€TRAINING

Reliability, Availability, and Maintainability (RAM)

16 - 20 June 2024
Sharm El-Sheikh (Egypt)
Sheraton Sharm Hotel,
Resort,

Reliability, Availability, and Maintainability (RAM)

REF: O1705 DATE: 16 - 20 June 2024 Venue: Sharm El-Sheikh (Egypt) - Sheraton Sharm Hotel, Resort, Fee: 4465 Euro

Introduction:

Reliability, Availability and Maintainability RAM are system design attributes that have significant impacts on the sustainment or total Life Cycle Costs LCC of a developed system. Additionally, the RAM attributes impact the ability to perform the intended mission and affect overall mission success.

Course Objectives

At the end of the course participants will be able to:

- Gain knowledge of the reliability in RAM
- Understand reliability and maintainability
- Understand RAMS Reliability, Availability maintainability Safety
- Know why Reliability, Availability, and maintainability is important

Targeted Audience:

- Systems engineering

- Project Engineers

- Technical Assistants

- Maintenance Engineer/Coordinators

Course Outlines:

Unit 1:

- Re?nes the downtime management method

- Recognizes any performance shortfalls

- Builds successful maintenance plans

- Increases effciency

Unit 2:

- Overview of RAM and its maintenance.

- Maintainability and Availability Principles.

- Reliability Mathematics and Failure Physics.

- Exponential Distribution and Reliability Models.

- Learn the importance and implementation of Failure-Rate Data.

Unit 3:

- Applying Probability Density Functions Appropriately.

- Testing Tools for Reliability to Efficiently Apply test methods.

- Software Life Cycle Model and Testing. Software Testing and Limitations.

- Extensive Study of Extensions and Applications of Safe Introduction of Software Using Scale Up.

- Petrochemical and process industries and become knowledgeable in inspection plans

Unit 4:

- Factors Affecting Software Reliability Operations.

- Overview of Software Reliability Models. Data Analysis for Models.

- Software Reliability Prediction Models.

- Software Reliability Estimation and Accelerated Life Testing Models.

Unit 5:

- Software Reliability Metrics and its Application.

- Software Fault Trees. Application and Importance of Software FMEAs.

- System Reliability Software Redundancy.

- Techniques to Improve Software Reliability.

Unit 6:

- Managing Software Reliability.

- Numerical Reliability Framework.

- Reliability Management, Additional Metrics Implications.

- Warranty and Maintenance.

- Preventive Maintenance Models, Effective Maintenance, and Optimum Policy.