

Hindustan Shipyard Ltd : Visakhapatnam-5

**TECHNICAL SPECIFICATION FOR OFF-LOADING OF HULL OUTFIT WORKS ON
53000 DWT BULKER – OUR YARD NOs.11138**

1. **SCOPE OF WORK OF THE CONTRACTOR:**

The scope of work to be executed on board is as per the list of drawings placed at Annexure I. Further to the above, any clarifications if any arise while execution, the same needs to be get clarified from concerned Production dept/Design drawing office.

- 1.1 Re-enforcement / Modifications as per fly sketches, where ever necessary to be attended as per the drawings at free of cost.
- 1.2 Incase of water tight, weather tight doors, fire proof doors and window and side scuttles the opening to be cut as per sizes after receipt of material , if necessary fairing works are to be attended. After erection of doors fit up, dry survey and hose test is to be offer to Dept/QC/Class surveyors. Foot step with name plates to be erected as per relevant drawing. However for the fire proof doors auto door closer, locking arrangement with name plates to be erected. CVS screen, wipers also to be erected including eye brows, holding arrangement. After erection fit up survey and Hose test to be to dept / QC / Class.
- 1.3 On completion of frame work E/R flooring, chequered plates to be fixed with CSK drill holes to facilitate to fixing CSK screw. As per requirement, necessary openings are to be cut for valves etc, Flap doors with hinge are to be provided. The chequered plates needs to be removed and fitted repeatedly to attend to the underneath works like, painting ,Insulation, Fitment of bilge covers etc.,The removal and re-fixing is part of the scope and requires to be attended till delivery. Erection of crane mounts to be attended as per drawings including vertical ladder erection and erection of jib rest and platform.
- 1.4 Erection, commissioning and testing of hydraulically operated hatch covers (fabricated by HSL) for cargo holds 1, 2, 3, 4, & 5. The erection is to be under taken strictly as per the drawings/instruction of controlling department.
- 1.5 All works shall be presented for inspection of QC representatives (HSL Engineers), Owners and MMD surveyors / Class as per the QAP/Drawing supplied.
- 1.6 The work shall be carried out by the contractor in co operation with Shipyard departments and other contractors on board the ship.
- 1.7 The contractor shall employ qualified / class approved welders to carry out welding wherever required. The certificates of qualified welders have to be submitted to QA dept. prior to commencement of work.
- 1.8 Skilled workers only shall be employed since the work is complicated in nature for maintaining the accuracy and neatness in assembling.
- 1.9 The required tools, instruments, welding equipment, all safety devices and gadgets etc., shall be arranged by the contractor.
- 1.10 The contractor shall employ sufficient number of experienced employees depending upon the work load time to time to meet the schedules of HSL.

Chief Manager (OC)

- 1.11 The contractor shall arrange inspection of works for the satisfaction of Shipyard personnel / owners / MMD / Class at different stages. A record of inspection is to be maintained by the Contractor and produce the same for obtaining completion certificates and arranging payment.
- 1.12 The contractor shall collect the required materials from steel stores & general store, and yard departments.
- 1.13 The contractor shall keep the working areas neat and shall handover useful scrap to the concerned department.
- 1.14 Contractor has to take complete responsibility of all the items / materials in respective works till handing over to HSL.
- 1.15 The contractor has to submit the plan prior to commencement of work and weekly status report is to be submitted with the details Reasons for slippage, if any, is also to be submitted on the weekly report.
- 1.16 Contractor shall be responsible to make judicious use of the materials supplied by HSL, and shall maintain a record of materials drawn and the areas where these materials are used, the same shall be shown to the concerned before drawing successive quantities.

2. INSPECTION AND SURVEY:

- 2.1 HSL reserves the right to inspect the job while in progress during execution by the representatives of Shipyard / Owners / Class contractor shall provide required facilities for such inspection.
- 2.2 The Survey remarks by Owners / Class shall be carried out by the contractor on top priority and remarks shall be presented for re-survey.

3. SCOPE OF WORK OF SHIPYARD:

- 3.1 Shipyard shall provide all the materials required for completion of work.
- 3.2 Shipyard shall provide drawings listed to carryout the work as required under contract.
- 3.3 The required paints and necessary electrodes will be issued by Hull Outfit Department.
- 3.4 Shipyard shall provide required facilities like lighting, power supply, crane lifts on receipt of prior intimation through the controlling department .The allotment will be subjective to availability.

4. GUARANTEE:

- 4.1 Contractor shall guarantee his work for the fabrication for a period of **12 months** from the delivery of the vessel and agree to repair / rectify any defects in workmanship are noticed during the guarantee period

Annexure I

HULL OUTFIT WORKS

S.NO	DESCRIPTION OF WORK	DRG NO	SCOPE OF WORK
1	Quick release device of life buoy	35016A	Erection
2	Accommodation Ladder & Pilot ladder arrgt	33301B	Erection
3	Mooring argt	30002A	Erection
4	Saet for Panama Chock	30003A	Erection
5	Seat for roller fair leader	30004A	Erection
6	Arrgt of Navigational Lights	81923A	Erection
7	Hand Rails & staircase in accommodation	24511A	Erection
8	Arrgt of metal door	33101A	Erection
9	Drg.List of Steel Weather Tight & Water Tight Doors.	33102 A	Erection
10.	Details of NWT door	33103 A	Erection
11.	Arrangement of steel doors with steps.	33100 A	Erection
12.	Arrgt. Of bunker hose davit	35009 A	Erection
13.	900kg Electrically driven crane (Ref Drg.)	35006 A	Erection
14.	0.2t suezcanal search light davit	35005 A	Erection
15.	Arrgt. Of mech. Vent for paint store	34102 A	Erection
16.	Mast & Signal Arrgt. (location)	35501 A	Erection
17.	Radar mast construction (detail)	35701 A	Erection
18.	Fore mast construction (Detail)	35702 A	Erection
19.	Panama shelters on bridge wing	36102 A	Fab & Erection
20.	Foundation/support for GRAB	32103 A	Fab & Erection
21	Seating arrgt.of composite boiler with top bracing	65014 A	Erection
22.	Fire Proof Doors.	22002– 22003	Erection
23.	Side Scuttles & Rectangular Windows & Windows for wheel House.	245115 A	Erection
24.	Steel Windows	24113 A	Erection
25.	Window Wipers & CVS	24114 A	Erection
26.	Fix Drawing of Window Wipers	24112 A	Erection
27.	Hatch Covers (Installation, survey Operation and Hose Test)	32003 C	Erection, commissioning and Testing
	Instruction of hatch Covers Installation	32010 A	
	Order fitting List fo Hatch Covers	32013 A	
	Tolerance ces requirement Camings(Hatch Covers)	32011 A	
	Hatch Cover working Drawing for hydraulics & electrical equipments	32004A	
	Arrgt of HPU for cargo Hold	30021 A	
28	Chequered plate grating in E.C.R	61116 A	Processing & Erection
29.	Arrgt of eye plates in Engine room	61400 A	Fab & Erection

Chief Manager (OC)

30.	Windlass Foundation	19203 A	Erection
31.	Mixed vent. Fixed louver	66080 A	Erection
32.	Foundation of emergency generator	19204 A	Erection
33.	Boiler Foundation	19201 A	Erection
34.	Stern lights aft pole	35703 A	Erection
35.	Working platform of windlass	30005 A	Erection
36.	Layout of cargo hold and forecastle ventilation	34104 A	Erection
37.	Engine Room Arrgt.	61100 B	Processing & Erection
38.	Arrgt of Mech. Vent For steering gear room	34103 A	Erection
39.	Ladder Arrgt. (Except cargo hold)	33502 A	Erection
40.	Small Hatch Cover Arrgt.(Supplied)	33601 A	Erection
41.	Working drawing for deck cranes	32101	Erection
42.	Extension for jib rest platform	32104,105	Erection
43.	Winch foundation	19202 A	Erection
44.	Arrgt of lashing eye on upper deck	36003 A	
45.	Arrgt.of Chain Releaser	18017 A	Erection
46.	Arrgt. of mech. Vent for hydraulic pump room	34105 A	Erection
47.	Side light seating	35704 A	Erection
48.	Ventilation arrgt.in E/R	66050 66056,66073 66021	Erection
49.	Arrgt.of Vent.for CO2 room		
50.	Arrgt.of Vent for emergency fire pump room		
51.	Arrgt.of Mech Vent for EM Generator room (reference Drg No.61000 B		
52.	E/R exhaust gas pipe suspension arrgt.	18021 A	Erection
53.	Details of MFG &Location of box for hold1,2,4&5	81943, WDS/043	Fabrication &Erection
54.	Handrail on upper deck and forecastle deck	33401 A	Erection
55.	Working Platform for winch	30006 A	Erection
56.	Magnetic Compass	35804	Fabrication & Erection
57.	Weather tight hinged covers	27308	Erection
58.	Addl.stiffening below upper deck I.W.O Mooring equipment.	WDS/11136 to 41/053A	Processing & Erection
59.	Foundation of electrical equipment.	80061 (pg-20)	Erection
60.	Arrgt for supporting pillars for side lights	18018	Fabrication & Erection
61.	Installation of drawing of fuel oil piping on upper deck	72101	Fabrication and Erection
62.	Arrgt of Tunnel Trolley	34100	Erection
63.	Seat for ER ventilation fans	19208	Erection

64.	Seat for AH Unit	19209	Erection
65.	Seat for refrigerator equipment	19210	Erection
66.	Seat for centrifugal flue gas fan	19211	Erection
67	Life boat and davit arrgt.	35003 & WDS 60	Erection
68.	Rescue boat davit and life raft davit arrgt.	35004	Erection
69	Stowage arrgt. & detail of rescue boat & davit	35017 A	Erection
70.	Stowage arrgt. Of life rafts	35011	Erection
71.	Life buoy hangers and S.I light fixing arrgt.	35015 A ReF. drg.	Erection
	Life saving appliances plan	35010 A	
73	Arrgt. of wharf ladder	35014 A	Erection
74	Supporting arrgt for grease trap	78214 A	Erection
75	Details of swimming pool ladders	33603 A	Erection
76	Arrgt. details of swimming pool	33602 A	Erection
77	Arrgt of Mech Ventilation for Pipe Tunnel	34101A	Erection
78	Installation of Hydraulic pipe coamings for hatch cover	32014A	Erection