

FROM YOUR PARTNER IN ENERGY EDUCATION

BEST GLOBAL PRACTICES
Lubrication Strategy

Understanding Tribology and the Importance of Oil Contamination Control



EXPERT TRAINER
ROLLY ANGELES

October 26 to 27, 2017 | The Lighthouse, Lopez Building
Meralco Compound, Ortigas Center, Brgy. Ugong, Pasig City, Philippines

Lubrication Strategy

Understanding Tribology and the Importance of Oil Contamination Control

COURSE OVERVIEW

This course will discuss the importance of implementing a lubrication strategy in a commercial and industrial plant, and will provide best practices on lubrication and oil contamination control that can be adopted by diverse industries.

COURSE OBJECTIVES

At the end of the 3-day course, the participants will be able to:

- Discuss the fundamentals of power plant lubrication and the importance of contamination control
- Explain the three levels of Oil Analysis
- Determine ways to control and reduce oil contamination in various equipment
- Apply maintenance strategies on lubrication and oil analysis based on industry practices
- Implement different lubrication methods and strategies to reduce plant breakdowns due to lubrication failures

WHO SHOULD ATTEND

- Reliability and Maintenance Professionals
- Lubrication Technicians and Engineers
- Maintenance, Production, and Operation Managers
- Facilities and Utilities Managers
- Preventive Maintenance Groups
- Continuous Improvement Groups
- Oil Analysts and Tribology Groups
- Oil Laboratory Analysts
- Failure Analysis Professionals



Meralco Power Academy (MPA) is a premier training and energy education provider that leverages on MERALCO's 114 years of industry experience, expertise and network. Its array of technical programs lend industry practitioners a competitive edge through top of the line learning solutions which are delivered in a variety of methods. MPA provides the learning platforms and coalitions for leaders, decision makers, managers and advocates by facilitating technical exchanges on global innovations and technologies on power and energy.



EXPERT COURSE TRAINER ROLLY ANGELES

Rolly Angeles is a seasoned international reliability and maintenance consultant with 28 years of solid experience in the field. He has conducted reliability and maintenance training programs in United Arab Emirates, India, Malaysia, Indonesia, Nigeria, Bangladesh and South Africa.

A former TPM Senior Engineer at Amkor Technology Phils, he now carries a portfolio of reliability & maintenance training programs that include Maintenance Management courses on TPM, Lubrication, Tribology, Condition-Based Maintenance, RCM, RCFA, Planned Maintenance, World Class Maintenance Management, The 12 Disciplines, Maintenance KPI's and Indices, Oil Contamination Control, TPM Planned Maintenance and Autonomous Maintenance and many more.

WHAT FORMER PARTICIPANTS SAY ABOUT THE LUBRICATION STRATEGY COURSE

"Topics on both Oil Analysis and Contamination Control very well covered. The speaker has a very sound knowledge and experience on the topics discussed. The discussion is lively, and the time was well managed. I am glad to know that we have this kind of training locally. Overall quality of seminar is comparable to the seminar on Oil Analysis training I've attended abroad & offered by foreign consultants. This is one approach that every maintenance must know."
Al Silva, Assistant PdM Engineer, Team Energy

"The seminar is relevant to the company and worth attending to. The seminar is an eye opening to a neglected aspect of maintenance practices and that is Lube Oil Analysis parallel with contamination control."
Efren C. Cruz, Chemical Engineer, Alstom



COURSE OUTLINE

Lubrication Strategy

Understanding Tribology and the Importance of Oil Contamination Control

DAY 1

Module 1: All There Is to Know About Oil

- Definition of oil
- SAE and API Standards
- Purpose and Properties of Oil

Module 2: Basics of Grease

- Definition and Anatomy of Grease
- Function of Grease
- Common types of Grease
- Application of Grease

Module 3: Understanding Oil Contamination

- What causes oil breakdown?
- How oil gets contaminated
- Effects and sources of water on oil

Module 4: Total Oil Contamination Awareness

- Contamination Control Awareness
- Proper storage rooms for oil

Module 5: Understanding Filtration

- Nominal and absolute filtration
- Function of a Filter
- Efficiency Rating of Filters
- Beta Rating of Filters

- By-pass Filtration for Engines

DAY 2

Module 6: Understanding Mechanical Failures

- Different types of wear
- How to control each type of wear

Module 7: Different Oil Analysis Test

- Checking oil's health and cleanliness
- ISO rating on fluid cleanliness code
- Exercise on ISO cleanliness code
- Particle counter and ISO codes
- Oils Physical and Chemical Properties
- Checking oil for moisture
- TAN and TBN test
- Viscosity test for oil
- Additives as seen on TV
- Understanding Tribology
- Wear metal debris analysis
- Spectroanalysis and Ferrography
- Exercise on lubrication

Module 8: Step by Step Approach on Lubrication Strategy in Your Plant

- Step by step approach on adopting an oil Analysis Strategy
- Basic Tips on Oil Analysis
- Justifying an Oil Analysis program
- Step by Step approach on Adopting a Lubrication Strategy in

SEMINAR RATES

Includes course manual, lunch, snacks and program certificate.

REGULAR RATE
PhP19,000 net
Per Participant
VAT inclusive

- YES! I am interested in attending Meralco Power Academy's LUBRICATION STRATEGY Course!**
- I am sorry but I won't be able to attend. You may send me materials on your upcoming events.

PAYMENT METHODS AND TERMS

1. Payments may be deposited to:

**Account Name: Meralco Power Foundation Inc.
BDO Savings Account No 4630-2297-12 (Meralco Branch)**

Please email a copy of your deposit slip to astibayan@meralco.com.ph or power.academy@meralco.com.ph

2. We shall send you a confirmation of your enrollment upon receipt of the accomplished registration form.

3. Cancellations made 7 days before the program shall be non-refundable.

4. For any concerns, please contact Angie Tibayan at 1622-6758, mobile: 0999-881-3762, email: astibayan@meralco.com.ph

REGISTRATION FORM

COMPANY DETAILS

Company Name	<input type="text"/>
Company's TIN Number	<input type="text"/>
Office Address (Billing Address)	<input type="text"/>
Contact Person	<input type="text"/>
Email Address	<input type="text"/>
Contact Number	<input type="text"/>

PARTICIPANT'S DETAILS

Name	<input type="text"/>
Nickname (for the name tag)	<input type="text"/>
Designation	<input type="text"/>
Email Address	<input type="text"/>
Contact Number	<input type="text"/>
Dietary Restrictions	<input type="text"/>