

# ENGINEERING ASSET MANAGEMENT (EAM) -2021

VIRTUAL SHORT COURSES

Designed to Optimize your Asset Integrity with: RCM-TPM-Weibull-Pareto-Ishikawa-FMECA-RCA-Planning and Scheduling-Turnarounds



Planning and Scheduling-Turnarounds

FACILITATOR

DATE, TIME & VENUE

TARGET AUDIENCE

## **Zoom Presentation on Vibration Analysis (4 Contact Hours)**

Lectures from the MSc EAM Course

MENG 6703

 Condition
 Monitoring
 and
 Diagnostics'

COURSE CODE

**TOPICS:** 

• Alignment and balancing

• Vibration Analysis

• Proactive Alignment systems with software

**COURSE NAME** 

Maintenance and reliability programs

Vibration instruments

COST: 1000TTD per participant

Dr. Greg Buscarello

Certified ISO Category 3 Vibration Analyst 6th Feb 2020

Saturday 9am - 1pm

ZOOM on-line Managers, Engineers & Technicians in Reliability and Maintenance

Zoom Presentation on Maintenance Planning & Scheduling (4 Contact Hours)

2 Lectures from the MSc EAM Course

> MENG 6702
>  'Work
>  Planning and Scheduling'

A CONDENSED VERSION OF THE TOPICS:

 The Business Case for Planning and Scheduling

 Principles & Concepts of Effective Planning & Scheduling

• Handling Reactive Maintenance

 Integrating Proactive Maintenance Activities: Preventive, Predictive Projects

 Effective Workflow and Planning Exercises

 Controlling Planning & Key Performance Indicators

 Planning and Scheduling for Plant Turnarounds

COST: 1000 TTD per participant

Doc Palmer

Atlanta-USA Author of "Maintenance Planning & Scheduling Handbook" (used in The UWI's MSc EAM Programme) 13th Feb 2020

Saturday 9am - 1pm

ZOOM on-line

Managers Engineers Technicians Planners Schedulers

Workshop on Vibration Analysis-Case Studies (4 contact Hours)

3 Lectures from the MSc EAM Course

MENG 6703

 'Condition
 Monitoring
 and
 Diagnostics)

**TOPICS:** 

 Use of equipment and software in vibration Monitoring

• Case Studies in Vibration analysis

 Field techniques in vibration used to solve problems

 Guides to the Interpretation of vibration Analysis readings

New Trends in Vibration Analysis
 COST: 1500 TTD per participant

**Mr Haffiz Yathali** CMRP Managing Director YATZ Engineering Limited. 20th Feb 202

Saturday 9am - 1pm

ZOOM on-line

Managers Engineers and Technicians in Reliability and Maintenance

Maintenance Analysis & Optimization-one of the EAM MSc course (32 Contact hours)

4 Lectures in the MSc EAM Course-

MENG 6704

 Maintenance
 Analysis and

Optimization'

TOPICS:

 Physical Asset Management Maintenance Policies

 Weibull Analysis and other statistical tools/software

• Component Replacement Decisions

• Inspection Decisions & Spare Parts Provisioning

Capital Equipment Replacement

 Maintenance Resource Management

 Evidence Based Asset Management (EBAM)

COST: 6500 TTD per participant

Prof A.K.S. Jardine

University of Toronto Author of "Maintenance, Replacement, & Reliability Theory & Applications" (used in The UWI's MSc EAM programme) 6th-7th March 2020

27th-28th March 2020

Sat and Sun 9am to 5pm

ZOOM on-line

Managers
Engineers Senior
Technicians in
Reliability and
Maintenance

## ENGINEERING ASSET **MANAGEMENT** (EAM) -2021

# **VIRTUAL SHORT COURSES**

- Anna **REGISTER NOW** 

COURSE CODE TARGET AUDIENCE **COURSE NAME FACILITATOR** 

## Strategies for the Optimization of Asset Integrity in all Industries (6 Contact hours)

5 Lectures from the MSc EAM Courses-

- MENG 6704 'Maintenance Analysis and Optimization' and
- MENG 6701 Asset Maintenance **Technologies**
- DAY ONE WORKSHOP:
- · Basics statistical calculations and decision -making analyses for the non-engineer.
- Failure Analysis and Decision making, Processes for optimal Maintenance and
- · Reliability recommendations in the Heavy and Manufacturing environment
- Strategies to optimize the Implementation of improvement decisions in Maintenance and
- Reliability from the Strategic Plan to the Daily Plan

COST: 1500 TTD per participant

Professor A.K.S. Jardine University of Toronto

Author of "Maintenance. Replacement, & Reliability Theory & Applications" (used in The UWI's MSc EAM programme)

Mr. Kishore Jhagroo Senior Lecturer -UWI

Coordinator - MSc EAM Retired Maintenance Manager with 37 years of field experience

8th March 2020

Monday 1.30pm -7.30pm

ZOOM on-line

Managers **Engineers** Senior Technicians in Reliability and Maintenance

## **Zoom Presentation Machine Learning and Artificial Intelligence (4 Contact Hours)**

6 Lectures from the MSc EAM Course

#### TOPICS:

- Introduction to data science, AI and machine learning (ML):
  - History of AI and other Concepts in AI and ML
- Basic ML algorithms:
  - Supervised learning :
  - Algorithms and case studies
  - Deep learning and case studies
  - Unsupervised learning:
  - Clustering algorithms and case studies
  - Reinforcement learning:
  - Markov decision processes
  - Basic algorithms: Q-learning, SARSA, DQL
- Issues and remedies:
  - Sample efficiency and transfer learning
  - Safety
  - Explainability
- Other emerging technologies
  - Industry 4.0
  - Digital twin

COST: 1000 TTD per participant

## Professor Chi-Guhn Lee

University of Toronto

27th Feb. 2020

Saturday 9am - 1pm

ZOOM on-line

Managers Engineers & Technicians in Reliability and Maintenance

## **Optimization of Plant Turnaround/ Shutdown Processes (8 contact Hours)**

Lectures from the MSc FAM

#### MENG 6702 Work Planning and Schedulina'

## **TOPICS:**

- Maintenance Philosophy
- Strategic Planning
- Worklist Preparations-Scope Freezing
- Turnaround Organization Structure
- Tendering Process & Post Turnaround Reviews
- Execution. Emergent work strategies and Post Turnaround Reviews
- CMMS Turnaround Optimization

COST: 2500 TTD per participant

#### Mr. Kishore Jhagroo MSc/CRE

Senior Lecturer - UWI

Coordinator of the MSc EAM Retired Maintenance Manager with 37 years of field experience.

### 20th March, 2020

Saturday 9am - 4pm

ZOOM on-line

Managers Engineers **Technicians Planners** Schedulers Reliability and Maintenance Personnel

Upon completion of the course each participant will receive a Certificate of Participation