints & Advanced Welding Multijoints 	1 Lot		

	<ul style="list-style-type: none"> * With voltage selection * With Intensity (Amperage) Selection * With Shielding Gas Selection * With Wire Speed Selection in GMAW and FCAW * Coupon thickness Selection: <ul style="list-style-type: none"> - 3mm, 6mm, 10mm * With Possibility to use other Thickness * Electrode Stick/Filler Rod Diameter Selection: <ul style="list-style-type: none"> - GMAW: carbon and stainless steel: 0.8mm, 1mm, 1.2mm - GMAW: aluminum: 1mm, 1.2 mm - SMAW: carbon and stainless steel: 2.5mm, 3.25mm, 4mm - GTAW: carbon steel, stainless steel and aluminum: 2mm, 2.4 mm * With Multi-Pass Exercise with Different Welding Processes * Welding Pattern / Weave <ol style="list-style-type: none"> 1. Straight, 2. Triangle, 3. Convex, 4. Circle, 5. Zigzag, 6. Push/Drag * Transference Modes <ul style="list-style-type: none"> - Carbon and stainless steel: Short & globular spray * Defects Analyzed <ol style="list-style-type: none"> 1. porosity, 2. splashing, 3. slag inclusion * Report Features <ol style="list-style-type: none"> 1. CTWD, 2. Travel Speed, 3. Work Angle, 4. Travel Angle, 5. Trajectory, 6. Voltage, 7. Wirefeed Speed, 8. Technical Parameters, 9. Equipment Settings * With Analysis Module * With On-Screen Help Guides * With Classroom Connection with Different Units sharing Information * With Real Environment During Simulation * Unit Can Be Used with Glasses * Power Supply <ul style="list-style-type: none"> - 220 VAC 60Hz Single Phase * Processor <ul style="list-style-type: none"> - 8M Cache, up to 4.20 GHz (or higher) * Motherboard: Truly rated compatible motherboard * RAM 			
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- 4GB DDR4 or higher
- * Graphic Card
 - NVIDIA ®GeForce DTX 950 or equivalent
- * Hard Disk
 - Solid State | 64 GB MSATA or higher
- * Display Size
 - 9.7" or higher
- * Rear Panel Ports
 - Screen: HDMI/Display Ports
 - USB: 1x U S B, 2x USB 3.0
 - Connection: 2x LAN, 2x Antennas Wi- Fi Dual Band
 - Audio: Microphone & speakers ports
 - Others: Robotics port
- * Vision Module Resolution
 - HD LCD 4.8"
 - HDMI Display input up to 1024x600
 - Ultra-low video distortion
 - 24-bit True Color
- * Cameras Resolution
 - 800X600
- * Operating Temperature
 - 0 - 45°
- * Humidity
 - 10 - 80%
- * Updates
 - with online and offline Software updates & bug fixing (Same version) included in the license with no additional cost
- * With Remote Maintenance
- * Certifications
 - ISO 9001 Quality Management System
 - ISO 14001 Environmental Management System
- * Language
 - English

Welding Machine Trainer Specifications:

- * Number of Welding Machine:
 - 2 units
- * Rated Output:
 - Current/Voltage/Duty Cycle (MIG)
 - 230V: 200A/24V/25%
- * Effective Input Current @ Rated Output:
 - 14.7A
- * Output Range
 - 230V: 20-220 Amps DC, Max.
 - OCV: 56
- * Wire Feed Speed Range:
 - 50-500 ipm (1.3-12.7 m/min)
- * Processes:

	<ul style="list-style-type: none"> - SMAW & GMAW * Input Power: <ul style="list-style-type: none"> - 230VAC 60Hz Single Phase * Accessories: <ul style="list-style-type: none"> - Welding Gun - 230V Input Cables - Work Cable and Clamp - Electrode Holder and Lead Assembly - Adjustable Gas Regulator and Hose - Gas and Gasless Nozzles - Gun Cable Liner - Spindle Adapter - Contact Tips - Drive Rolls - Knurled Drive Rolls - Wire Guides - Welding Booth Additional Conditions: <ul style="list-style-type: none"> - ONE (1) year minimum on Parts and Service. - Bidder may opt to offer for additional warranty terms. - Equipment must be supplied with manuals in English. - Online after sales training or onsite if travelling is already allowed. - Must provide follow up after sales training within the duration of the warranty period upon request. 			
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Section VII. Technical Specifications

Notes for Preparing the Technical 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 their Bids. In the context of Competitive Bidding, the specifications (e.g. production/delivery schedule, manpower requirements, and after-sales service/parts, descriptions of the lots or items) must be prepared 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 transparency, equity, efficiency, fairness, and economy in procurement be realized, responsiveness of bids be ensured, and the subsequent task of bid evaluation and post-qualification facilitated. The specifications should require that all items, materials and accessories to be included or incorporated in the goods be new, unused, and of the most recent or current models, and that they include or incorporate all recent improvements in design and materials unless otherwise provided in the Contract.

Samples of specifications from previous similar procurements are useful in this respect. The use of metric units is encouraged. Depending on the complexity of the goods and the repetitiveness of the type of procurement, it may be advantageous to standardize the General Technical Specifications and incorporate them in a separate subsection. The General Technical Specifications should cover all classes of workmanship, materials, and equipment commonly involved in manufacturing similar goods. Deletions or addenda should then adapt the General Technical Specifications to the particular procurement.

Care must be taken in drafting specifications to ensure that they are not restrictive. In the specification of standards for equipment, materials, and workmanship, recognized Philippine and 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 equipment, materials, and workmanship that meet other authoritative standards, and which ensure at least a substantially equal quality than the standards mentioned, will also be acceptable. The following clause may be inserted in the Special Conditions of Contract or the Technical Specifications.

Sample Clause: Equivalency of Standards and Codes

Wherever reference is made in the Technical Specifications to specific standards and codes to be met by the goods and materials to be furnished or tested, the provisions of the latest edition or revision of the relevant standards and codes 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 substantial equivalence to the standards and codes specified will be acceptable.

Reference to brand name and catalogue number should be avoided as far as possible; where unavoidable they should always be followed by the words “*or at least equivalent.*” References to brand names cannot be used when the funding source is the GOP.

Where appropriate, drawings, including site plans as required, may be furnished by the Procuring Entity with the Bidding Documents. Similarly, the Supplier may be requested to provide drawings or samples either with its Bid or for prior review by the Procuring Entity during contract execution.

Bidders are also required, as part of the technical specifications, to complete their statement of compliance demonstrating how the items comply with the specification.

Technical Specifications

Item	Specification	Statement of Compliance
		<p><i>[Bidders must state here either "Comply" or "Not Comply" against each of the individual parameters of each Specification stating the corresponding performance parameter of the equipment offered. Statements of "Comply" or "Not Comply" must be supported by evidence in a Bidders Bid and cross-referenced to that evidence. Evidence shall be in the form of manufacturer's un-amended sales literature, unconditional statements of specification and compliance issued by the manufacturer, samples, independent test data etc., as appropriate. A statement that is not supported by evidence or is subsequently found to be contradicted by the evidence presented will render the Bid under evaluation liable for rejection. A statement either in the Bidder's statement of compliance or the supporting evidence that is found to be false either during Bid evaluation, post-qualification or the execution of the Contract may be regarded as fraudulent and render the Bidder or supplier liable for prosecution subject to the applicable laws and issuances.]</i></p>
1.	<p>Supply, Delivery and installation of Various Engineering Simulation and Automation Laboratory Equipment, consisting of:</p> <p>a.) Multi-Technology Design and Simulation Software, 20+1 user licenses (20 for students and 1 for teacher)</p> <p><u>Technical Specifications:</u> This software contains libraries and modules for: Hydraulics, Pneumatics, components sizing-energy, bill of material and report, catalogue manager, Manufacturers catalogues, Control panels and 2D-3D HMI, Teach ware- workflow, Didactic support, SFC Compilers, Sequential function chart, Digital electronics, APISs/, Script language, PLC ladder logic, CAN bus, Block Diagram-Math, electrical Controls, electro technical One-line, Electro technical Mechanical</p> <p><u>Descriptions:</u></p> <ul style="list-style-type: none"> * Interactive lab exercise; These exercises include simple schematic that can be simulated and animated in order to be analyzed. Teachers can also modify these exercises and create ones. * Online remote Access Licensing; You can prepare and simulate your courses and homework from home, school or workplace. * Teach ware; This software offers guides, lectures, animations and lab notes for all levels of discipline. * Workflow; Allows teachers to create and sequence content in order to evaluate students knowledge retention. * Configuration tools; allows you to create and configure valves, cylinders, motors etc. to obtain components which are graphically compliant with your requirements and respectful of real technical performance. * Create and customize your own symbols, libraries and templates; * Component sizing; Provides calculation worksheets specific to each category of pneumatic, hydraulic and electrical components which include calculation tool necessary for component sizing. * Adjustable component simulation parameters; This includes parameters such as applied loads, dimensions angles, internal leakages, force, torque, etc. 	

	<ul style="list-style-type: none"> * Dynamic, Realistic and Visual Simulation; Accurately reproduce the systems behavior in a dynamic and visual way. During simulation components are animated and lines and wires are color-coded according to their state * Virtual System; Using the electrical, PLC libraries and SFC/GRAFCET module, the student simply links sensors, switches, lights, conveyors, etc., in order to make the virtual systems operate according to teacher's instructions. * 3D Editing and Animations; * Mechanical Links; Mechanical bodies can be linked to fluid power actuators to simulate and animate their effects * Cross-section Animation; Users can build cross-section animated views and link them to the simulation results in order to produce synchronized animations. * System behavior analysis; You can monitor and visualize simulation variables during simulation * Troubleshooting Modules; * Circuit Modification during Simulation; Simulation to isolate parts of a circuits, perform measurements, Provides tools for disconnecting wires and pipes during and repair or replace components to fix suspected failures * Diagnostic Tools; Provides extensive diagnostic tools allowing to detect inconsistencies or errors such as non-compliance with ISO standards, free connectors, redundant or overlapping lines, etc. * Interfaces to programmable logic controllers and equipment; * Manufacturers Catalogues; Offering teachers and students an extensive library with thousands of preconfigured components that reproduce real world functions * Can Bus Links to Operate Virtual Machines; * PLC Export; * Block Diagram; It is possible to create a graphical environment for component and system modeling using predefined function blocks. It can also be used to create and test complete control loops * Sequential function charts; * HMI and Control Panels; User can easily create Animated shapes that reproduce the behavior of the equipment they represent. * Electrical Controls; Interacts with all components from other libraries so as to create electrically controlled systems. * Electro technical; Offers wide array of components to create AC and DC electrical circuits, from basic to advanced uses. It supports IEC and NEMA standards. Motor soft starters and VFDs are available * Electro technical One-line; Enables the design of diagrams for all voltage levels in a typical one-line 	
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	<p>representation of networks for power generation, transmission and distribution</p> <ul style="list-style-type: none"> * Digital Electronics; Includes standard devices such as inverters, logic gates, flip-flop counters, shift registers, comparators, switches, LEDs, 7-bar display, decoders, multiplexers, etc. * Programmable logic controller; Offers PLC logic libraries for different brands of PLC * Pneumatics; Includes all the symbols necessary to create pneumatic, electro pneumatic and logic systems. * Hydraulics; Offers all component symbols required to create mobile and industrial hydraulic systems and functions. 	
2.	<p>c.) Electronic Circuit Design and 3D Simulation Software (20 user licenses)</p> <p>Technical Specifications:</p> <p><u>Features and Capabilities:</u></p> <ol style="list-style-type: none"> 1. Schematic Editor 2. Schematic Symbol Editor 3. Footprint Editor 4. Netlist Editor 5. Live 3D Breadboard Tool 6. Advanced PCB Designer <ol style="list-style-type: none"> a. Automatic and Manual Design Tools b. Creating flex PCB's c. Animated 3D view 7. Electrical Rules Check (ERC) 8. Interpreter 9. Library Manager 10. Parameter Extractor 11. Text and Equation Editor 12. DC analysis 13. Transient Analysis 14. Fourier analysis 15. Digital Simulation 16. HDL Simulation (VHDL, Verilog, Verilog-A, Verilog-AMS) 17. Microcontrollers (MCU) Simulation 18. Flowchart Editor and Debugger 19. AC analysis 20. Network analysis 21. Noise analysis 22. Symbolic analysis 23. Monte-Carlo and Worst-case analysis 24. Design Tool 25. Optimization 26. Post-processor 27. Presentation 	

	<p>28. Interactive mode</p> <p>29. Virtual Instruments</p> <ol style="list-style-type: none"> a. Digital Multimeter b. Function Generator c. Storage Oscilloscope d. Signal and Network Analyzer e. Digital Signal Generator f. Logic Analyzer <p>30. Real-time Test & Measurements</p> <p>31. Training and Examination</p> <ol style="list-style-type: none"> b. Learning Management Tool – Simulator's Training Supervisor b. Teach and Learn Troubleshooting c. Problem Solving d. 1200 circuits and Integrated E-Books <p>Component Models Included in the Software:</p> <ol style="list-style-type: none"> 1. Passive components such as resistors, potentiometer, thermistor, lamp, capacitor, inductor, transformer, relay, diodes, etc. 2. Active components such as bipolar transistor, thermistor, thyristor, operational amplifier, etc. 3. Sources such as current source, voltage source, current generator, voltage generator, linear and nonlinear controlled sources, digital pulse source, etc. 4. Basic digital components such as AND, OR, NAND, NOR, XOR gates with 2, 3 and 4 inputs, tri-state buffer, inverter, D SR JK flip-flop, D latch, etc. 5. Digital IC, such as, 4000 logic family, 74000 logic family, VHDL to test and build your own logic components, FPGA and CPLD libraries 6. Measuring Instruments, such as voltage meter, ampere meter, current arrow, power meter, impedance meter 7. Other components that includes, time controlled switch, voltage controlled switch, AD and DA converter, timers, analog control blocks, pull-up resistor, seven-segment display, keypad, voltage regulator, vacuum tube, passive and active RF components, two ports (S, Z, YH) 	
<p>3.</p>	<p>c.) Electro-Pneumatic Trainer with PLC</p> <p>Technical Specifications:</p> <ul style="list-style-type: none"> * includes some basic pneumatic training set * users can have training from basic principle of electro-pneumatic controls to advance training * can be interfaced with any PLC <p><u>Training Components:</u></p> <ul style="list-style-type: none"> * physical principles of electrical systems and pneumatics * function and use of electro-pneumatic components * recognizing and drawing of electro-pneumatic symbols * representation of motion sequences and operating status * drawing of pneumatic and electrical circuit diagrams * direct and indirect manual controls * direct and indirect position-dependent control 	

- * logical AND/OR function of switch-on signals
- * representing motion sequences and switching states
- * constructing control systems using relays
- * electrical latching circuits
- * application and function of 3/2 and 5/2-way solenoid valves
- * analyzing circuits
- * application and function of limit switches
- * end-position monitoring using electronic proximity sensors
- * realizing oscillating movement
- * time-dependent controls with timer relays
- * using pressure switches
- * troubleshooting simple electro pneumatic circuits

Components:

- * Service Unit (1 unit)
 - Pressure range: 0.5~12 bar
 - Air filter, pressure, regulator, lubricator
 - Shut off valve
 - Filter degree: 40µm
 - Connection plastic hose: Outside diameter 6mm
 - Flow rate: 750 LPM
- * Air Distributor (1 unit)
 - Pressure range: 0~10 bar
 - Input: 1 ea (6 mm)
 - Output: 8 ea, check connector included (4 mm)
 - One-touch connector
- * Single-acting cylinder (1 unit)
 - Pressure range: 0~10 bar
 - Max. pressure: 15 bar
 - Piston diameter: 25 mm
 - Stroke: 50 mm
- * Double-acting cylinder with cushion (2 units)
 - Pressure range: 0~10 bar
 - Max. pressure: 15 bar
 - Piston diameter: 25 mm
 - Stroke: 125 mm
 - Magnetic for sensor detection
 - Adjustable cushion included
- * One-way flow control, valve (4 units)
 - Pressure range: 0~10 bar
 - 1(A)-->2(B): 0~150 LPM
 - 2(B)-->1(A): 160/130 LPM
- * 3/2-way solenoid valve (Normally closed) (1 unit)
 - Pressure range: 0.5~10 bar
 - Response time: 20 ms
 - Normally closed type valve
 - Spring return
 - LED and protection circuit included
 - Manual override

	<ul style="list-style-type: none"> * 5/2-way single solenoid valve (2 units) <ul style="list-style-type: none"> - Pressure range: 0.5~10 bar - Response time: 20 ms - LED and protection circuit included - Return: spring and pilot - Manual override * 5/2-way double solenoid valve (2 units) <ul style="list-style-type: none"> - Pressure range: 0.5~10 bar - Response time: 20 ms - LED and protection circuit included - Manual override * Pressure switch (1 unit) <ul style="list-style-type: none"> - Pressure range: 0.5~10 bar - Control setting pressure - Pressure display * Push-button switch set (3 fold) (1 unit) <ul style="list-style-type: none"> - Power: DC 24V - Consists of: 2 momentary push-buttons, 1 locking push-button - Contact: 2a-contact, 2 b-contact - Contact allowable: Max, 1A - Power consumption: 0.48 W * T-Connector (10 units) <ul style="list-style-type: none"> - Pressure range: 0~10 bar * Relay Unit (3 fold) (2 units) <ul style="list-style-type: none"> - Power: DC 24V - Contact: 4C (Changeover) - Contact load: Max. 5A - Allowable: Max.120W - Operating time: < 20 ms - Block time: < 20 ms * Digital Time Relay (1 unit) <ul style="list-style-type: none"> - Power: DC 24V - Contact: 2a-2b - Contact load: Max. 5A - Allowable: Max. 100W - Delay time: 1~99 sec - On-delay / Off delay * Digital Counter (1 unit) <ul style="list-style-type: none"> - Power: DC 24V - Contact: 1C(Changeover) - Contact load: Max. 5A - Power Consumption: 2.4W - Counter pulse: 20 ms - Display: 4 digits * Pilot Lamp and Buzzer unit (1 unit) <ul style="list-style-type: none"> - Power: DC 24V - Lamp Power consumption: 1.2W 	
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	<ul style="list-style-type: none"> - Buzzer Power consumption: 0.04W - Buzzer frequency: 420Hz * Inductive Sensor (1 unit) <ul style="list-style-type: none"> - Operating voltage: DC10~30V - Sensing distance: 5mm - Switching frequency: Max. 500Hz - Output: Normally open, PNP - Output Current: Max. 200mA - Short-circuit protection included * Capacitive Sensor (1 unit) <ul style="list-style-type: none"> - Switching power: DC10~30V - Sensing distance: 8mm - Response time: 1ms - Output: Normally open, PNP - Output Current: Max. 200mA - Short-circuit protection included * Optical Sensor (1 unit) <ul style="list-style-type: none"> - Switching power: DC10~30V - Switching distance: 100mm - Response time: 1ms - Output: Normally open, PNP - Output Current: Max. 200mA * Electrical limit switch (left) (2 units) <ul style="list-style-type: none"> - Contact: DC 24V,5A - Contact: 1 c - Switching frequency: Max,200Hz - Roller lever electric switch * Electrical limit switch (right) (2 units) <ul style="list-style-type: none"> - Contact: DC 24V,5A - Contact: 1 c - Switching frequency: Max,200Hz - Roller lever electric switch * Plastic Hose (1M) (10 units) <ul style="list-style-type: none"> - Operating temperature: -40°C ~ 60°C - Color: blue - Size: outside diameter 4 mm * Hose Cutter (1 unit) <ul style="list-style-type: none"> - PVC Grip - Multi-purpose - Type: 190 mm - Cutting material: Air Hose (0~16mm) * Cable Set (1 set) <ul style="list-style-type: none"> - Color: red, blue, black - Length: 1500mm, 1000mm, 500mm, 300mm,100mm - High elasticity and special coating * Power Supply (1 unit) <ul style="list-style-type: none"> - Power: AC 220 V,50/60Hz - Output power: DC 24V 	
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	<ul style="list-style-type: none"> - Output current: 5A * Electro-pneumatics textbook (1 unit) <ul style="list-style-type: none"> - Fundamentals of electrical technology - Components in the electrical signal control section - Electrically actuated directional control valves * Electro-pneumatics workbook (Basic Level) (1 unit) * Cable Hanger (1 unit) * Profile panel (750 x 1200) (1 unit) <ul style="list-style-type: none"> - Size: 1200 (L) x 750 (W) x 30 (T) * Pneumatic basic working table (1 unit) * Air Compressor (1 unit) * Single four layered drawer * Programmable Logic Controller Trainer <ul style="list-style-type: none"> - Digital Input: 16 channels - Digital Output: 16 channels - 4mm socket - Power Supply included 	
4.	<p>d.) Advance Virtual/augmented Reality Welding Trainer</p> <p>Technical Specifications:</p> <p>1 Unit Welding Simulator Specifications:</p> <ul style="list-style-type: none"> * Welding Processes Supported: <ul style="list-style-type: none"> - GMAW (MIG/MAG) & FCAW G/S, SMAW (MMA Electrode), GTAW (TIG) * Welding Positions: <ul style="list-style-type: none"> - PA, PB, PC, PD, PF/PG, PE, PH/PJ, HL045/JL045, - 1F, 2F, 3F, 4F, 1G, 2G, 3G, 4G, 5G, 5F, 6G, 6F * Welding Joints: <ol style="list-style-type: none"> 1. Overlapped plate, 2. V - Butt plate, 3. T -Angled plate to plate, 4. V - Butt pipe, 5. T - Angled pipe to plate 6. Advanced Welding Multijointed GMAW welding part in carbon steel (Plate-Tube Butt Vertical). Three welding beads, one of them circular 7. Advanced Welding Multijointed Part for GMAW welding in carbon steel. It has internal welds in different angles and different positions in the same trajectory (horizontal, vertical, 6G, under the ceiling) 8. Advanced Welding Multijointed Part for GMAW welding in carbon steel. Butt and horizontal welding with splice and obstacle. Corner weld with continuity in PB position, PB-PD corner weld with appendages and splices. J" and "V" shaped return weld. * With Real Welding Torches * With Welding Sounds * Accessories: <ol style="list-style-type: none"> 1. Welding Mask, 2. Welding torches, 3. Filler rod, 4. Welding gloves, 	

	<ul style="list-style-type: none"> 5. Workstand, 6. Mobile covercase, 7. GTAW (TIG) Pedal, 8. Basic Welding Multijoints & Advanced Welding Multijoints * With voltage selection * With Intensity (Amperage) Selection * With Shielding Gas Selection * With Wire Speed Selection in GMAW and FCAW * Coupon thickness Selection: <ul style="list-style-type: none"> - 3mm, 6mm, 10mm * With Possibility to use other Thickness * Electrode Stick/Filler Rod Diameter Selection: <ul style="list-style-type: none"> - GMAW: carbon and stainless steel: 0.8mm, 1mm, 1.2mm - GMAW: aluminum: 1mm, 1.2 mm - SMAW: carbon and stainless steel: 2.5mm, 3.25mm, 4mm - GTAW: carbon steel, stainless steel and aluminum: 2mm, 2.4 mm * With Multi-Pass Exercise with Different Welding Processes * Welding Pattern / Weave <ul style="list-style-type: none"> 1. Straight, 2. Triangle, 3. Convex, 4. Circle, 5. Zigzag, 6. Push/Drag * Transference Modes <ul style="list-style-type: none"> - Carbon and stainless steel: Short & globular spray * Defects Analyzed <ul style="list-style-type: none"> 1. porosity, 2. splashing, 3. slag inclusion * Report Features <ul style="list-style-type: none"> 1. CTWD, 2. Travel Speed, 3. Work Angle, 4. Travel Angle, 5. Trajectory, 6. Voltage, 7. Wirefeed Speed, 8. Technical Parameters, 9. Equipment Settings * With Analysis Module * With On-Screen Help Guides * With Classroom Connection with Different Units sharing Information * With Real Environment During Simulation * Unit Can Be Used with Glasses * Power Supply <ul style="list-style-type: none"> - 220 VAC 60Hz Single Phase 	
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	<ul style="list-style-type: none"> * Processor <ul style="list-style-type: none"> - 8M Cache, up to 4.20 GHz (or higher) * Motherboard: Truly rated compatible motherboard * RAM <ul style="list-style-type: none"> - 4GB DDr4 or higher * Graphic Card <ul style="list-style-type: none"> - 2GB DDR5 Video Card * Hard Disk <ul style="list-style-type: none"> - Solid State 64 GB MSATA or higher * Display Size <ul style="list-style-type: none"> - 9.7" or higher * Rear Panel Ports <ul style="list-style-type: none"> - Screen: HDMI/Display Ports - USB: 1x U S B, 2x USB 3.0 - Connection: 2x LAN, 2x Antennas Wi- Fi Dual Band - Audio: Microphone & speakers ports - Others: Robotics port * Vision Module Resolution <ul style="list-style-type: none"> - HD LCD 4.8" - HDMI Display input up to 1024x600 - Ultra-low video distortion - 24-bit True Color * Cameras Resolution <ul style="list-style-type: none"> - 800X600 * Operating Temperature <ul style="list-style-type: none"> - 0 - 45° * Humidity <ul style="list-style-type: none"> - 10 - 80% * Updates <ul style="list-style-type: none"> - with online and offline Software updates & bug fixing (Same version) included in the license with no additional cost * With Remote Maintenance * Certifications <ul style="list-style-type: none"> - ISO 9001 Quality Management System - ISO 14001 Environmental Management System * Language <ul style="list-style-type: none"> - English <p><u>Welding Machine Trainer Specifications:</u></p> <ul style="list-style-type: none"> * Number of Welding Machine: <ul style="list-style-type: none"> - 2 units * Rated Output: <ul style="list-style-type: none"> - Current/Voltage/Duty Cycle (MIG) - 230V: 200A/24V/25% * Effective Input Current @ Rated Output: <ul style="list-style-type: none"> - 14.7A * Output Range <ul style="list-style-type: none"> - 230V: 20-220 Amps DC, Max. 	
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	<ul style="list-style-type: none"> - OCV: 56 * Wire Feed Speed Range: <ul style="list-style-type: none"> - 50-500 ipm (1.3-12.7 m/min) * Processes: <ul style="list-style-type: none"> - SMAW & GMAW * Input Power: <ul style="list-style-type: none"> - 230VAC 60Hz Single Phase * Accessories: <ul style="list-style-type: none"> - Welding Gun - 230V Input Cables - Work Cable and Clamp - Electrode Holder and Lead Assembly - Adjustable Gas Regulator and Hose - Gas and Gasless Nozzles - Gun Cable Liner - Spindle Adapter - Contact Tips - Drive Rolls - Knurled Drive Rolls - Wire Guides - Welding Booth Additional Conditions: <ul style="list-style-type: none"> - ONE (1) year minimum on Parts and Service. - Bidder may opt to offer for additional warranty terms. - Equipment must be supplied with manuals in English. - Online after sales training or onsite if travelling is already allowed. - Must provide follow up after sales training within the duration of the warranty period upon request. 	
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Section VIII. 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);
or
- (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
- (d) Tax clearance per E.O. No. 398, s. 2005, as finally reviewed and approved by the Bureau of Internal Revenue (BIR).

Technical Documents

- (e) 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; **and**
- (f) Statement of the bidder’s Single Largest Completed Contract (SLCC) similar to the contract to be bid, except under conditions provided for in Sections 23.4.1.3 and 23.4.2.4 of the 2016 revised IRR of RA No. 9184, within the relevant period as provided in the Bidding Documents; **and**
- (g) 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**
- (h) Conformity with the Technical Specifications, which may include production/delivery schedule, manpower requirements, and/or after-sales/parts, if applicable; **and**
- (i) 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.

Financial Documents

- (j) The Supplier’s audited financial statements, showing, among others, the Supplier’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**
- (k) The prospective bidder’s computation of Net Financial Contracting

Capacity (NFCC);

or

A committed Line of Credit from a Universal or Commercial Bank in lieu of its NFCC computation.

Class “B” Documents

- (l) If applicable, a duly signed joint venture agreement (JVA) 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

- (m) Original of duly signed and accomplished Financial Bid Form; **and**
 (n) Original of duly signed and accomplished Price Schedule(s).

Other documentary requirements under RA No. 9184 (as applicable)

- (o) *[For foreign bidders claiming by reason of their country’s extension of reciprocal rights to Filipinos]* Certification from the relevant government office of their country stating that Filipinos are allowed to participate in government procurement activities for the same item or product.
 (p) Certification from the DTI if the Bidder claims preference as a Domestic Bidder or Domestic Entity.

