



## LCM Offshore and Marine Training

# Siemens Energy BlueDrive Solution

## Technical Training

Dates	TBA
Place	OnBoard
Language	English/Norwegian
Length	2-3 days

### Certificates

Certificate for Basic BlueDrive User, Technical.

### Course Description

The course introduces BlueDrive diesel electric marine solutions roadmap and architecture, focusing on the interplay of different system modules to optimize vessel operations. Technical solutions for load sharing, blackout prevention and recovery as well as power management with or without batteries are discussed in detail. The introduction followed by a walk-through of Siemens Energy components present in the customer's ship/vessel to advice on safe, efficient and economical operations as well as troubleshooting. Practical exercises onboard depends on the vessel's availability.

### Objectives

After gaining information of how different system modules are built-up and interact in the vessel-specific solutions, engineers are

- able to optimize safe and economic operation of their vessel
- quickly identify and act in critical situations to prevent and minimize any accidents or system damages
- optimize preventive maintenance and repair of vessel-specific components listed under Topics

### Topics

- Diesel Electric Propulsion System
- Motors and Generators
- Main Switchboard
- BlueDrive Propulsion Drives
- Power Management System, PMA
- Remote Control System, RCS (optional)
- Remote Diagnostics System, RDS
- Integrated Automation System, IAS (optional)
- Batteries: Energy Storage System, ESS (optional)
- Blackout prevention and recovery

### Training Methods and Assessment

- Interactive lectures
- Hands-on practical training
- Formal assessment

### Entry Standards

- General knowledge of marine electrical solution
- General knowledge of motors and generators
- Introduction training online (BlueDrive)

### Example Schedule

Day	Topics
Day 1	Siemens Energy roadmap and delivery Optimized operation 1/2
Day 2	Optimized operation 2/2 Safety during operation Blackout prevention
Day 3	Operation task Fault finding and Maintenance Final assessment