



FIJI ELECTRICITY AUTHORITY

BIDDING DOCUMENT

**DESIGN, BUILD and CONSTRUCTION OF
PINEAPPLE CORNER SUBSTATION
BUILDING EXTENSION**

CIVIL CONSTRUCTION

INVITATION FOR BIDS

Date: 23rd September, 2017

Tender No: MR 246/2017

The Fiji Electricity Authority ("the Employer") invites sealed bids from eligible civil Construction bidders for Engineering Design-build and Construction and completion of Pineapple Corner Substation Building Extension in the Western region of the main island, Vitilevu. All works shall be undertaken to Fiji National Building Code, National Fire Authority (NFA) Requirements and relevant IEC/BS/ASNZ standards.

Bidders may obtain further information from, and inspect and acquire the bidding documents, at

Pineapple Corner Substation – CIVIL CONSTRUCTION
Tuvitu Delairewa
General Manager Commercial
2 Marlow Street,
Suva, FIJI.
Phone: 679 3224 185
Facsimile: 679 331 1882
Email: TuvituD@fea.com.fj

A mandatory site visit is scheduled at **10am on Wednesday 27th September, 2017 at Pineapple Corner Substation.**

All bids must be delivered to Tuvitu Delairewa, General Manager Corporate Services, 2 Marlow Street, Suva, Fiji, Phone: (679) 3224 185, Facsimile: (679) 331 1882 Email: TuvituD@fea.com.fj at or before 1600 hours Fiji Local times on Wednesday, 11th October, 2017.

Section 1. Instructions to Bidders

- 1. Scope of Bid** The Fiji Electricity Authority (hereinafter referred to as "the Employer"), wishes to receive bids for design-build and Construction– CIVIL Construction only , and completion of Pineapple Corner Substation Building Extension as defined in these bidding documents (hereinafter referred to as "the Works").
- The successful bidder will be expected to complete the Works within **4 months** from the date of commencement of the Works.
- 2. Eligible Bidders** This Invitation to Bid is open to bidders who have sound financial background and have previous experience in handling such civil projects.
- Bidders shall provide such evidence of their continued eligibility satisfactory to the Employer as the Employer shall reasonably request.
- Bidders shall not be under a declaration of ineligibility for corrupt or fraudulent.
- 2. Eligible Materials, Equipment and Services** The materials, equipment, and services to be supplied under the Contract shall have their origin from reputable companies from various countries and all expenditures made under the Contract will be limited to such materials, equipment, and services. At the Employer's request, bidders may be required to provide evidence of the origin of materials, equipment, and services.
- 3. Qualification of the Bidder** To be qualified for award of Contract, bidders shall submit proposals regarding work methods, scheduling and resourcing which shall be, provided in sufficient detail to confirm the bidder's capability to complete the works in accordance with the specifications and the time for completion.
- 4. Cost of Bidding** The bidder shall bear all costs associated with the preparation and submission of its bid and the Employer will in no case be responsible or liable for those costs.
- 5. Site Visit** The bidder is advised to visit and examine the Site of Works and its surroundings and obtain for itself on its own responsibility all information that may be necessary for preparing the bid and entering into a contract for the design-build and completion of the Works. The costs of visiting the Site shall be at the bidder's own expense. The pre-bid meeting is scheduled on **Wednesday 27th September at 10am Pineapple Corner Substation.** 1 km from Navutu FEA Office towards Lautoka City.
- 6. Sealing and Marking of Bids** The bidder shall seal the original copy of the technical proposal, the original copy of the price proposal and each copy of the technical proposal and each copy of the price proposal in separate envelopes clearly marking each one as: "ORIGINAL-PROPOSAL", and "COPY PROPOSAL", etc. as appropriate.
- The bidder shall seal the original bids and each copy of the bids in an inner and an outer envelope, duly marking the envelopes as "ORIGINAL" and "COPY".

The inner and outer envelopes shall

be addressed to the Employer at the following address: Tuvitu Delairewa
General Manager Corporate Services 2
Marlow Street, Suva, FIJI. Phone: 679 3224
185 Facsimile: 679 331 1882 Email:
TuvituD@fea.com.fj

And

bear the following identification:

- Bid for: Pineapple Corner Substation – CIVIL Construction
- Bid Tender Number: **MR246/2017**
- DO NOT OPEN BEFORE **Thursday, 12th October, 2017**

7. Deadline for Submission of Bids

Bids must be received by the Employer at the address specified above no later than 1600 hours (Fiji Time) **Wednesday, 11th October, 2017**.

The Employer may, at its discretion, extend the deadline for submission of bids by issuing an addendum, in which case all rights and obligations of the Employer and the bidders previously subject to the original deadline will thereafter be subject to the deadlines extended.

8. Late Bids

Any bid received by the Employer after the deadline for submission of bids prescribed in Clause 23 will be rejected and returned unopened to the bidder.

9. Modification and Withdrawal of Bids

The bidder may modify or withdraw its bid after bid submission, provided that written notice of the modification or withdrawal is received by the Employer prior to the deadline for submission of bids.

The bidder's modification or withdrawal notice shall be prepared, sealed, marked and delivered in accordance with the provisions of Clause 22, with the outer and inner envelopes additionally marked "MODIFICATION" or "WITHDRAWAL", as appropriate. A withdrawal notice may also be sent by fax but must be followed by a signed confirmation copy.

No bid may be modified by the bidder after the deadline for submission of bids.

10. Employer's Right to Accept any Bid and to Reject any or all Bids

Notwithstanding Clause 34, the Employer reserves the right to accept or reject any bid, and to annul the bidding process and reject all bids, at any time prior to award of Contract, without thereby incurring any liability to the affected bidder or bidders or any obligation to inform the affected bidder or bidders of the grounds for the Employer's action.

11. Notification of Award

Prior to expiration of the period of bid validity prescribed by the Employer, the Employer will notify the successful bidder by fax, confirmed by registered

letter, that its bid has been accepted. This letter (hereinafter and in the Conditions of Contract called the "Letter of Acceptance") shall name the sum which the Employer will pay the Contractor in consideration of the execution, completion and maintenance of the Works by the Contractor as prescribed by the Contract (hereinafter and in the Conditions of Contract called "the Contract Price").

The notification of award will constitute the formation of the Contract.

Upon the furnishing by the successful bidder of a performance security, the Employer will promptly notify the other bidders that their bids have been unsuccessful

**12. Signing of
Contract
Agreement**

At the same time that he notifies the successful bidder that its bid has been accepted, the Employer will send the bidder the Form of Contract Agreement provided in the bidding documents, incorporating all agreements between the parties.

Within 7 days of receipt of the Form of Agreement, the successful bidder shall sign the Form and return it to the Employer.

**13. Corruptor
Fraudulent
Practices**

The Employer requires that the Contractor observe the highest standard of ethics during the procurement and execution of such contracts. In Pursuance of this policy, the Employer:

- (a) defines, for the purposes of this provision, the terms set forth below as follows:
 - (i) "corrupt practice" means behavior on the part of officials in the public or private sectors by which they improperly and unlawfully enrich themselves and/or those close to them, or induce others to do so, by misusing the position in which they are placed, and it includes the offering, giving, receiving or soliciting of anything of value to influence the action of any such official in the procurement process or in contract execution; and
 - (ii) "fraudulent practice" means a misrepresentation of facts in order to influence a procurement process or the execution of a contract to the detriment of the Employer, and includes collusive practice among bidders (prior to or after bid submission) designed to establish bid prices at artificial non-competitive levels and to deprive the Employer of the benefits of free and open competition;
- (b) will reject a proposal for award if it determines that the bidder recommended for award has engaged in corrupt or fraudulent practices in competing for the contract in question;

Furthermore, bidders shall be aware of the provision stated in Sub-Clause 1.16 and Sub-Clause 15.5 of the Conditions of Contract, Part II - Conditions of Particular Application.

Scope of Works

Description

The new building extension of Pineapple Corner Substation shall be done in two stages :

1. Stage 1 shall be the new extension with complete building extension and finishing works.
2. Stage 2 shall be raising the roof of existing building to the same level of the new building.

The contractor shall be responsible for the Design-Build and Construction of the Building Extension at Pineapple Corner Substation. This will also include Battery Bank, SCADA and storage building. The contractor shall be responsible for the proper construction of the driveway and substation fencing with gate, together with weed mat and crush metal works. The contractor shall meet Fiji National Building code, National Fire Authority (NFA) code and Electrical IEC/BS/AS/NZ standards.

The new building shall be an extension with the old building. Relevant necessary drawing will be attached in this document for reference.

A. Dimensions

a. New Extension – Building Dimension

The new extension shall be of 12 meters of length with the same width as the old building, which is 7 meters from the interior wall to wall. The height of the new building walls shall be 3.5 meters from the building floor level to the upper concrete level. The entire structure shall be steel and concrete. No timber finishing or structural shall be permitted.

b. SCADA Room

SCADA Room will be combined with Battery Room with same length of 3m. But with the width of 2m.

c. Battery Room

There shall be a separate room to house DC Battery. This shall be of 3 meter of length and width of 4 meter. The height shall be same as the building height. This should be a separate room from the control building, with its separate door. This door will be from inside the control building. There shall be an exhaust fan installed in the battery room, fully wired, with mesh and louver blade installed.

d. Existing Building

The existing building's roof shall be replaced with steel structure as new extension. No timber shall be used or present.

B. Roofing

Roofing shall not include any timber. All roofing structures shall be structural steel H Beams and steel C Purlins structural 8.8Grade including bolts and nuts. Structural steel members shall have appropriate rust protection system, either by paint or hot-dip galvanizing. Roofing shall be a tested

and approved Colorbond (Klip-lok or similar) brand or similar. Cyclone certified and approved roofing screws shall be used and not nails.

From the existing building, the wooden roof structure shall be replaced with the steel support structure as well. This shall be same as the new extension.

C. Building Structure

The building shall be fully concrete and no timber shall be used.

All building designs shall be carried out by an engineer/engineering firm recognized by the Insurance Council of Fiji. The building shall be designed to "Structure Importance Level – 4" in accordance to Table 3.1 of AS/NZS 1170 Part 0.

A copy of signed and approved "FOR CONSTRUCTION" drawing shall be kept at the construction site at all times, and a copy forwarded to FEA.

The Contractor shall get all statutory approvals and consents in place before construction works starts.

All reinforcement steel and structural steel shall be inspected and approved by the design engineer, before commencement of concrete pour or commencement of next activity in case of structural steel. A copy of Documentary evidence of all such approvals shall be kept on site, with photographs, where applicable.

Building requirements:

- a. All walls shall be 200mm concrete block.
- b. All flooring shall be concrete with 150mm deep.
- c. The floor of the new building extension shall match the floor level of the existing building floor level.
- d. Walls shall be plastered to Fiji Building code standards. This includes outside wall, inside wall and also the floor.
- e. All air ventilation passages on the walls shall be sealed. This includes in the existing building as well.
- f. The control building and the battery bank room shall be sealed with no open spaces on the roof or walls. It shall have heat insulation and water proofing.
- g. The doors shall be of steel 6mm thick as per FEA drawings.
- h. Painting shall be to FEA approved colors and standard. The paint shall have a guarantee of 15 years, preferred is Dulux Exterior and Interior Paints. The contractor shall paint the new extension building together with the storage room and the existing building as well. It shall include the exterior and interior walls together with the floor as well.
- i. As a design guideline, columns shall be used to raising of the roof, on the existing building. These columns shall be constructed between the walls to support the existing wall structure. A beam then constructed on these columns to support the roof structure.
- j. The foundation of the building shall be earthed and connected to the main earth of the building.
- k. For all finishing works, cement boards shall be used and no wood.
- l. All doors and windows shall be sealed. On extreme weather conditions, water shall not seep in from the windows or doors.
- m. All windows shall be installed with galvanized gothic mesh. Windows shall have aluno tec louvre blades with at least 8 blades in each window.

- n. The control building shall have ceiling inside – no wood, same for battery room with all sealing provided to prevent outside air to flow in the building.

Electrical Requirements:

GPO's and Power Point

- a. Two heavy outdoor weather proof power points – 80A.
- b. 4 x 10A GPO's inside the New- Extended Control Building.
- c. 4 x 15A GPO's for air-conditioning of the Control Building.
- d. 1 x 15A GPO for air-conditioning of the battery room.
- e. 2 x 10A GPO's inside the Battery room.
- f. 2 x 10A GPO's inside the SCADA Room

Air-Condition Unit

It is contractor's scope of work to supply and install:

- a. 1 x 8, 000 BTU Daikin Brand A.C Unit for Battery Room.
- b. 4 x 12, 000 BTU Daikin Brand A.C Unit for Control Room.

Building and External Lights (old and New Building)

All lighting shall be LED Philips Down light Brand.

- a. Four rows of lighting
- b. Down light spacing of 2m
- c. Lighting level shall be as per AS/NZ standards.
- d. All fittings shall be of higher quality and impervious to corrosion.
- e. Emergency lighting system will be connected to both AC and DC system using FEA 110V DC battery.
- f. All lightening from the existing building shall be replaced to LED lights to preferably 20W, 6000k lumens.
- g. Shall be four single and common switch to switch on the lights of both the new extension and existing building both sides. It shall be contractors responsibility have a common switch located in the new extension building for the lightening system.
- h. Shall include two (2) x switchyard lightening on street galvanized tubular poles of 8 meter height. This shall have LED Outdoor Philips 150W Lights with separate daylight switch for each ligh. Termination accessible from the bottom terminal box. Tubular poles from INGAL or BHP Australia.

D. Lighting Mast

The contractor shall install one (1) x 17m lighting mast in consultation with FEA.

E. Trenches

- a. The existing trenches, in the existing building, shall be continued to the new extension with the same dimensions which are 750mm by 900mm for the Switchgear Panel Cables and 600mm x 450mm for the Control Cable.
- b. There shall be a set of 17 duct access given for the Switchgear Panel Trench for future cables. This shall be size of 150mm. The Switchgear Panel Cable trench shall be installed with cable tray for control cables in vertical.
- c. The trench shall be made with a ready mix concrete from Standard Concrete at 25MPA with 200mm thick walls.
- d. All trench shall have all drain management to ensure there is no water collection with a discharge plan.

- e. The two trenches, Control Cable Trench and the Switchgear Panel Cable Trench, shall have a connecting access three locations across. This shall run across, with the same dimension as the Control Cable Trench, from one trench to another. This shall be done at the Control building and as well as the battery room.
- f. All trenches shall be covered with iron chequer plates with at least 6mm thick plates non-skid. Trenches shall have a groove with angle line to perfectly fit the plates on top. The grooves shall be at least 2mm more in height than the thickness of the plate. All chequer plates shall have an easy facility to lift and put it aside.
- g. All trenches shall be properly plastered and sealed. All ducts shall be sealed from inside and outside. Trenches shall be made water proof as no water to sip-in.
- h. The Switchgear Cable trench shall have a pit for water collection and drainage facility provided with a dimension of 400mm x 400mm x 150mm (L x W x D).
- i. All chequer plates shall not exceed length of 1200mm and no cut-pieces of plates shall be used or welded.

F. Drainage System

- a. All surface water drainage system shall be connected to public water supply system using 150MM sewerage pipes.
- b. Internal surface water drainage system shall be directed as per the Environmental Management Plan.
- c. The existing V drainage will be affected due to the building extension. The contractor shall re-construct the V Drain at the new site after the extension.
- d. The new extension building and the existing building, after the roof replacement, shall have a proper guttering, down water pipes and water chambers to clear the water. The water chambers shall have underground piping that connects to the main drain.
- e. Provide a drain management plan.

G. Fencing and Gate

Upon building extension, two sides of the current fencing structure will be removed to accommodate for the extension. It shall be contractor's responsibility to carry out the necessary fencing works for the yard.

- a. 3.5mm galvanized fence Chain link with anti-repellents IEC standards, C grade galvanized 6mm X 50mm post and 2 sliding roller gates (5m long) with 5mm X 2.4m high Gothic mesh. Fence to have minimum 3 rows of block fair phase. The height of the fence to ground level shall be equal to the height of the existing fence. Earth Each post and gate as per BS standard. Provide continuous earthing 1m outside entire fence and connected to the main earth grid and each galvanized post as per IEEE standards.
- b. The fence shall be for 2 sides only of length 51 meters and width of 45 meters. As a design guideline, the foundation shall be at least 800 x 200 x 200mm (D x L x W) for all galvanized post. Every third post of the fence shall be earthed. All fence post shall be capped. All Gates shall be earthed.
- c. As design guideline, the gates shall have a foundation of 300mm X 600mm deep with 100mm X 100mm X 9mm Angle line. It shall be contractor's responsibility to remove the existing gate and install a new roller gates.

H. Landscaping

- a. As required for the layout complete with concrete and screened crushed metal with weed mats as per IEC/BS electrical standard. The contractor shall put crush metal 40mm screens on the extended yard only together with the weed mats.
- b. AS/NZ Weed control mat entire substation perimeter suitable for Substation weed management.

I. Site Clearing

It shall be contractor's responsibility to clear the work site with all debris and waste material once the construction works is complete.

It shall be contractor's responsibility to cut and remove any tree or debris prior to start with the construction works. Dispose in discussion with respective municipality.

J. Price and Payment

- a. The Contract Price is to be on a Lump Sum basis. The tenderer is to submit a breakdown of the various components of the project.
- b. The Contractor's request for payment shall be made to the Authority in writing, accompanied by invoice(s) describing, as appropriate, and services performed, together with other documents as may be required by the Authority. Payments shall be made promptly by the Authority, within thirty days of submission of an invoice/claim by the Contractor.
- c. The Contractor is eligible for payment after completion of the Contract. No partial payments will be made.
- d. If the contractor fail to complete the project before the due date, FEA have the right to engage another contractor to complete the project, hence affecting the total amount of payment.

K. Validity

The Tendered Price is to remain valid for a period of 120 days after the closing date of the tender.

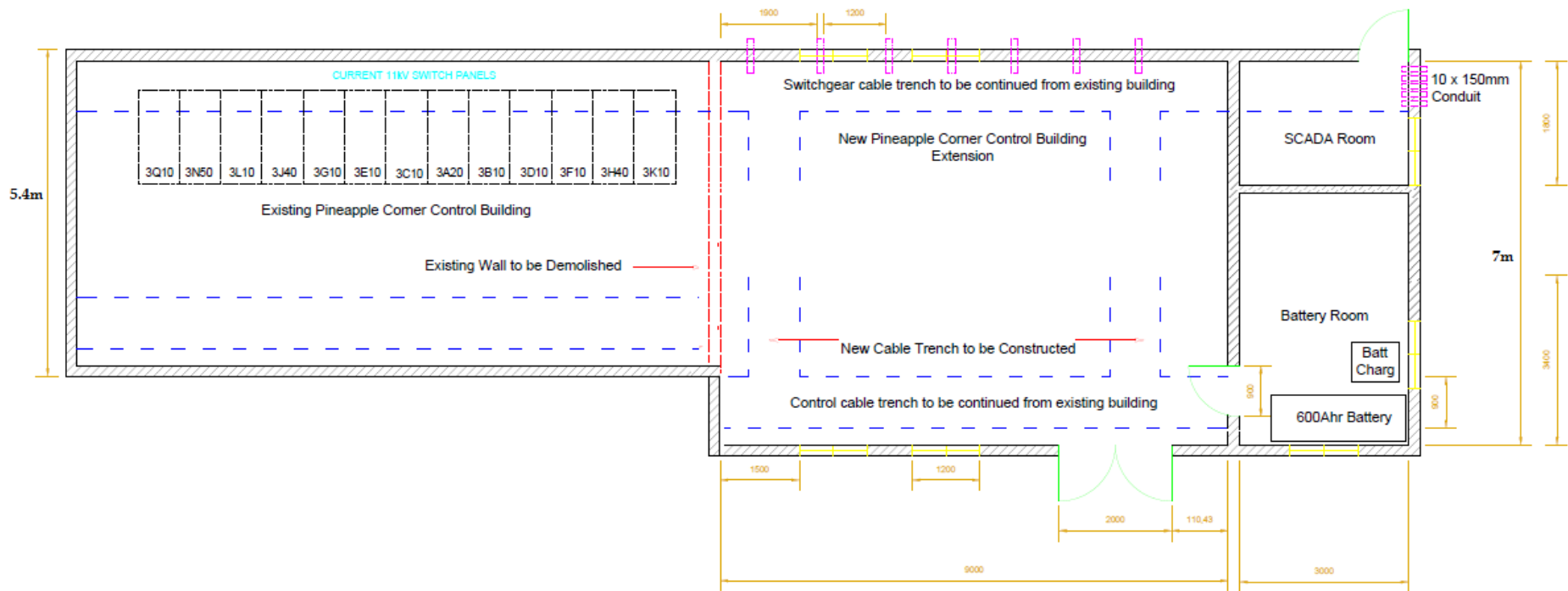
L. Contractors Requirements

- a. Ensure to submit the CIVIL Engineer that shall be carrying out the Substation building design.
- b. Ensure all Council approvals is compliant and all council dues are contractors responsibilities
- c. Previous Project History.
- d. Lightning Mast, Security Light and other related drawings.

L. Price Breakdown

Please fill in the price breakdown details as required.

Item	Description	Fijian Dollars Amount (FJD) including VAT
1	Total cost of the building extension (Control building and battery room) with electrical works.	
2	Wooden Roof Replacement in the Current Control Building and extension.	
3	Fencing works required as per tender.	
4	Weed mat and crush metal works as per tender.	
5	Construction of new gate for the main fence with substation lighting (2 poles) and Lighting Mast – 1 x 17m	
6	Engineers Design and Certification Cost	
7	Others, if any. (Specify)	
	Project Total	



TENDER SUBMISSION CHECK LIST

The Bidders must ensure that the details and documentation mention below must submitted as part of their tender Bid

Tender Number _____

Tender Name _____

1. Full Company Name: _____
(Attach copy of Registration Certificate)
2. Director/Owner(s): _____
—
3. Postal Address: _____
4. Phone Contact: _____
5. Fax Number: _____
6. Email address: _____
7. Office Location: _____
8. TIN Number: _____
(Attach copy of the VAT Registration Certificate – Local Bidders Only)
9. Company Registration Number: _____
(Attach copy of the Business License)
10. FNPF Employer Registration Number: _____
(For Local Bidders only)
11. Contact Person: _____

I declare that all the above information is correct.

Name: _____ Position: _____ Sign: _____

Date: _____

Submission of Tender

Two (2) hard copies of the tender bids in sealed envelope shall be deposited in the tender box located at the Supply Chain Office at the FEA Head Office, 2 Marlow Street, Suva, Fiji.

Courier charges for delivery of Tender Document must be paid by the bidders.

This tender closes at 4:00 p.m. (16.00hrs Fiji time) on **Wednesday 11th October, 2017**

Site Visit: FEA's Pineapple Corner Substation at 10.00 am on Wednesday 27th September, 2017

Each tender shall be sealed in an envelope with:

The envelope bearing only the following marking:

MR 246/2017

Design, Build and Construction of Pineapple Corner Substation Building Extension

The Secretary, Tender Committee
Fiji Electricity Authority
Supply Chain Office
Private Mail Bag, Suva

It must also indicate the name and address of the tenderer on the reverse of the envelope.

All late tenders, unmarked Envelopes and envelopes without bidder's name and address on the reverse on the envelope will be returned to the Tenderers unopened. (Bids via e-mail or fax will not be considered).

The bidders must ensure that their bid is inclusive of all Taxes payable under Fiji Income Tax Act and must have the most current Tax Compliance Certificate.

For further information or clarification please contact our Supply Chain Office on phone **(+679) 3224360 or (+679) 9991587.**

Bidders are requested to submit a:

- **Valid Tax Compliance Certificate**
- **FNPF Compliance Certificate**