# 101544-MEC-1GMOY-E-1990

### **Technical Affairs Management**

Holds a B. Sc. in Mechanical Power Engineering and has 30 years relevant experience in Rotating Equipment related to the power plant industry.

### PERSONAL DATA

Nationality : Egyptian Birth Date : 20/04/1961

Gender : Male
Marital Status : Married

Residence : Helwan, Cairo

### **EDUCATION**

B. Sc. in Mechanical Power Engineering, Zagazig University

#### LANGUAGES

Arabic : Native Language

English : Very Good

## **COMPUTER SKILLS**

: Windows, MS Office, Internet

## TRAINING COURSES AND CERTIFICATIONS

: Egyptian Electricity Authority.

: Westinghouse control system training WDPF training center Pittsburg, PA – USA (2 months).

CERTIFIED FOR WDPF system maintenance.

: CERTIFIED FOR WDPF system user.

: CERTIFIED FOR WDPF system operator (control room).

: CERTIFIED FOR WDPF system VAX interface (control room).

Various Vendors sponsored training seminar.

: General Electrical Gas turbine mark IV speedtronic control system operation and maintenance training (ON-Site) in Cairo South simple cycle power station.

: Siemens and English turbine and steam plant operation training (control room).

### CHRONOLOGICAL EXPERIENCE RECORD

Dates : From 2019 till now

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**Employer** : Cairo Electricity Production Company

Job title : Technical Affairs Management

Job Description

Supervising the employees of the General Administration of Technical

Affairs.

 Supervising the implementation of operating orders, maintenance and preparing the necessary statistics to evaluate the performance of the station

• Supervising the preparation of tests for the efficiency of units and identify the causes of diffraction (low efficiency).

 Coordination between maintenance departments, stores and procurement in the organization of the purchase of spare parts.

 Supervising the technical reports of the units on the day-to-day operation of the station.

Dates : From 2012 till 2018 Employer : SEC COMPANY

Job title : Chief Mechanical Engineer

**Job Description** 

- Provide Rotating Equipment engineering expertise.
- Conduct Rotating Equipment Engineering activities for projects, from initial concept definition phase through engineering studies, FEED, and commissioning.
- Create, develop and review Scope of Work (SOW) for projects and other engineering activities. Ensure that the Scope of Work (SOW) are comprehensive and clear.
- Ensure that the required engineering standards and QP technical assurance practices are followed whilst conducting Rotating Equipment Engineering activities. Review technical deviations and variations to approved guidelines, standards and practices.
- Carry out site surveys, engineering/design.
- Review and approve method statements, created by contracted organizations for scope compliance. Liaise with contracted organizations to resolve technical issues.
- Produce, review, check and approve in-house designs and specifications.
- Develop, update and monitor schedules for in-house engineering activities.
- Plan and co-ordinate activities of a team of multi discipline engineers for providing timely delivery of technical services to meet the project requirements.
- Ensure that the requirements of environmental and safety policies are incorporated into designs and Scope of Work (SOW).
- Review, evaluate and approve/reject Contract Changes/Variations.
- Conduct evaluation of technical bid packages for scope compliance.
- Support Assistant Manager to review, update and apply QP standards and QPs amendment to external standards.
- Support the development of personal technical competency and skills and those of Co-workers. Participate in structured training for Qatari

Engineers under development.

- Conducting courses:
  - CM Corrective Maintenance.
  - Plant Operation Skill.
  - Turbine Regulation.
  - Safe Work load.
  - PM Preventive Maintenance.
  - T & I Test and Inspection.
  - Maintenance Planning & Management.
  - Power Plant Performance & Efficiency.
  - Risk assessment, critical task.
  - WO Work Order.
  - Crisis Managements.
  - Strategic Management.
  - Operation management.
  - Leadership and Motivation.
  - Effective team building skills.
  - Mechanical Precision Measuring.
  - Hydraulic System Troubleshooting.
  - Mechanical Seal.
  - DYNAMIC BALANCING.

**Dates** : From 2008 till 2012

**Employer**: ISCOSA Industries & Maintenance Ltd. – a SIEMENS Company, Dammam

Saudi Arabia

Job title : Senior Mechanical Engineer

**Job Description**: • Pumps Operation Troubleshooting and Maintenance.

Gas Turbine Operation and Maintenance.

- Shaft Alignment and Vibration Analysis.
- Bearing and lubrication Maintenance.
- Gas Turbine Technology.
- Steam Turbine Operation Maintenance.
- Gas Turbine (Operation, Troubleshooting and Overhauling).
- Mechanical Troubleshooting for Pumps, Compressors, Bearings and Lubrication.
- Pump Operation and Troubleshooting.
- Pump and Compressor maintenance.
- Gas Turbine Maintenance and Overhauling (Chevron, Aramco, QP, SEC, Sabic).
- Gas Compressors Operation Maintenance (Sabic & Sabtank).

**Dates** : From Dec. 2005 till 2007

Project: Sohar Power and Distillation Plant (Gas Turbine Installation and Energy Recovery Boiler Project at Sohar Station, Sultanate of Oman):

• GT (Siemens V94.2) is made in Germany. Total Production = 3 x 138.5 =

- 415MW.
- HRSG (DOOSAN) is made in Korea. Total production = 3 x 307.8 = 923.4 T/hr.
- ST (Alstom) is made in France. Total production = 1 x 220 = 220MW.
- MSF (DOOSAN) is made in Korea. Total production 33 MIGD.

Job title Operation & Training Manager

I was training the Omani trainees. I teach them everything about Sohar Job Description Plant include the GT, ST, boiler and distillated units.

> Sohar plant is combined power and desalination plant. The power plant has capacity of 585MW export at 50 C. The water plant has net water capacity of 33MIGD. The power plant consist of three gas turbine (GT) units, three Heat Recovery Steam Generator (HRSG) and one condensing steam Turbine Unit (ST). The gas turbine is SIEMENS V94.2 and made in Germany. Each gas turbine produces 138.5MW at 50 C and the total output pf three units is 415MW. The Gas turbine operator under normal condition by gas fuel but it can operator by oil fuel automatically when the level of gas drop to certain level. HRSG is DOOSAN manufactory and made in Korea. HRSG is sized to accept the maximum exhaust quantity from its gas turbine. HRSG generate steam at one pressure level, High pressure (HP), normally 84 bars at steam turbine inlet and one pressure level, Low pressure (LP), normally 2.8 bar at LP steam header. The maximum high pressure steam capacity of each HRSG is 307.8 T/hr and low pressure steam capacity is 58.6 T/hr with the pressure of 3.3 Bar. The demineralizer water is used as fed water for steam generator in HRSG. Steam turbine Generator is single casing condensing steam turbine of Alstom. ST consist of high pressure (HP) turbine and low pressure (LP) turbine. The total steam from HRSG is fed to the steam turbine.

The power plant is designed as three block system with each GT, each HRSG and one condensing ST, each forming one combined cycle power block. There are four units is equipped with DOOSAN multistage flash. The distillate water produce from seawater is pumped to water treatment faculties.

**Dates** From Mar. 2005 till Apr. 2005

**Employer** Riyadh Refinery in KSA

Teaching the courses theoretical and practical at the training center and the Job Description

site (Gas turbine installation and energy recovery boiler project at Aramco

Refinery, Rivadh).

**Dates** From Feb. 2005 till Mar. 2005

ISCOCSA Training Center in Dammam, KSA **Employer** 

Preparation two courses (operation and maintenance) for gas turbine **Job Description** 

modern W251B6 and control system S7 and (DCS), HRSG and SIEMENS Westinghouse (Gas turbine installation and energy recovery boiler project at

Aramco Refinery, Riyadh).

**Dates** From Mar. 2002 till Dec. 2005

**Project** Cairo South Combined Cycle Power Station

Job title Superintendent Plant Engineer

Control Room, DCS and Mark V Operator, responsible for operation of **Job Description** 

the unit and coordination with maintenance.

The units are GE-MS9001E speedtronic mark IV, 115MW industrial gas turbine in combined cycle with one Vogt HRSG and one GE, 60MW steam turbine and I worked also as Superintendent Inspector in major inspection of one GE-9001E Mark IV, 115MW industrial gas turbine from 3/2002 to 6/2002.

Dates : From Dec. 1997 till Mar. 2002

**Employer**: First Power Company

Job title : Superintendent Operation & Maintenance Engineer

**Job Description** 

- I worked for First Power Company during start-up and early operational period (2x25MW) Pratt & Whitney GG4 free turbine with PLC control system and brushless exciter. The two units operated in parallel to supply an ARC Furnace in Arab steel in 10<sup>th</sup> of Ramadan in Egypt.
- Concerning my skills as Control Room Operator, I have successfully passed the job training in the operation of simple cycle plant.
- My duties during this project have included monitoring the day-to-day activities of the contractors; start-up organization, monitoring the check out and preoperational testing of components and system assisting with the selection of the operational spare parts.
- Assisting the start-up coordinator and contractor, solving technical problems and monitoring performance tests of the plant. Concerning my skills as maintenance engineer I have supervised the following jobs:
  - Inspection of the two combustion chambers in the two gas turbines.
  - Change C.C and fuel nozzle of the two gas turbines.
  - Change of shut off valves of the two gas turbines.
  - Inspection and maintenance of the gas turbines journal bearing.
- Due to my varied engineering and start-up experience and my simple cycle operation experience the First Power Company admitted that I am an asset to any power station organization, so the company management choose me to install a water treatment plant (Osmo Es24 AM 480m³ / day in eastern desert at Ismailia city) and start-up the plant and to supervise its operation and maintenance.

**Dates** : From 1994 till 1997

**Employer** : Egyptian Electricity Authority

**Project**: Cairo South Combined Cycle Power Plant

Job title : Control Room Operator

Job Description : Responsible for operation and coordination with maintenance of one GE-

MS3001E speedtronic mark IV, 115MW industrial gas turbine in combined cycle with one Vogt HRSG and one GE, 60MW steam turbine mark V initial testing during construction, turnover, start-up and during commissioning period verified that all plant system, which include DCIS system contract

guarantee criteria.

**Dates** : From 1993 till 1994

**Employer** : Egyptian Electricity Authority

Project: Gas turbine installation and power recovery boiler project in South Cairo

Power Station

Job title : Cairo South Combined Cycle Power Station Follow-up Engineer assigned as

a Consultant to GTCC-BECHTEL

Job Description : • During this period, I have been a member in the start-up and operation team comprised of the EEA and GTCC associates a joint venture

between overseas BECHTEL Inc. and Gilbert commonwealth international Inc. at the Cairo South 170MW combined cycle project of one GE-MS9001E mark IV speedtronic, 115MW gas turbine generator unit in combined cycle with on Vogt HRSG, and one GE-60MW steam turbine mark v.

- Concerning my skills as a Control Room Operator, with Dcs and mark V, I have successfully passed the job training in the operation of combined cycle plant, my duty during the project have included monitoring the day to day activities of the contractor's start up organization, monitoring the check out and preoperational testing of the systems and equipments, witnessing the static and dynamic testing of components and system, assisting with the selection of the operation spare parts, assisting the start-up coordinator and contractor in solving technical problems and monitoring the plant performance tests.
- BECHTEL Company confessed that I have the ability to read and comprehend English Language document and operation and maintenance manuals and procedures and this made me a valuable member in the project team.

**Dates** : From 1991 till 1993

**Employer** : Egyptian Electricity Authority

**Project**: Cairo South Simple Cycle Power Station

Job title : Shift Charge Engineer

Job Description : I was responsible for operation and supervising the maintenance of three

GE frame 9-mark IV speedtronic 115MW industrial gas turbines.

Dates : From Jan. 1990 till Jul. 1990 Employer : PETROJET Gas Company

**Project**: B.A.D. No. 3 Gas Field, Western Desert, Egypt

Job title : Field Installation Engineer

**Job Description**: I was responsible for new equipment installation.

#### Field of experience:

- Ability to identify and utilize relevant International Engineering Standards and codes related to Rotating Equipment Engineering.
- Proven ability to manage time, cost and quality in engineering projects within a multiple project environment.
- Experience of all Project phases from Concept Selection/Pre-FEED thru
   EPIC to Operations and Maintenance Support.
- Experience with gas turbines, gas compressors, pumps, valves, HRSG, combined cycle and packages and their associated systems.
- Troubleshooting experience / skills.