



**DESB MARINE
SERVICES
SDN BHD.**

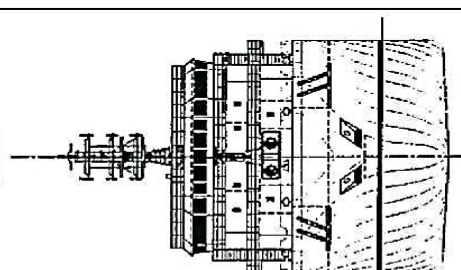
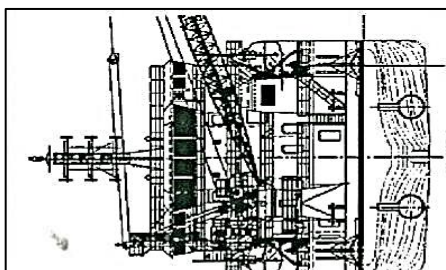
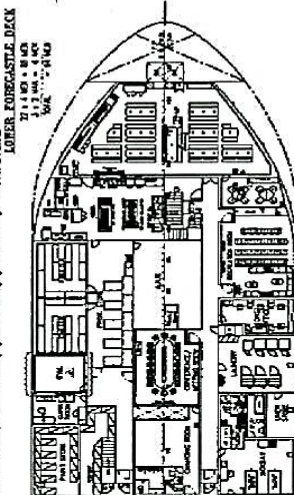
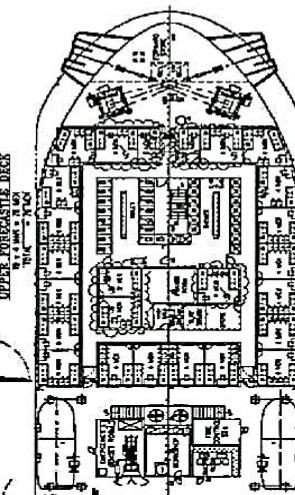
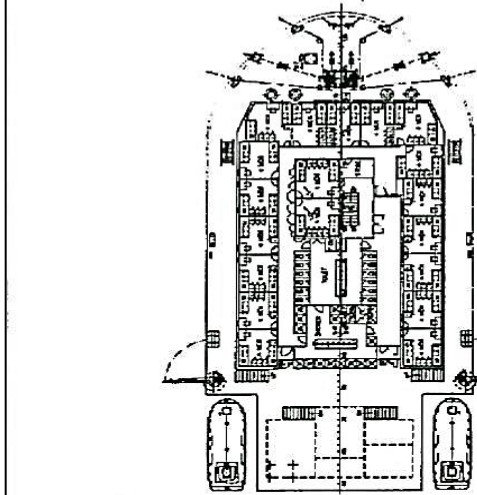
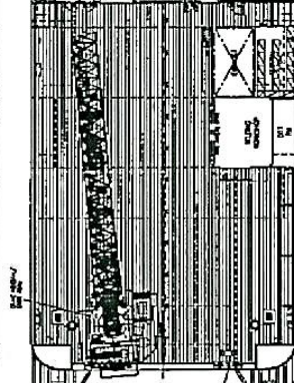
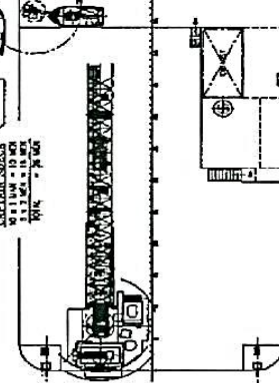
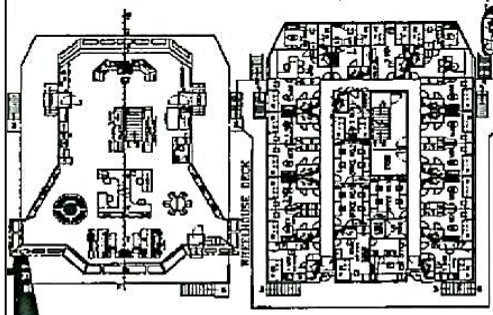
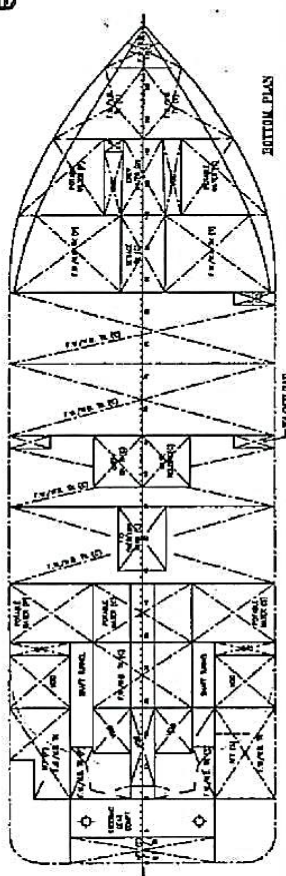
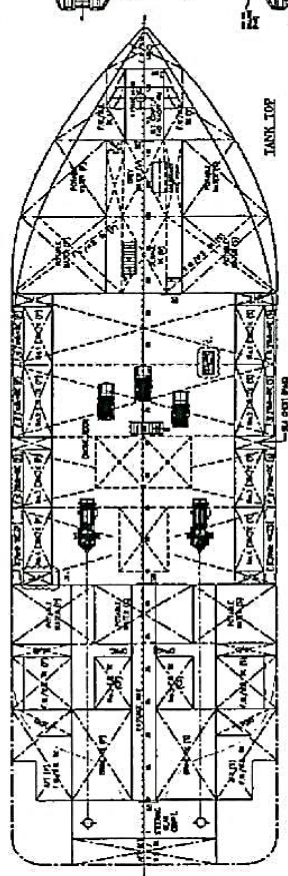
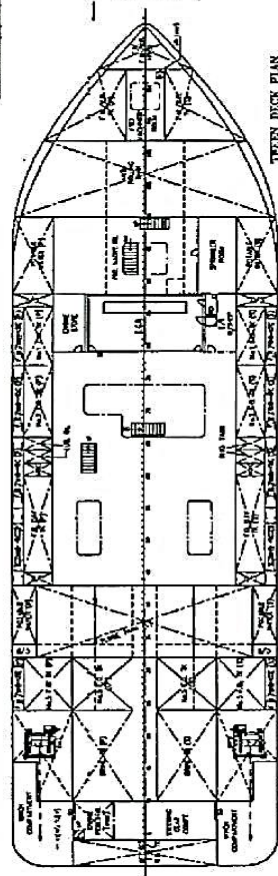
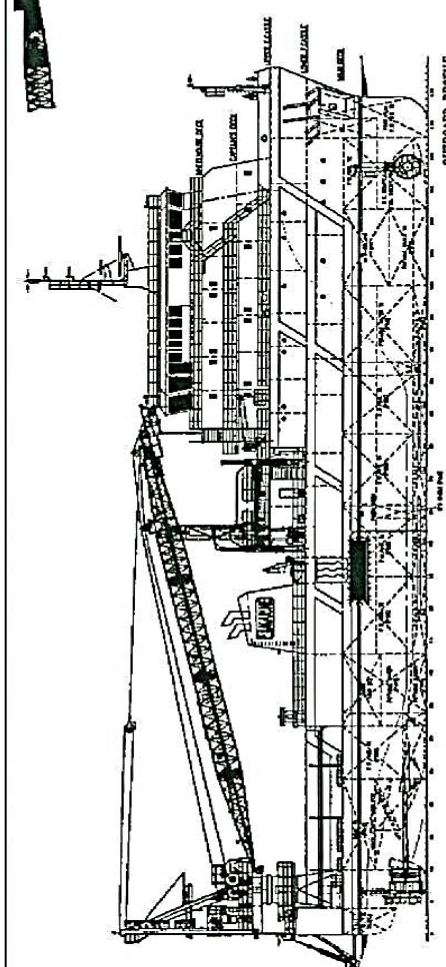
**PROVIDING SERVICES TO THE
MARINE/OFFSHORE INDUSTRIES**

**M.V. "DAYANG OPAL"
80.40 M MAINTENANCE / WORK VESSEL**

TECHNICAL SPECIFICATIONS

<u>No</u>	<u>Item</u>	<u>Specification</u>	<u>No</u>	<u>Item</u>	<u>Specification</u>
01.	Vessel Name	Dayang Opal	18	Propulsion Machineries	
02	Type of Vessel	Maintenance/Work Vessel	a)	Main Engines	2 x CATERPILLAR 3516B @ 2575BHP
03	Call Sign	9WQP4	b)	Marine Gearbox	2 x WAF863 REINT JES
04	Plying Limit	Malaysia Near Coastal Trade	c)	Propeller	2 x 2100mm Mg bronze fixed pitch propellers
05	Classification	American Bureau of Shipping (ABS)	d)	Bow Thruster	1 x KAMUME (FPP) 10T tunnel thruster
06	Class Notation	* A1 { * AMS, Offshore Support Vessel, Special Purpose Ship (SPS) Code 2008 Labuan	19	Navigation & Communication Equipments.	
07	Port of Registry	Labuan	a)	GMDSS	FURUNO FM-8800S - Area 3
08	Flags	Malaysia	b)	Gyro Compass	1 x TOMINAE / TG-8000
09	Horse Power	2 x 2575BHP at 1600 RPM	c)	Radar	2 x FURUNO FAR-2137S & FAR-2117
10	Cruising Speed	11.5 knots at 85% MCR at half load condition	d)	Echo sounder	1 x FURUNO FE-700
11	Endurance	40 days / 5000NM range.	e)	SART	2 x KANNAD
12	Fuel Consumption		f)	EPIRB	1 x MCMURDO / E5
	Cruising Speed	800 Litres/hour (approx.)	g)	Navtax Receiver	1 x FURUNO NX700B
	Generator	118 Litres/hour/engine (approx.)	h)	Autopilot	1 x ANSCHUETZ / PILOT STARD
13	Main Characteristics.		i)	Speed Log	1 x FURUNO / DS-80
	L.O.A	80.40 M	j)	GPS Plotter	1 x FURUNO GP-150
	Breath Moulded	22.00 M	k)	AIS	1 x FURUNO FA150
	Depth Moulded	7.00 M	l)	Magnetic Compass	1 x LILLEY & GILLE / MK-200
	Max Draft	5.30 M	20	Accommodation	Fully air conditioning total 197 berths, 1 x Hospital; 1 x Conference Room; 1 x Recreation Room & 5 x Offices
	Deck Strength	10 MT / m ²	21	Fire Fighting Equipments.	
	Clear Deck space	700 m ² (approx.)	a)	External Fire Pump	1 x 300 m ³ /hr @ 10-12 bar
	Deck Cargo	800 MT	b)	Fire Monitor	2 x 150 m ³ /hr @ 10-12 bar
	Deadweight	3528 MT at 5.3m draft (approx.)	c)	Fire Extinguish system	Fixed Co2 system for Engine Room & Bow Thruster Compartment.
14	Capacity		d)	Sprinkler system	As per latest SOLAS 74/78 requirements
	Fuel Oil	800 m ³ (approx.)	e)	Fire Hydrants and Extinguishers	As per latest SOLAS 74/78 requirements
	Fresh Water	900 m ³ (approx.)	22	Life Saving Appliances.	As per latest SOLAS 74/78 & Flag Admin requirements
	SWB/FW	2600 m ³ (approx.)	23	Other Equipments.	
	Lub Oil Storage	16 m ³ (approx.)	a)	Life Boat	2 x 75 men SOLAS Approved Type
	Sewage holding tank	30 m ³ (approx.)	b)	Life Raft	4 x 25 men SOLAS Approved Type
	Dirty Oil tank	20 m ³ (approx.)	c)	Rescue Boat	1 x 6 men Rigid type c/w davit & 65 HP Yamaha outboard engine
	Hydraulic Oil Tank	16 m ³ (approx.)	d)	Manoverboard	2 x IKAROS
	Water Maker (RO)	2 x 50T/day	e)	Deck flood light	28 x 400 W
	Brine tank	280 m ³ (approx.)	f)	Compressor	2 x PUMA @ 7.5 HP
15	Auxiliaries	3 x Caterpillar C32 Main Genset 590 kW / 415V / 3Ph / 50Hz. 1 x Cummins 6CTA 8.3 D/ Stamford Emergency Genset 150 kW / 415V / 3Ph / 50 Hz.	g)	Sewage Treatment	1 x Hamworthy ST-15
16	Pumps		h)	Others	1 x Garbage Disposal
	Bilges/Ballast Pump	2 x 75 m ³ /hr @ 45m Total Head	24	Owner	DESB Marine Services Sdn Bhd.
	G.S./Fire pump	1 x 75 m ³ /hr @ 45m Total Head	25	Designer	Wartsila Ship Design Pte Ltd.
	Service Fire Pump	3 x 75 m ³ /hr @ 70m Total Head	26	GRT/ NRT	5089MT (approx.)/1526MT
	Fuel Oil Transfer Pumps	1 x 15 m ³ /hr @ 18m Total Head & 1 x 60 m ³ /hr @ 60m Total Head	27	Year Build	Dec 2012
	Fresh Water Pump	1 x 60 m ³ /hr @ 40m Total Head	28	Yard	YD326 -Shin Yang Shipyard Sdn Bhd, Miri
	Emergency fire pump	1 x 35 m ³ /hr @ 45m Total Head	29	Official Number	334907
17	Deck Machineries		30	IMO No.	9689196
	Capstans	2 x 5T SWL Variable Speed			
	4-point Mooring	2 x 5MT Plimsoll Hydraulic Capstans 4 x single drum c/w auto spooling, 120T @ 1 st layer w/ 44mm dia x 1200 wire rope, fitted with four (4) x 5000kgs Delta Flipper Anchors			
	Deck Crane	1 x Favelle Favco model 8/10K Lattice Boom type offshore marine crane accordance to API 2C, 45T SWL @ 41.2 M Boom Length			

Particulars Given in Good Faith And Are Believe To Be Correct But Not Guaranteed At The Time Of Printing



PRINCIPAL PARTICULARS

LENGTH O.A.	80.0m
LENGTH W.L.	77.60m
BEAM MLD.	22.00m
DEPTH ULD.	7.00m
DRAFT DESIGNED	3.30m
CAPACITANT	137 MEN
F.W./M.B.	1500m ³
POTABLE WATER	800m ³
FUEL OIL	800m ³
BRINE TANK	780m ³
CLEAR DECK SPACE	750m ²

NATURAL LIGHT ESTIMATIONS TO BE REQUESTED FROM CLASS FOR INFORMATION. SEE ASS COMMENT LOGS.

REVIEWED
Details of this review are set out below in the ASS Letter.

80m MAINTENANCE/WORK VESSEL

TYPE	General Arrangement
CLASS	MAINTENANCE/WORK VESSEL
DESIGN NO.	1001
CONSTRUCTION NO.	1001
MANUFACTURER	WARTSILA
OWNER	WARTSILA
OPERATOR	WARTSILA
REGISTRY	FINLAND
REGISTRATION NO.	1001
REGISTRATION DATE	10/01/01
REGISTRATION EXPIRES	10/01/01
REGISTRATION FEE	10000
REGISTRATION TAX	10000
REGISTRATION INSURANCE	10000
REGISTRATION OTHER	10000
REGISTRATION TOTAL	40000