## **SEAONICS**



### Simulator Technology

**KEY POINTS** 

Lifecycle Simulator | Operator Training | Operation Planning | Operation Safety | Testing

#### WHY SIMULATOR

Operating heavy machinery in complex offshore operation requires skilled and trained operators to secure the safety of personnel and equipment. In a simulated environment, the operator gets familiar with both machinery and operation. Normal operation and unwanted scenarios are a realistic part of the training without any hazard for personnel or equipment. It is in our human nature to learn from our own failures; hands on training in real time simulator environment, is the safest place to gain such experiences.

#### **HOW IT WORKS**

The digital twin of the machine is controlled by the same control system as the actual machine. Hence, the interaction between the operator and the machine is as in real life. On the instructor tablet, unwanted component errors and scenarios can be manipulated dynamically into the real time simulation. On the same tablet, through intuitive graphical interface, other scenario settings are easily activated. SEAONICS simulators can be

delivered in portable, rugged flight-case enabling you to setup your training at the most cost effective location for your crew. SEAONICS delivers operator panels and chairs, same as at the actual system. For classroom training with larger groups of operators, simplified desktop solutions of the Human Machine Interface, is an option.

#### SETUP

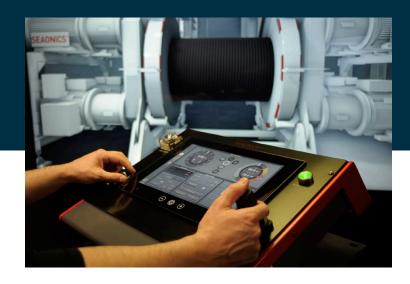
A typical delivery for plug and play containing:

- All hardware mounted in a rack on wheels for easy transportation
- Controllers for running the Control System Application
- PC and tablet for running the Simulator and Instructor Application
- Network setup
- Remote connection capability for service and upgrades
- HMI equipment such as a control panel to operate the simulated machine
- · Classroom units
- · Options available

Driven by the world's need for sustainable innovation, SEAONICS will lead our customers efficiently and safely to the next level of intelligent, electrified handling and lifting solutions for the maritime industry. With specialized knowledge and technology, SEAONICS will strive to make maritime handling and lifting solutions even more efficient, smarter and more profitable.

We provide a close and customized follow-up, which is tailored to your requirements for advice, service and control throughout the product's lifetime. Through the use of simulators and test labs we create a virtual training environment to ensure operation safety and efficiency. SEAONICS solutions are all designed to meet the demands of the future, including new safety standards, extreme environmental conditions and zero emission operations.

# SIMULATOR REFERENCES



#### Odfjell Drilling XT handling system simulator

DEEPSEA NORDKAPP, NORWAY

OSC – Offshore Simulator Centre

ÅLESUND, NORWAY

**Damen Shipyard** 

THE NETHERLANDS

Marine Aluminium

HAUGESUND, NORWAY

**Uptime International** 

HAUGESUND, NORWAY

Lifecycle simulator. A digital twin of handling equipment for rig operations. Portable, plug and play. Delivery of control system and simulator dynamic modelling certified personell operating on rig.

Integrated gangway simulator for ship operation modelling. First used by Equinor (Statoil) in operation simulator for Island Crown. Delivery of control system and simulator dynamic modelling for Gangway Simulator.

Integrated gangway simulator for ship modelling. Used in ship simulator for Damen shipyard. Joint delivery with MARIN – Maritime Research Institute Netherlands. Delivery of control system, simulator dynamic modelling and hardware for Gangway Simulator.

Five 3D simulators for MA Academy for full training of gangway operators. In daily use in training courses. Delivery of control system, graphics, simulator dynamic modelling and hardware for Gangway Simulator.

One 3D simulator, dome-shaped, equipped as an operators cabin. Delivery of control system, graphics, simulator dynamic modelling and hardware for Gangway Simulator.