



DET NORSKE VERITAS

PRODUCT CERTIFICATE

This Certificate consists of 2 pages

This is to Certify that the product
Bridge Operation Simulator

with class notation

INTEGRATED SIMULATOR SYSTEM, DYNPOS - AUTR (SIM), TUG, AHTS

and type designation

**Offshore Vessel Bridge Operations Including Dynamic Positioning,
Supply, Towing & Anchor Handling**

Manufactured by
ARI Simulation
New Delhi India

In use for simulation at
NUSI Offshore Training Institute

is found to comply with
Class A- Standard for Certification of Maritime Simulators No. 2.14 January 2011

Application

The above Standard is based on requirements in the STCW Convention, Regulation I/12.

This Certificate is valid until **2019-02-28**, provided the requirements for the retention of the Certificate will be complied with.

Issued at **Mumbai** on **2014-02-28**

Kamal Kumar
Country Manager

for Det Norske Veritas AS



Vernon Sequeira
Principal Surveyor

This Certificate is subject to terms and conditions overleaf. Any significant change in simulation performance may render this Certificate invalid.
If any person suffers loss or damage which is proved to have been caused by any negligent act or omission of Det Norske Veritas, then Det Norske Veritas shall pay compensation to such person for his proved direct loss or damage. However, the compensation shall not exceed an amount equal to ten times the fee charged for the service in question, provided that the maximum compensation shall never exceed USD 2 million. In this provision "Det Norske Veritas" shall mean the Foundation Det Norske Veritas as well as all its subsidiaries, directors, officers, employees, agents and any other acting on behalf of Det Norske Veritas.

Application/Limitation

The simulator shall be capable of simulating a realistic environment for all of the applicable STCW competence requirements referred to in the column for Class A in Table B1.

Table B1 Competencies addressed by bridge operation simulator class					
STCW reference	Competence	Class A (NAV)	Class B (NAV)	Class C (NAV)	Class S (NAV)
Table A-II/1.1	Plan and conduct a passage and determine position	A	B		(S)
Table A-II/1.2	Maintain a safe navigational watch	A	B		(S)
Table A-II/1.3	Use of radar and ARPA to maintain safety of navigation	A	B	C	(S)
Table A-II/1.4	Use of ECDIS to maintain the safety of navigation	A	B	C	(S)
Table A-II/1.5	Respond to emergencies	A	B	C	(S)
Table A-II/1.6	Respond to a distress signal at sea	A	B	C	(S)
Table A-II/1.9	Manoeuvre the ship	A	B	C	(S)
Table A-II/2.1	Plan a voyage and conduct navigation	A	B		(S)
Table A-II/2.2	Determine position and the accuracy of resultant position fix by any means	A	B		(S)
Table A-II/2.3	Determine and allow for compass errors	A	B		(S)
Table A-II/2.4	Co-ordinate search and rescue operations	A	B		(S)
Table A-II/2.5	Establish watchkeeping arrangements and procedures	A	B		(S)
Table A-II/2.6	Maintain safe navigation through the use of information from navigation equipment and systems to assist command decision-making	A	B	C	(S)
Table A-II/2.7	Maintain the safety of navigation through the use of ECDIS and associated navigation systems to assist command decision making	A	B	C	(S)
Table A-II/2.10	Manoeuvre and handle a ship in all conditions	A			(S)
Table A-II/2.11	Operate remote controls of propulsion plant and engineering systems and services	A			(S)
Table A-II/3.1	Plan and conduct a coastal passage and determine position	A	B		(S)
Table A-II/3.2	Maintain a safe navigational watch	A	B		(S)
Table A-II/3.3	Respond to emergencies	A	B	C	(S)
Table A-II/3.4	Respond to a distress signal at sea	A	B	C	(S)
Table A-II/3.5	Manoeuvre the ship and operate small ship power plants	A			
Table A-II/5.2	Contribute to berthing, anchoring and other mooring operations	A	B	C	(S)