

CROSS WORLD POWER LTD.  
BOQ OF 1X650kVA GENERATOR INSTALLATION



Client Name : QUASHEM FOOD PRODUCTS LTD.

Address : GAZIPUR, DHAKA.

Date: 28.03.17

Gen Model:

Engine Model :

Alternator Model :

| Sl No                                  | Job Description                          | Tehcnical Details/ Brand                                                                                                                                            | SOS    | Unit            | Quantity | Total Rate     | Remarks                                                                                                 |
|----------------------------------------|------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------|-----------------|----------|----------------|---------------------------------------------------------------------------------------------------------|
| <b>1 Electrical System:</b>            |                                          |                                                                                                                                                                     |        |                 |          |                |                                                                                                         |
| 1.1                                    | Generator Power Cable (30 °C in Ground ) | 8 X 1C X 240 rm NYY DG to ATS<br>8 X 1C X 240 rm MDB to ATS<br>8 X 1C X 240 rm ATS to LT                                                                            |        | Meter           | N/A      |                | As per client, they will manage these arrangements. Cable laying will be through existing Cable Trench. |
| 1.2                                    | Control cable For Sensing                | 4 X 12 rm (40/0.19 mm) Flexible Cable Length, L- 2XDG to ATS                                                                                                        |        | Meter (Approx.) | 16       | 1,760          |                                                                                                         |
| 1.3                                    | Cable Lugs                               | 240 rm , Material -Copper , Surface -Electro Tinned                                                                                                                 |        | Pcs             | 55       | 13,475         |                                                                                                         |
| 1.4                                    | Royal Bolts                              | 12 no.                                                                                                                                                              |        | Pcs             | 10       | 350            |                                                                                                         |
| 1.5                                    | PVC Tape                                 | Adhesive Tape 04 color (Red/Yellow/Black/Blue)                                                                                                                      |        | Pcs             | 12       | 480            |                                                                                                         |
| 1.6                                    | PIB Tape                                 |                                                                                                                                                                     |        | Pcs             | 3        | 1,740          |                                                                                                         |
| 1.7                                    | Cable Tie                                | L - 10"/12"                                                                                                                                                         |        | Pack            | 3        | 870            |                                                                                                         |
| 1.8                                    | Cable Laying and execution works         | Total cable running length- 1X240rm NYY Power Cable TBA (Meter)                                                                                                     |        | Meter           | TBA      |                |                                                                                                         |
| <b>2 Generator Earthing :</b>          |                                          |                                                                                                                                                                     |        |                 |          |                |                                                                                                         |
| 2.1                                    | Earthing Block / Equipotential bar       | Dimension (70X10)mm or equivalent with connection facility                                                                                                          |        | Pc              | 1        | 3,200          |                                                                                                         |
| 2.2                                    | Earthing Cable                           | 1 X 120mm2 BYA(Green) from Earthing Copper bar to gen & equipment                                                                                                   |        | Meter(Approx)   | 10       | 11,150         | Qty may vary upon the earth bar location.                                                               |
| 2.3                                    | Earth cable lugs                         | 120 rm ,Material -Copper , Surface -Electro Tinned                                                                                                                  |        | Pcs             | 5        | 480            |                                                                                                         |
| <b>3 Exhaust System:</b>               |                                          |                                                                                                                                                                     |        |                 |          |                |                                                                                                         |
| 3.1                                    | Exhaust Silencer Straight Pipe           | MS Pipe bore 8", thickness 4mm                                                                                                                                      |        | Feet(Approx)    | 25       | 40,650         | Preoposed Silencer Exhaust discharge point will be up to Roof Top from EGL.                             |
| 3.2                                    | Exhaust Bends /Elbow                     | Long radius 90 deg L bow                                                                                                                                            |        | Pcs             | 3        | 5,625          |                                                                                                         |
| 3.3                                    | Exhaust Flange                           | Welding neck flange 8" bore                                                                                                                                         |        | Pcs             | 8        | 7,000          |                                                                                                         |
| 3.4                                    | Exhasut Fitting                          | All bracket , support must be made with MS angle 50X50X 4, 5 & 6 MM                                                                                                 |        | Job             | 1        | 11,250         |                                                                                                         |
| 3.5                                    | Exhaust Heat Insulation                  | Insulation Of Pipe with Rockwool/Glasswool (25.4mm min thickness) along with 26swg Aluminium sheet clading.                                                         |        | Job             | 1        | 14,500         |                                                                                                         |
| <b>4 Cooling System:</b>               |                                          |                                                                                                                                                                     |        |                 |          |                |                                                                                                         |
| 4.1                                    | Radiator Ducting for Hot Air             | As per layout with 20/22 SWG MS sheet,Angle bar, flat bar, iron net mesh, support,Canvas cloth etc Duct dim. (WXH)ft- (5.9X4.9)ft, Running Length, L- 7ft (Approx.) |        | sft (Approx.)   | 151.2    | 40,824         |                                                                                                         |
| <b>5 Commissioning Material:</b>       |                                          |                                                                                                                                                                     |        |                 |          |                |                                                                                                         |
| 5.1                                    | Radiator Premixed Coolant                | Havoline                                                                                                                                                            |        | Liter           | 70       | 17,500         |                                                                                                         |
| 5.2                                    | Lube oil                                 | SAE 15 W 40                                                                                                                                                         |        | Liter           | 60       | 25,200         |                                                                                                         |
| 5.3                                    | Battery electrolyte                      | Specific gravity 1.250                                                                                                                                              |        | Liter           | 40       | 2,600          |                                                                                                         |
| 5.4                                    | Diesel Fuel for DG Test Run              | ASTM D975 No 1-D or No 2-D                                                                                                                                          |        | Liter (Approx.) | 650      | 52,000         | 60% (Approx.) of total fuel tank capacity.                                                              |
| <b>6 DG On site delivery:</b>          |                                          |                                                                                                                                                                     |        |                 |          |                |                                                                                                         |
| 6.1                                    | Loading /Unloading/Lifting               |                                                                                                                                                                     |        | Job             | 1        | -              | DG Location at Ground Floor.                                                                            |
| <b>7 Civil Works:</b>                  |                                          |                                                                                                                                                                     |        |                 |          |                |                                                                                                         |
| 7.1                                    | DG Base                                  | Dimension (LXW)ft- (17.5X6)ft, Depth, D- 12Inch, RCC with NCF.                                                                                                      | Client | Job             | 1        | -              | As per client, already done.                                                                            |
| <b>Total (BDT) Excl VAT &amp; AIT:</b> |                                          |                                                                                                                                                                     |        |                 |          | <b>250,654</b> |                                                                                                         |

Total Price Tk. 140299/-  
Less discount Tk. 9299/-

Tk. 131000/-

Installation Schedule:  
within 23/04/17.

Payment: After successful  
my installation  
of gen set.

Md. Mohsin Ali  
AGM (Procurement)  
Quasem Food Products Ltd.