

November 7, 2022

P-RFQ No. 2022-082

**REQUEST FOR QUOTATION**

**SUPPLY AND DELIVERY OF VARIOUS CIRCUIT BREAKERS, HOA SELECTOR SWITCH AND AUXILLARY CONTACTOR**

The Santa Maria Water District (SMWD) hereinafter referred to as “the Purchaser”, through its Bids and Awards Committee (BAC), invite interested parties to submit price quotation for the project, “**SUPPLY AND DELIVERY OF VARIOUS CIRCUIT BREAKERS, HOA SELECTOR SWITCH AND AUXILLARY CONTACTOR**” through Small Value Procurement (Sec. 53.9 of R.A. No. 9184) with Approved Budget for the Contract (ABC) of One Hundred Eight Thousand Nine Hundred Eighty Three and Seventy Six Centavos Only (**₱108,983.76**).

	Description	Qty	Unit	Unit Cost	Total Amount
1	<b>CIRCUIT BREAKER 160A</b> - with 2 sets EZEUG2503	2	PC		
2	<b>CIRCUIT BREAKER 125A</b> - 125A   with 2-sets	4	PC		
3	<b>CIRCUIT BREAKER 15A</b> - 120/240V; 10kA; bolt on	3	PC		
4	<b>CIRCUIT BREAKER 20A</b>	3	PC		
5	<b>CIRCUIT BREAKER MINI 10A</b> - 3 phase, 10A	5	PC		
6	<b>HOA SELECTOR SWITCH</b> 3-position; maintained	4	PC		
7	<b>AUXILLARY CONTACTOR</b> - N.O. – 2 N.C.	3	SET		
	***please see attached technical specifications***				
	*** nothing follows ***				

All items listed under the purchaser’s specifications must be complied on a pass-fail basis.

Failure to meet any one of the requirements will result to rejection. Likewise, it is understood that Purchaser’s specifications are minimum requirements. The Bidder/Supplier may offer higher specifications or additional items, if any.

Procurement procedures will be conducted in accordance with the provisions of the Implementing Rules and Regulations (IRR) of Republic Act No. 9184 (Government Procurement Reform Act).

It is the intent of the Purchaser to evaluate the quotation for the item and award will be made to the quotation resulting in the lowest cost per item, meeting purchaser’s technical specifications.



Likewise, in accordance with Section 54.6 and Appendix A of Annex "H" (Consolidated Guidelines for the Alternative Methods of Procurement) of the IRR of RA No. 9184, the supplier shall provide the following documentary requirements as a **condition for award** of the contract:

1. PhilGEPS Registration Number
2. Mayor's/Business Permit
3. Photo Copy of Sample Official Receipt (OR)
4. Certificate of Registration (BIR FORM 2303); and
5. Duly Notarized Omnibus Sworn Statement.

Your prices must be quoted in Philippine Peso and must include the unit price and total price, inclusive of all taxes to be paid and other incidental cost to the delivery site if the contract is awarded.

Payment shall be through check and advance payment is not allowed. Payment shall only be made upon completion of delivery of all items.

All quotations may be typewritten or handwritten and may be placed in sealed envelope marked "**SUPPLY AND DELIVERY OF VARIOUS CIRCUIT BREAKERS, HOA SELECTOR SWITCH AND AUXILIARY CONTACTOR**" (RFQ No. 2022-082) and must be submitted on or before **November 14, 2022, 11:00AM** at the SMWD main office. It may also be sent thru email on our official email address at [smwdbulacan@yahoo.com](mailto:smwdbulacan@yahoo.com) on the specified time stated above and address to the General Manager, Engr. Carlos N. Santos Jr.

Quotations shall be valid for thirty (30) calendar days from the deadline of submission of the same.

The delivery period shall be within **5 Days** from receipt of the Purchase Order (PO). The supplier should inform the purchaser at least two (2) days before the date of delivery. The Purchaser shall have the right to reject or to return the items that will be declared defective. The delivery will be made only during working days from 8:00 AM to 5:00 PM.

DELIVERY SITE: General Services Division of SMWD located at 301 J. P. Rizal St., Dulong Bayan, Santa Maria, Bulacan.

The prospective supplier shall submit the following:

- a) Duly accomplished Quotation Form; and
- b) Brochures of the items offered, if any.



The Santa Maria Water District reserves the right to accept or reject any quotation, and to annul the procurement process and reject all quotations at any time prior to Contract award, without thereby incurring any liability to the affected supplier or suppliers. SMWD also reserves the right to waive any required formality in the proposals received, and select the proposal which it determines to be the most advantageous to the government.

**Prepared by:**

**Noted by:**

Sgd.

Sgd.

**Romel P. Lazaga**  
Procurement Assistant

**Maria Leonora S. Romarate**  
BAC Chairperson

## SPECIFICATIONS

### **CIRCUIT BREAKER 160A MAIN**

device application: Distribution

poles description: 3P

protected poles description: 3t

network type: AC  
DC

network frequency: 50/60 Hz

[In] rated current: 250 A at 40 °C

[Ui] rated insulation voltage: 690 V AC 50/60 Hz conforming to IEC 60947-2

[Uimp] rated impulse withstand voltage: 6 kV conforming to IEC 60947-2

[Ue] rated operational voltage: 550 V AC 50/60 Hz conforming to IEC 60947-2  
250 V DC conforming to IEC 60947-2

breaking capacity code: F

breaking capacity: 10 kA Icu at 440 V AC 50/60 Hz conforming to IEC 60947-2

15 kA Icu at 400...415 V AC 50/60 Hz conforming to IEC 60947-2

18 kA Icu at 380 V AC 50/60 Hz conforming to IEC 60947-2

25 kA Icu at 110...130 V AC 50/60 Hz conforming to IEC 60947-2

25 kA Icu at 220...240 V AC 50/60 Hz conforming to IEC 60947-2

5 kA Icu at 125 V DC 1P conforming to IEC 60947-2

5 kA Icu at 250 V DC 2P conforming to IEC 60947-2

5 kA Icu at 550 V AC 50/60 Hz conforming to IEC 60947-2

[Ics] rated service breaking capacity: 9 kA at 380 V AC 50/60 Hz conforming to IEC 60947-2

12.5 kA at 110/130 V AC 50/60 Hz conforming to IEC 60947-2

12.5 kA at 220/230/240 V AC 50/60 Hz conforming to IEC 60947-2

2.5 kA at 125 V DC conforming to IEC 60947-2

2.5 kA at 250 V DC conforming to IEC 60947-2

2.5 kA at 550 V AC 50/60 Hz conforming to IEC 60947-2

9 kA at 400/415 V AC 50/60 Hz conforming to IEC 60947-2

7.5 kA at 440 V AC 50/60 Hz conforming to IEC 60947-2

suitability for isolation: Yes conforming to IEC 60947-2

utilization category: Category A

trip unit name: TM-D

trip unit technology: Thermal-magnetic

trip unit rating: 160 A at 50 °C

protection type: Overload protection

Short-circuit protection

pollution degree: 3 conforming to IEC 60664-1

3 conforming to IEC 947-1

### **COMPLEMENTARY**

control type: Toggle

mounting mode: Fixed

mounting support: Backplate

upside connection: Front

downside connection: Front

mechanical durability: 10000 cycles

electrical durability: Category A: 5000 cycles 415 V AC 50/60 Hz conforming to IEC 60947-2

connection pitch: 35 mm

local signalling: Positive contact indication  
neutral protection setting: Without protection  
earth-leakage protection: Without  
Height: 165 mm  
Width: 105 mm  
Depth: 60 mm

#### **ENVIRONMENTS**

Standards: GB/T 14048.2

EN/IEC 60947-1

EN/IEC 60947-2

IP degree of protection: IP20 conforming to IEC 60529

IK degree of protection: IK07 conforming to IEC 62262

Ambient air temperature for operation: -25...70 °C

Ambient air temperature for storage: -35...85 °C

#### **PACKING UNITS**

Unit Type of Package 1: PCE

Number of Units in Package 1: 1

Package 1 Height: 11.4 cm

Package 1 Width: 11.3 cm

Package 1 Length: 18 cm

Package 1 Weight: 1.63 kg

Unit Type of Package 2: S03

Number of Units in Package 2: 8

Package 2 Height: 30 cm

Package 2 Width: 30 cm

Package 2 Length: 40 cm

Package 2 Weight: 13.53 kg

Unit Type of package 3: CAR

Number of Units in Package 3: 9

Package 3 Weight: 15.13

Package 3 Height: 25 cm

Package 3 width: 38 cm

Package 3 Length: 37 cm

#### **CIRCUIT BREAKER 125A**

##### **MAIN**

device application: Distribution

poles description: 3P

protected poles description: 3t

network type: DC

AC

network frequency: 50/60 Hz

[In] rated current: 250 A at 40 °C

[Ui] rated insulation voltage: 690 V AC 50/60 Hz conforming to IEC 60947-2

[Uimp] rated impulse withstand voltage: 6 kV conforming to IEC 60947-2

[Ue] rated operational voltage: 550 V AC 50/60 Hz conforming to IEC 60947-2

250 V DC conforming to IEC 60947-2

breaking capacity code: F

breaking capacity: 10 kA Icu at 440 V AC 50/60 Hz conforming to IEC 60947-2  
15 kA Icu at 400...415 V AC 50/60 Hz conforming to IEC 60947-2  
18 kA Icu at 380 V AC 50/60 Hz conforming to IEC 60947-2  
25 kA Icu at 110...130 V AC 50/60 Hz conforming to IEC 60947-2  
25 kA Icu at 220...240 V AC 50/60 Hz conforming to IEC 60947-2  
5 kA Icu at 125 V DC 1P conforming to IEC 60947-2  
5 kA Icu at 250 V DC 2P conforming to IEC 60947-2  
5 kA Icu at 550 V AC 50/60 Hz conforming to IEC 60947-2

[Ics] rated service breaking capacity: 9 kA at 380 V AC 50/60 Hz conforming to IEC 60947-2  
12.5 kA at 110/130 V AC 50/60 Hz conforming to IEC 60947-2  
12.5 kA at 220/230/240 V AC 50/60 Hz conforming to IEC 60947-2  
2.5 kA at 125 V DC conforming to IEC 60947-2  
2.5 kA at 250 V DC conforming to IEC 60947-2  
2.5 kA at 550 V AC 50/60 Hz conforming to IEC 60947-2  
9 kA at 400/415 V AC 50/60 Hz conforming to IEC 60947-2  
7.5 kA at 440 V AC 50/60 Hz conforming to IEC 60947-2

suitability for isolation: Yes conforming to IEC 60947-2

utilization category: Category A

trip unit name: TM-D

trip unit technology: Thermal-magnetic

trip unit rating: 125 A at 50 °C

protection type: Overload protection

Short-circuit protection

pollution degree: 3 conforming to IEC 60664-1

3 conforming to IEC 947-1

### **COMPLEMENTARY**

control type: Toggle

mounting mode: Fixed

mounting support: Backplate

upside connection: Front

downside connection: Front

mechanical durability: 10000 cycles

electrical durability: Category A: 5000 cycles 415 V AC 50/60 Hz conforming to IEC 60947-2

connection pitch: 35 mm

local signalling: Positive contact indication

neutral protection setting: Without protection

earth-leakage protection: Without

height: 165 mm

width: 105 mm

depth: 60 mm

### **ENVIRONMENT**

Standards: EN/IEC 60947-2

GB/T 14048.2

EN/IEC 60947-1

IP degree of protection: IP20 conforming to IEC 60529

IK degree of protection: IK07 conforming to IEC 62262

ambient air temperature for operation: -25...70 °C

ambient air temperature for storage: -35...85 °C

## **PACKING UNITS**

Package 1 Weight: 1.300 kg  
Package 1 Height: 1.140 dm  
Package 1 Width: 1.130 dm  
Package 1 Length: 1.800 dm

## **CIRCUIT BREAKER 15A**

device application: Distribution  
poles description: 1P  
number of protected poles: 1  
[In] rated current: 15 A at 25 °C  
network type: DC  
trip unit technology: Thermal-magnetic  
curve code: C  
breaking capacity: 10 kA Icu at 220 V DC conforming to EN 60947-2  
10 kA Icu at 220 V DC conforming to IEC 60947-2  
6 kA Icu at 250 V DC conforming to EN 60947-2  
6 kA Icu at 250 V DC conforming to IEC 60947-2  
20 kA Icu at 110 V DC conforming to EN 60947-2  
20 kA Icu at 110 V DC conforming to IEC 60947-2  
utilization category: Category A conforming to EN 60947-2  
Category A conforming to IEC 60947-2  
suitability for isolation: Yes conforming to IEC 60947-2  
Yes conforming to EN 60947-2

## **COMPLEMENTARY**

network frequency: 50/60 Hz  
[Ue] rated operational voltage: 250 V DC  
[Ics] rated service breaking capacity: 15 kA 75 % conforming to EN 60947-2 - 110 V DC  
15 kA 75 % conforming to IEC 60947-2 - 110 V DC  
4.5 kA 75 % conforming to EN 60947-2 - 250 V DC  
4.5 kA 75 % conforming to IEC 60947-2 - 250 V DC  
7.5 kA 75 % conforming to EN 60947-2 - 220 V DC  
7.5 kA 75 % conforming to IEC 60947-2 - 220 V DC  
[Ui] rated insulation voltage: 500 V DC conforming to IEC 60947-2  
500 V DC conforming to EN 60947-2  
[Uimp] rated impulse withstand voltage: 6 kV conforming to EN 60947-2  
6 kV conforming to IEC 60947-2  
contact position indicator: Yes  
control type: Toggle  
local signalling: ON/OFF indication  
mounting mode: Fixed  
mounting support: 35 mm symmetrical DIN rail  
comb busbar and distribution block compatibility: Top or bottom: standard  
9 mm pitches: 2  
Net weight: 0.128 kg  
Colour: White  
mechanical durability: 20000 cycles  
electrical durability: 3000 cycles 250 V DC  
6000 cycles 250 V DC

provision for padlocking: Padlockable  
locking options description: In position O  
tightening torque: Power circuit: 2.5 N.m top or bottom  
earth-leakage protection: Without

#### **ENVIRONMENT**

Standards: EN 60947-2  
IEC 60947-2

pollution degree: 3 conforming to EN 60947-2  
3 conforming to IEC 60947-2

overvoltage category: IV

topicalization: 2 conforming to IEC 60068-2

Operating altitude: 2000 m

ambient air temperature for operation: -25...70 °C

Ambient air temperature for storage: -40...85 °C

#### **PACKING UNITS**

Unit Type of Package 1: PCE

Number of Units in Package 1: 1

Package 1 Height: 7.0 cm

Package 1 Width: 1.8 cm

Package 1 Length: 8.5 cm

Package 1 Weight: 112.0

#### **CIRCUIT BREAKER 20A**

##### **MAIN**

device application: Distribution

poles description: 1P

number of protected poles: 1

[In] rated current: 20 A at 25 °C

network type: DC

trip unit technology: Thermal-magnetic

curve code: C

breaking capacity: 10 kA Icu at 220 V DC conforming to EN 60947-2

10 kA Icu at 220 V DC conforming to IEC 60947-2

6 kA Icu at 250 V DC conforming to EN 60947-2

6 kA Icu at 250 V DC conforming to IEC 60947-2

20 kA Icu at 110 V DC conforming to EN 60947-2

20 kA Icu at 110 V DC conforming to IEC 60947-2

utilization category: Category A conforming to EN 60947-2

Category A conforming to IEC 60947-2

suitability for isolation: Yes conforming to IEC 60947-2

Yes conforming to EN 60947-2

##### **COMPLEMENTARY**

network frequency: 50/60 Hz

[Ue] rated operational voltage: 250 V DC

[Ics] rated service breaking capacity: 15 kA 75 % conforming to EN 60947-2 - 110 V DC

15 kA 75 % conforming to IEC 60947-2 - 110 V DC

4.5 kA 75 % conforming to EN 60947-2 - 250 V DC

4.5 kA 75 % conforming to IEC 60947-2 - 250 V DC

7.5 kA 75 % conforming to EN 60947-2 - 220 V DC



7.5 kA 75 % conforming to IEC 60947-2 - 220 V DC

[Ui] rated insulation voltage: 500 V DC conforming to IEC 60947-2

500 V DC conforming to EN 60947-2

[Uimp] rated impulse withstand voltage: 6 kV conforming to EN 60947-2

6 kV conforming to IEC 60947-2

contact position indicator: Yes

control type: Toggle

local signalling: ON/OFF indication

mounting mode: Fixed

mounting support: 35 mm symmetrical DIN rail

comb busbar and distribution block compatibility: Top or bottom: standard

9 mm pitches: 2

net weight: 0.128 kg

colour: White

mechanical durability: 20000 cycles

electrical durability: 3000 cycles 250 V DC

6000 cycles 250 V DC

provision for padlocking: Padlockable

locking options description: In position O

tightening torque: Power circuit: 2.5 N.m top or bottom

earth-leakage protection: Without

### **ENVIRONMENT**

Standards: EN 60947-2

IEC 60947-2

pollution degree: 3 conforming to EN 60947-2

3 conforming to IEC 60947-2

overvoltage category: IV

topicalization: 2 conforming to IEC 60068-2

operating altitude: 2000 m

ambient air temperature for operation: -25...70 °C

ambient air temperature for storage: -40...85 °C

### **PACKING UNITS**

Unit Type of Package 1: PCE

Number of Units in Package 1: 1

Package 1 Height: 7.0 cm

Package 1 Width: 1.8 cm

Package 1 Length: 8.5 cm

Package 1 Weight: 113.0

## **CIRCUIT BREAKER MINI 10A**

### **MAIN**

poles description: 3P

number of protected poles: 3

[In] rated current: 10 A

network type: AC

trip unit technology: Thermal-magnetic

curve code: D

breaking capacity: 10000 A Icn at 415 V AC 50/60 Hz conforming to EN/IEC 60898-1

42 kA Icu at 12...133 V AC 50/60 Hz conforming to EN/IEC 60947-2

30 kA Icu at 220...240 V AC 50/60 Hz conforming to EN/IEC 60947-2  
15 kA Icu at 380...415 V AC 50/60 Hz conforming to EN/IEC 60947-2  
10 kA Icu at 440 V AC 50/60 Hz conforming to EN/IEC 60947-2  
20 kA Icu at 100...133 V DC conforming to EN/IEC 60947-2

utilization category: Category A conforming to EN/IEC 60947-2

### **COMPLEMENTARY**

network frequency: 50/60 Hz

[Ue] rated operational voltage: 440 V AC 50/60 Hz

magnetic tripping limit: 12 x In +/- 20 %

[Ics] rated service breaking capacity: 21 kA 50 % conforming to EN/IEC 60947-2 - 12...133 V AC 50/60Hz

15 kA 50 % conforming to EN/IEC 60947-2 - 220...240 V AC 50/60 Hz

7.5 kA 50 % conforming to EN/IEC 60947-2 - 380...415 V AC 50/60 Hz

5 kA 50 % conforming to EN/IEC 60947-2 - 440 V AC 50/60 Hz

7500 A 75 % conforming to EN/IEC 60898-1 - 415 V AC 50/60 Hz

20 kA 100 % conforming to EN/IEC 60947-2 - 100...133 V DC

limitation class: 3 conforming to EN/IEC 60947-2

[Ui] rated insulation voltage: 500 V AC 50/60 Hz conforming to EN/IEC 60947-2

[Uimp] rated impulse withstand voltage: 6 kV conforming to EN/IEC 60947-2

contact position indicator: Yes

control type: Toggle

local signalling: Trip indicator

mounting mode: Clip-on

mounting support: Rail

9 mm pitches: 6

Height: 85 mm

Width: 54 mm

Depth: 78.5 mm

Net weight: 0.375 kg

Colour: White

mechanical durability: 20000 cycles

electrical durability: 10000 cycles

provision for padlocking: Padlockable

connections – terminals: Single terminal (top or bottom) 1...25 mm<sup>2</sup> rigid

Single terminal (top or bottom) 1...16 mm<sup>2</sup> flexible

wire stripping length: 14 mm for top or bottom connection

tightening torque: 2 N.m top or bottom

earth-leakage protection: Separate block

### **ENVIRONMENT**

Standards: EN/IEC 60947-2

EN/IEC 60898-1

IP degree of protection: IP20 conforming to IEC 60529

pollution degree: 3 conforming to EN/IEC 60947-2

topicalization: 2 conforming to IEC 60068-1

relative humidity: 95% at 55 °C

Ambient air temperature for operation: -35...70 °C

Ambient air temperature for storage: -40...85 °C

## **PACKING UNITS**

Unit Type of Package 1: PCE

Number of Units in Package 1: 1

Package 1 Height: 7 cm

Package 1 Width: 5.4 cm

Package 1 Length: 9 cm

Package 1 Weight: 328.0 g

Unit Type of Package 2: BB1

Number of Units in Package 2: 4

Package 2 Height: 8.0 cm

Package 2 Width: 9.5 cm

Package 2 Length: 22.0 cm

Package 2 Weight: 1.376 kg

Unit Type of Package 3: S03

Number of Units in Package 3: 44

Package 3 Height: 30.0 cm

Package 3 Width: 30.0 cm

Package 3 Length: 40.0 cm

Package 3 Weight: 15.736 kg

## **HOA SELECTOR SWITCH**

Item: Selector switch

Barrel Size: 22mm

IP Rating: IP65

Number of Positions: 3

Action Maintained

Contact Type: 2 N.O. + 2 N.C.

Base Material: Plastic

Bezel Material: Metal

Operator Color: Black

Operator Type: Knob

Operator Size: 30mm

Operator Shape: Round

## **AUXILLARY CONTACTOR**

Range of product: TeSys D

TeSys D control relay

TeSys F

Product or component type: Auxiliary contact block

Product compatibility: CR1F

Auxiliary contacts operation: Instantaneous

Pole contact composition: 2 NO + 2 NC

Connections – terminals:

Screw clamp terminals 2 cable 1...2.5 mm<sup>2</sup> - cable stiffness: solid - without cable end

Screw clamp terminals 2 cable 1...2.5 mm<sup>2</sup> - cable stiffness: solid - with cable end

Screw clamp terminals 2 cable 1...2.5 mm<sup>2</sup> - cable stiffness: flexible - without cable end

Screw clamp terminals 2 cable 1...2.5 mm<sup>2</sup> - cable stiffness: flexible - with cable end

Screw clamp terminals 1 cable 1...2.5 mm<sup>2</sup> - cable stiffness: solid - without cable end

Screw clamp terminals 1 cable 1...2.5 mm<sup>2</sup> - cable stiffness: solid - with cable end

Screw clamp terminals 1 cable 1...2.5 mm<sup>2</sup> - cable stiffness: flexible - without cable end

Screw clamp terminals 1 cable 1...2.5 mm<sup>2</sup> - cable stiffness: flexible - with cable end

### **COMPLEMENTARY**

Mounting location: Front

[Ui] rated insulation voltage: 690 V - conforming to IEC 60947-5-1

600 V - certifications CSA

600 V - certifications UL

[Ue] rated operational voltage: 690 V AC 25...400 Hz

[Ith] conventional free air thermal current: 10 A at ≤ 60 °C

Irms rated making capacity: 250 A at ≤ 690 V DC conforming to IEC 60947-5-1

140 A at ≤ 690 V AC conforming to IEC 60947-5-1

Permissible short-time rating: 140 A at 60 °C 100 ms

120 A at 60 °C 500 ms

100 A at 60 °C 1 s

Protection type: GG fuse ≤ 10 A rating according to operational current for Ue ≤ 690 V

Associated fuse rating: 10 A gG IEC 60947-5-1

Mechanical durability: 30 Mcycles

Minimum switching current: 5 mA

Minimum switching voltage: 17 V

Non-overlap time: 1.5 ms on energisation (no overlap between NC and NO contact)

1.5 ms on de-energisation (no overlap between NC and NO contact)

Overlap time: 1.5 ms

Insulation resistance: > 10 MOhm

Product weight: 0.05 kg

### **ENVIRONMENT**

Environmental characteristic: Normal environment

Standards: BS 4794

EN 60947-5-1

IEC 60947-5-1

NF C 63-140

VDE 0660

Product certifications: CSA

UL

IP degree of protection: IP2x conforming to VDE 0106

Protective treatment: TH conforming to IEC 60068

Ambient air temperature for operation: -5...60 °C

Ambient air temperature for storage: -60...80 °C

Operating altitude: 3000 m without derating in temperature