

DSCV Wadad Aletheia

Vessel Specifications



Al Raiedah Underwater LTD

✉ Info@raiedha.com

🌐 www.raiedha.com

☎ +966 138204759

📍 P.O. Box 34442, Al Khobar, Kingdom of Saudi Arabia





DP3 and DP Enhanced Reliability (ER) equates to maximum flexibility when considering operational requirements

Vessel Notations

DNV Class GL :

+1A1, ICE-1C, DSV-SAT, DSV-SURFACE,
DYNPOS AUTRO, DYNPOS ER, EO, SF,
DK(+), COMF V(3) C(3), BIS, FiFi II, BWM-T,
NAUT-OSV(A), SUPPLY VESSEL (Hull Only),

HELDK-SH(CAA-N), RECYCLABLE,
OFFSHORE SERVICE VESSEL +, CLEAN DESIGN, SPS 2008 and
Compliance with MODU Code and MOU Regulations

**Vessel Particulars:**

Type:	Ice Class Dive Support Vessel
Year of Production:	2024
Builder:	ZPMC
Flag:	Bahamas
LOA	145.90m
Beam:	27.00m
Depth:	11.30m
Draught:	7.65m(max)
Deadweight:	8,650 tonnes
Max. Design Speed:	14.5 knots
Eco. Speed:	11.5 knots
Endurance:	60 days
Active Roll Reduction:	2 x Active Roll Reduction Tanks Installed (HOPPE)
Station Keeping:	ERN 99.99.99.99

Vessel Deck:

Working Deck:	65mx 27m
Working Deck Area:	1,850m ²
Deck Strength:	15t/m ²
Deck Load:	5,000t@ 1m
Transom Strengthened to:	50t/m ²
Working Moonpool:	7.2mx 7.2mstrengthenedfor vertical tower system, 50t/m ²

Vessel Capacities:

Fuel Oil:	2,300m ³
Fresh Water:	1,120m ³
Water Makers:	2 x 40m ³ / day RO units

Vessel Fi Fill System (FFS):

- 2 x Remote control monitors
- 2 x 3,600m³/hr

Vessel Helideck:

Diameter:	28.75m
MTOW:	15.6t(S61/S92/EH101)
Compliance: Helicopter	UK CAA, NMD, DNVand CAP437
Reception:	Above wheelhouse

Vessel Wheelhouse:

- 1 x S-Band and 1 x X-Band type (chart radar)
- 2 x ECIDSunits
- 2 x GPS units (in addition to DP)
- 1 x Autopilot
- 1 x Speed log
- 1 x Echo sounder (3,000m)
- 1 x GMDSS (A3)
- 1 x NavtexICS Nav 5
- 1 x AIS
- 1 x Ship security system
- 1 x Voyage data recorder
- 1 x Bridge navigation watch alarm system

Vessel Kongsberg DP System:

- Main DP -K Pos DP-22 (+K Master and K Chief)
- Alternative DP -K Pos DP-12
- EmgBack Up -K Pos DP-12
- 1 x SIMRADcJoy
- 2 x cWingFixed Bridge wings

Vessel DP Reference Systems:

- 3 x DGNSS
- 1 x Radius
- 1 x CyScan
- 2 x Taut Wire
- 1 x Kongsberg HiPAP501 & 1 x Sonardyne Ranger 2 Pro (2 x Spare HiPAPTrunks)
- 4 x Wind Sensors
- 4 x Gyro Compass
- 4 x MRU's

The technical specifications presented within this document are subject to change without prior notification.

**Vessel Redundancy Features:**

- Fire and flood protection implemented throughout the vessel, organized into two redundant groups.
- Incorporation of SIEMENS Dual In-feed concept on forward, aft tunnel thrusters, and center aft propulsion thruster.
- Complete installation of SIEMENS Emergency Shut Down (ESD) system, equipped with gas detection and automatic fire dampers specially tailored for DSCVs.
- All power, control cabling, and piping are routed independently and segregated with A-60 fire-rated materials throughout the vessel.
- Provision of an independent emergency fire backup control station, insulated with A-60 materials, situated below the wheelhouse and facing aft.
- DYNPOS ER system accounts for "Hidden Failures" and integrates secondary monitoring and control systems for the main power plant.
- Full application of DYNPOS ER allows for off-line generators to be factored into DP Consequence Analysis for power requirement criteria.
- An alternative Full DP control system is positioned at the aft bridge console.
- Designed to withstand Live Short Circuit Testing, demonstrating Voltage Dip Ride Through capability and safe operation with the main Bus tie closed and dual feeding.

Vessel Power & Propulsion:

Diesel Electric Propulsion of:	<ul style="list-style-type: none"> • 6 x MAK 2,700kWe, 6.6kV, 3Ph, 60Hz • 1 x CAT Emg/Harbour Set 860kWe • 1 x CAT Dive Emg Gen Set 860kWe Complete with SIEMENS Dual In-Feed Concept
SCHOTTEL Propulsion Thrusters:	<ul style="list-style-type: none"> • 3 x 3,000kW, Fixed pitch, Variable Speed Fully Azimuthing Thrusters AFT
BRUNVOL Bow Retractable Thruster:	<ul style="list-style-type: none"> • 1 x 2,500kW, Fixed Pitch, Variable Speed Fully Azimuthing Retractable Thruster FWD
SCHOTTEL Tunnel Thrusters:	<ul style="list-style-type: none"> • 2 x 2,680kW, Fixed Pitch, Variable Speed Tunnel Thrusters FWD

Vessel Cranes:**• Full HOPPE anti-heeling system Installed**

MacGregor 400t Offshore Rated Knuckle Boom Crane	<ul style="list-style-type: none"> • 400t single fall @18m AHC/AT main hoist winch • 20t single fall / 40t double fall with AHC/AT aux hoist winch • Both with working operating depths of 3,000m (single fall) • DNV GL Classed
MacGregor 25t Offshore Rated Knuckle Boom Crane	<ul style="list-style-type: none"> • 25t single fall with AHC/AT hoist winch • Working operating depth of 600m • DNV GL Classed
MacGregor 10t Offshore Rated Telescopic Crane (Pt side)	<ul style="list-style-type: none"> • 10t @ 15m, 1t @ 35m main hoist winch • 1t @ 15m, 1t @ 35m aux hoist winch • DNV GL Classed
MacGregor 10t Offshore Rated Luffing Crane (Stbd side)	<ul style="list-style-type: none"> • 10t @ 15m, 1t @ 35m main hoist winch • DNV GL Classed

Vessel Accommodation & Recreational Facilities:

- POB of 200 persons meeting MLC 2006 regulations, all with en-suite

Cabins:

- 20 x Single cabins
- 8 x Double cabins
- 41 x Two plus Two (Pullman Bunks)
- Fully air-conditioned meeting DNV GL COMF Class C(3) V(3) (Carrier)
- Galley and Provision stores for 200
- Mess room seating for abt. 80
- Full Hospital with separate treatment room facilities
- 2 x Recreational rooms
- 1 x Cinema
- 1 x Internet Café
- 1 x Gymnasium



Vessel Offices:

- 3x Large client offices with windows Aft
 - 1x Survey area on bridge
 - 1x Large conference room
 - 2x Separate ROV Office spaces
-

Classed Saturation Diving System:

- DRASS i100, 24man, Fully automated diving system
 - Full NORSOK capabilities / DNV Classed to 300MSW
 - 2 x Dedicated bell moonpools -5.4mx 4.2m(1 x Pt. and 1 x Stbd.)
 - High efficiency diver and chamber gas reclaim system
 - Total gas storage of approx. 40,600Nm³
 - Dedicated diving emergency bell mate trunk on main deck
 - Designed for a significant wave height of 5.5mwith heave compensation
 - 2 x 24 Man self-propelled hyperbaric Lifeboats (SPHL)
-

Classed Surface Diving Spread:

- DRASS3 Diver Air/Nitrox surface diving spread (Pt side)
 - 2 x Dedicated A-frame LARS (1 x main and 1 x standby diver)
 - 1 x Dedicated A-Frame tooling LARS (with 2 x CT and 1 x standard winch)
 - 1 x Dedicated triple drum winch (for hose deployment)
 - Hoop diving facilities prepared for operating 33mfrom ship side
-

ROV Hangers:

- MacGregor ROV hanger doors
 - Fully equipped to supply all services to 2 x A Frame ROV LARS
 - 1 x ROV control room, 2 x ROV offices, ROV stores and workshop facilities
 - 5 tonne gantry crane
-



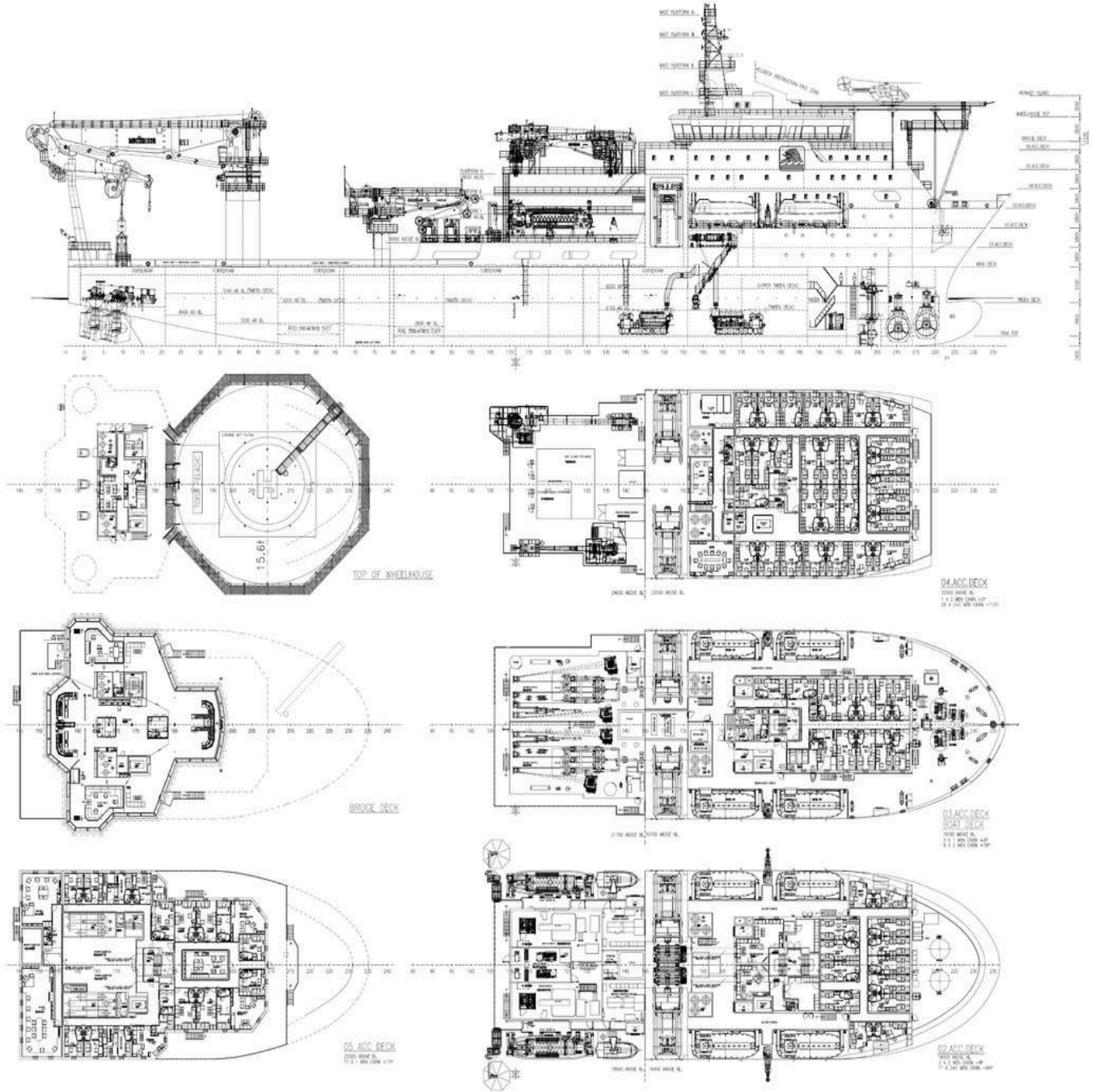
Diving Bell Launch and Recovery



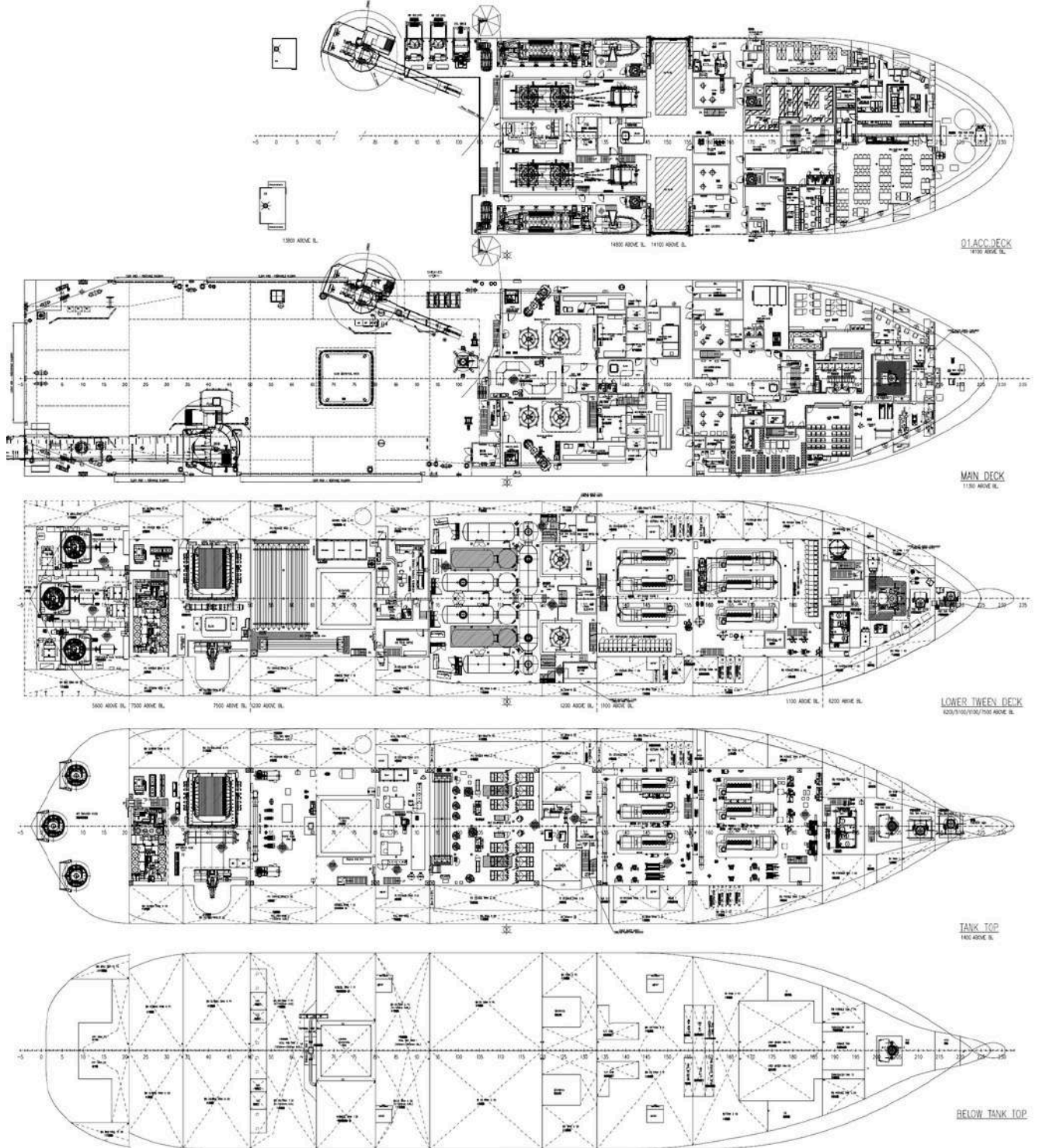
Saturation Dive Control



Saturation Diving Chambers



The technical specifications presented within this document are subject to change without prior notification.



The technical specifications presented within this document are subject to change without prior notification.