#### 103539-ELE-1MOP-E-2008

# Electrical Maintenance & Protection Engineer

Holds a B. Sc. in Electrical Power & Machines Engineering and a Diploma in electrical power networks protection. Has over 13 years hands-on experience working in maintenance, operation, commissioning, start-up and protection at Talkha Power Station.

#### PERSONAL DATA

Nationality : Egyptian Birth Date : 01/07/1986

Gender : Male
Marital Status : Married
Residence : Talkha

#### **EDUCATION**

: B. Sc. in Electrical Power & Machines Engineering, Mansoura University,

2008

: Diploma in electrical power networks protection, Mansoura University, 2013

### **LANGUAGES**

German

Arabic : Native Language

English : Very Good

## **COMPUTER SKILLS**

: Windows, MS Office (Word, Excel, Power Point), Internet

: AutoCAD

Good

## TRAINING COURSES AND CERTIFICATIONS

Professional Certificate of Engineering Management, AUC (2020).

: Supply Chain Management, AUC.

: Essentials of Contracts, AUC.

Leadership and HR Management, AUC.

: Project Management, AUC.

Strategic planning and change management, AUC.

: Analysis of dissolved gases in oil immersed transformers, MDEPC.

: Gas turbine operation course SIEMENS V94.3A - Teleperm XP control system.

: Training course in security of power plants.

: CMI Energy + Skoda Praha HRSG on-job training.

- : ALSTOM Site operation training about I&C Steam turbine generator and auxiliaries.
- : The OV010 WIN Ovation Windows Operator Course (Emerson Process Management at New Talkha Combined Cycle Power Plant 750MW).
- : Professional education courses in use of MS Excel, MS Word, MS Power Point, Internet and AutoCAD.

### CHRONOLOGICAL EXPERIENCE RECORD

Dates : From Jan. 2013 till now

**Employer**: Middle Delta Electricity Production Company

Project : Talkha Power Station 750MW

Job title : Electrical Maintenance & Protection Engineer

Job Description

- Responsible for supervising reliability-centered maintenance of equipment like Generators, Excitation systems, Transformers, MV & LV Motors, MV & LV Switchgears, EOT Cranes, Batteries, chargers and Inverters.
- Condition monitoring of running machines, trouble shoot and derive effective solutions to equipment problems, make self-available during emergencies round the clock, in order to ensure the continuous and safe operation of the plant machinery.
- Arrange resources and control the routine, preventive overhauls and emergency maintenance, in order to efficiently and safely complete all the activities well.
- Update, maintain records, daily log book, generate reports related to the maintenance work, maintain master list of drawings, calibrate/test tools and test equipment, in order to enable the supervisors to take the right decisions and thereby ensure plant reliability.
- Dealing with different types of protection relays such as Siemens, GE and Areva. Well knowledge of different firmwares as Digsi, Multilin UR and Micom. Preparation of relays setting files and logic diagrams.
- Generate reports on major failures and recommends suitable actions to minimize or eliminate recurrence of the problems.
- Testing and commissioning of electrical equipments such as generators, Transformers, protection relays, switchgears and motors.
- Dealing with different systems of the power plant such as UPS system, motors, transformers and switchgear.
- Carry out risk assessments, monitor work practices and methods, conduct safety and housekeeping inspections, in order to ensure safety centered maintenance.
- Plan and prepare preventive maintenance schedules and associated procedures and checklists. Prepare for the scheduled overhaul and check the manpower availability.
- Assist all departments included in the supply chain process for all the required tools and spare parts.
- Well aware of mechanical activities while over haul of generator rotor and stator on Gas Turbine Generators. Part of team during pull out and installation of generator rotor.
- Participation in preparation and revision of inspection and maintenance plans including schedules with its paths and milestones, tools, manpower and budgets using Microsoft Project.

- Start-up and commissioning of MCCs, Generators, Exciters Motors, Transformers, protection devices, Instrument air compressors, Medium and High Voltage switchgears and other electrical equipments in power plant.
- Skilled in preparing and executing Electrical switching programs during shut down and startup of power plant, HV motors, Transformers, medium and high voltage switchgear maintenances.
- Familiar with all mechanical and Instrument controls in power plant. Good knowledge in working with SIEMENS T3000.
- Troubleshooting and maintenance of emergency diesel generator, battery chargers and UPS.

Dates : From Oct. 2008 till Jan. 2013

**Employer** : Middle Delta Electricity Production Company

**Project**: Talkha Power Station 750MW

**Job title** : Operation Engineer

**Job Description**: • Working as a Shift Charge Engineer.

- Troubleshooting, effective response to emergency conditions and compliance to safety procedures.
- Operation of 2x250MW SIEMENS V94.3A gas turbine-Teleperm XP control system- and associated auxiliary through DCS.
- Monitoring the operation of a power generating unit to ensure reliable and efficient power generation.
- Performing the unit start-ups and shutdowns per assigned targets.
- Raising defects for equipment & doing isolation and de isolation procedures according to the work permit.
- Perform high/medium voltage switching operations.
- Handling plant fire fighting.
- Participate in construction, commissioning, steam blow, by-pass operation and start-up of ALSTOM (250MW) and CMI HRSG.
- Steam Turbine Operator for ALSTOM (250MW).
- Monitoring the operation of a power generating unit to ensure reliable and efficient power generation.
- Diagnose and resolve day-to-day operational problems.