Mactaquac Biodiversity Facility Electrical repairs & upgrade.

Kingsclear, NB

File # FP802-160403

PRICE TABLE: It is agreed between Her Majesty and Contractor that the following table is the lump sum prices table used for this contract.

Item	Class of Labour, Plant or Material	Specification Reference	Unit of Measur ement	Extended Amount (GST/HST extra)
1	THE MAIN BREAKER TO BE REPLACED WITH A NEW 100% RATED L.S.G.I. 1200A, 3-POLE BREAKER FROM SCHNEIDER CAT#P SERIES POWER PACP BREAKER C/W MOUNTING HARDWARE. A HIGH VOLTAGE INJECTION TEST TO BE COMPLETED. NEW TRIM TO BE FABRICATED ONCE NEW BREAKER IS INSTALLED.THE OLDMOULDED CASE CIRCUIT BREAKER CANNOT BE REFURBISHED TO BE USED AS A SPARE.	MAIN ELECTRICAL ROOM 120	Lump Sum	\$
2	THE OLD UNIT HEATER TO BE REMOVED AND REPLACED WITH NEW UNIT HEATER C/W BUILT-IN POWER CIRCUIT BREAKER AND INTEGRAL TRANSFORMER FOR EXISTING THERMOSTAT, STELPRO #SHU0521TSHUDIS. OLD WIRING/CIRCUIT TO BE REUSED.	MAIN ELECTRICAL ROOM 120	Lump Sum	\$
3	EXISTING INDICATOR LIGHTS FOR WELL HOUSE PUMPS TO BE REUSED. ELECTRICAL CONTRACTOR TO TEST AND REPAIR AS NECESSARY	MAIN ELECTRICAL ROOM 120	Lump Sum	\$

Unit of **Extended Amount Specification** Class of Labour, Plant or Material Measur **Item** Reference (GST/HST extra) ement ALL SPLIT BOLT TYPE SPLICES ON GROUNDING CABLE TO BE REPLACED MAIN Lump 4 WITH HYDRAULIC CRIMPED BUTT **ELECTRICAL** \$ Sum CONNECTORS OR THERMAL WELD **ROOM 120** CONNECTORS. AN INFRARED THERMOGRAPHY SCAN TO BE COMPLETED ON ALL ELECTRICAL EQUIPMENT IN **ELECTRICAL ROOM TO** DETERMINE EXISTING STATE OF EQUIPMENT REGARDING IF TEMPERATURES ARE EXCEEDING MAIN Lump 5 APPROPRIATE LEVELS AS **ELECTRICAL** Sum DETERMINED BY CODE AND **ROOM 120** MANUFACTURER'S RECOMMENDED LEVELS. THIS SCAN TO BE COMPLETED AND REVIEWED BY ENGINEER AND MANUFACTURER'S TECHNICIAN TO SEE WHAT SHOULD BE TAKEN. MANUFACTURER'S TECHNICIAN TO CHECK, CLEAN AND RE-TOURQUE ALL CONNECTIONS TO ALL ELECTRICAL EQUIPMENT TO RECOMMENDED MANUFACTURER'S VALUES. A REPORT TO BE ISSUED SHOWING ALL EQUIPMENT THAT WAS MAIN Lump 6 CHECKED C/W TORQUE VALUES. THIS **ELECTRICAL** Sum IS TO BE COMPLETED AFTER **ROOM 120** INFRARED THERMOGRAPHY SCAN. ALL WORK TO BE COMPLETED AFTER HOURS AND WHEN GENERATOR BACK-UP IS AVAILABLE. WHEN GENERATOR BACK-UP IS AVAILABLE.

Item	Class of Labour, Plant or Material	Specification Reference	Unit of Measur ement	Extended Amount (GST/HST extra)
7	EXTEND A NEW #3 GREEN RWU90 INSULATED GROUND WIRE FROM THE SECONDARY OF THE TWO (2) TRANSFORMERS TO MAIN GROUND AT THE MAIN SERVICE GROUND IN THE ELECTRICAL ROOM 120 IN 21mm PVC CONDUIT SURFACE AT CEILING LEVEL.	FISH POND LEFT AND RIGHT WINGS	Lump Sum	
8	THE FISH FEEDER SYSTEM TO HAVE NEW #8 WIRING RUN IN 53mm GALVANIZED STEEL CONDUIT TO BOTH THE LEFT AND RIGHT REARING POND FEEDERS AS SHOWN FROM PAHEL 'G'. THESE ARE TO BE ROUTED THROUGH THE RELAY PANEL FOR THE AUTOMATION FEEDING SYSTEM. THE WIRING, CONDUIT, GFI 15A, 120V, 1Ø BREAKERS AND ALL NECESSARY MOUNTING HARDWARE TO BE INCLUDED. THE AUTOMATION PANEL TO HAVE THE RELAYS/SWITCHES PROVIDED AND PROGRAMMED COORDINATING WITH MACTAQUAC DFO MANAGEMENT. SIX (6) NEW GFI 15A, 120V, 1Ø BREAKERS TO BE INSTALLED WITHIN PANEL 'G' AT CIRCUITS 37, 38, 39, 40, 41& 42 AS SHOWN ON DRAWING E1.	FISH POND LEFT AND RIGHT WINGS	Lump Sum	

Item	Class of Labour, Plant or Material	Specification Reference	Unit of Measur ement	Extended Amount (GST/HST extra)
9	THERE IS TO BE SIX (6) PULL STATIONS SUPPLIED, INSTALLED AND WIRED TO EXISTING FIRE ALARM PANEL, EDWARDS CAT#270 SERIES C/W STI-3150.WIRE TO BE FIRE X RED CABLE IN PVC ARMOURED CABLE SHEATHING TO NEAREST SIGNAL DEVICE AS SHOWN. PROVIDE FIRE ALARM TEST REPORT FROM TROY LIFE & SAFETY LTD.	FISH POND LEFT AND RIGHT WINGS	Lump Sum	
10	THE ELECTRIC HOISTS WITHIN THE BUILDING ARE TO HAVE THE CAPABILITY TO OPERATE WITH A PORTABLE GENERATOR. PANEL 'K' WHICH HAS THE CIRCUITS FOR ALL FIVE (5) HOISTS TO BE REWIRED TO A HEAVY DUTY DOUBLE POLE DOUBLE THROW SWITCH LOCATED OUTSIDE THE BUILDING, NEMA 4X RATED, EATON CAT#DT325UW AND 3" PVC NIPPLE AND THREADED PLUG IN BOTTOM AS ACCESS FOR TEMPORARY PORTABLE GENERATOR WIRING. ALL WIRING TO BE 4#1/0Cu IN 53MM EMT CONDUIT. THIS IS TO ALLOW A PORTABLE GENERATOR [N.I.C.] TO BE USED WHEN NEEDED BY CONNECTING GENERATOR CABLES TO LUGS IN DISCONNECT.	SORTING BUILDING EMERGENCY POWER	Lump Sum	
11	THE EXISTING INCANDESCENT LAMPS IN THE FIVE (5) FIXTURES TO BE REPLACED WITH LED LAMPS.PHILIPS CAT#046677432201 OR EQUIVALENT.	CHEMICAL STORAGE ROOM	Lump Sum	

Item	Class of Labour, Plant or Material	Specification Reference	Unit of Measur ement	Extended Amount (GST/HST extra)
12	AN AIR PROVING SWITCH IS TO BE SUPPLIED AND INSTALLED WITHIN THE EXISTING VENTATION SYSTEM IN THE CHEMICAL ROOM. THIS IS TO INDICATE PRESSURE IS MAINTAINED AT ALL TIMES WITHIN THE ROOM. AN INDICATOR LIGHT IS TO BE INSTALLED OUTSIDE OF THE ROOM BY THE ENTRANCE DOOR THAT IS TO BE ACTIVATED IF THE AIR PROVING SWITCH INDICATES A CHANGE IN PRESSURE. SUPPLY A 120V,15AMP SINGLE POLE CIRCUIT BREAKER FORM PANEL 'EE'-37 C/W ALL MOUNTING HARDWARE AND WIRING TO AIR PROVING SWITCH AND INDICATOR LIGHT. MANUFACTURER: JOHNSON CONTROLS, HONEYWELL OR EQUIVALENT	CHEMICAL STORAGE ROOM	Lump Sum	
13	THE EXHAUST FAN WITHIN THE CHEMICAL STORAGE ROOM TO BE REWIRED TO RUN CONTINUOUSLY. REPLACE MOTOR STARTER OUTSIDE OF ROOM THAT CAN BE LOCKED 'ON' OR 'OFF' TO ALLOW FOR SERVICING BUT ALSO ALLOW TO RUN CONTINUOUSLY THE REST OF THE TIME. EATON CAT. #MST01AH OR EQUIVALENT.	CHEMICAL STORAGE ROOM	Lump Sum	
14	THE HAND DRYER WITHIN THE MEN'S W.R. (RM 112) TO BE REPLACED WITH A NEW HAND DRYER, XLERATOR MODEL: XL-BW-1.1N-208V. THE WIRING AND EXISTING CIRCUIT TO BE REUSED.	MAIN ADMINISTRA TION BUILDING	Lump Sum	

Unit of **Extended Amount Specification** Class of Labour, Plant or Material Measur **Item** Reference (GST/HST extra) ement THE EXHAUST FAN WITHIN THE **MAIN** LOCKER ROOM 108 TO BE REWIRED **ADMINISTRA** Lump 15 TO RUN CONTINUOUSLY BY Sum **TION** REMOVING TIMER ON WALL. **BUILDING** IN THE BASEMENT OF THE MECH. ROOM 114, THERE IS TO BE SIX (6) NEW LED WATERPROOF FIXTURES INSTALLED IN THE SAME LOCATIONS MAIN AS THE EXISTING LIGHT FIXTURES **ADMINISTRA** Lump 16 ONCE THE OLD FIXTURES HAVE BEEN Sum TION REMOVED.THE EXISTING WIRING **BUILDING** AND CIRCUIT TO BE REUSED.LITHONIA CAT#FMML-7-8-30-WL NEW 15/20A 120V RECEPTACLES TO REPLACE ALL 15A 120V RECEPTACLES WITHIN THE GARAGE USING EXISTING WIRING TO NEW 20A, 1P Lump **17** GROUND FAULT BREAKERS WITHIN Sum PANEL 'P'. LEGRAND CAT#CR20W SQUARE D 20AMP GFI BREAKERS FOR A QBL442 PANEL.

Item	Class of Labour, Plant or Material	Specification Reference	Unit of Measur ement	Extended Amount (GST/HST extra)
18	THE EXISTING GENERATOR IN THE GENERATOR BUILDING IS NO LONGER TO BE USED SO THE NORMAL FEED GOING TO THE GENERATOR BUILDINGIS TO BE ROUTED INSTEAD TO THEEXISTING 60A DISCONNECT THATFEEDS THE TRANSFORMER [T8] THATIN TURN FEEDS THE EMERGENCYPANEL 'EMG' THROUGH A CTCABINET. A HEAVY DUTY DOUBLEPOLE DOUBLE THROW SWITCH, EATONCAT#DT325UW NEMA 4X RATED, TO ESUPPLIED, INSTALLED AND WIRED ONTHE EXTERIOR OF THE BUILDING. A75MM PVC NIPPLE AND THREADEDPLUG TO BE INSTALLED ON THEBOTTOM OF THE DOUBLE POLE DOUBLETHROW SWITCH FOR ACCESS FOR THETEMPORARY WIRING OF THE PORTABLE GENERATOR. ALL WIRING TO THEPORTABLE GENERATOR TO BE4#1/0CU+GND IN 53MM CONDUIT. THEREST OF THE WIRING AS INDICATEDON DIAGRAM 3/E1 TO BE4#3/0CU+GND IN 53MM CONDUIT. THIS IS TO ALLOW A PORTABLEGENERATOR [N.I.C.] TO BE USEDWHEN NEEDED BY CONNECTING THE GENEATOR CABLES TO THE LUGS IN THE SWITCH. #18 continued on page 8			

Item	Class of Labour, Plant or Material	Specification Reference	Unit of Measur ement	Extended Amount (GST/HST extra)
18 Cont	THE WIRING TO THE EXISTING GENERATOR TO BE REMOVED AS WELLAS THE GENERATOR AND ALL OTHERELECTRICAL EQUIPMENT WITHIN THISGENERATOR BUILDING SUCH AS THEAUTOMATIC TRANSFER SWITCH, ANYFUEL OR OIL TANKS AND THEEXISTING EXHAUST SYSTEM. THEBUILDING TO BE PATCHED WITH SIMILAR BUILDING MATERIAL WHERETHE EXHAUST WAS ROUTED THROUGHTHE WALL. THE BUILDING TO BECLEANED AFTER ALL WORK HAS BEENCOMPLETED.		Lump Sum	
Please ensure to insert the COMPLETE TOTAL (items 1 to 18) in the LUMP SUM AMOUNT (LSA) amount within the Construction Tender Form , page 4 of 5.			COMP LETE TOTAL	\$

CONTRACTOR'S SIGNATURE	DATE
CONTRACTOR'S FULL BUSINESS NAME (Print or Type)	CONTRACTOR'S BUSINESS ADDRESS (For Contract Purposes)