

TECHNICAL SPECIFICATION

Sea Ambulance

GENERAL DESCRIPTION

The Sea Ambulance is a craft that shall suite to carry patients who need medical assistance to the nearest hospital or health care Center, if not to a nearest airport. The craft shall have good sea keeping stability that suites at least sea state 3 to 4. Since these vessels are to carry patients and medical staffs, we shall consider ease of handling, low operational and maintenance cost given the highest consideration in the crafts design and selection of equipment.

PRINCIPAL PARTICULARS

Vessel type : Mono hull
Hull material : Fiber Reinforced
Length over all : 37 – 40 ft
Speed : 35 knots or more at medium load

TANK CAPACITIES

Fuel oil : Minimum 800-1000 liters
Water tank : Minimum 200 liters

ENGINE AND STEERING SYSTEM

- Four stroke engines with Salt water series propeller (after sales service should be available in Maldives)
- Hydraulic Steering system including steering wheel with power assist
- Complete installation of engines with all required accessories

GENERAL FEATURES

- Hard Top double finishing
- Hull in complete white color gelcoat with fiber glass. (Double finishing reinforced hull).
- Minimum 03 coats Anti-fouling with undercoat as per manufactures guidelines (antifouling line should be 2 inches above water line)
- Nonskid flooring on deck
- Front Entrance door (Center opening minimum 2.5')
- Build in bow boarding steps with SS stand support
- Semi-closed cabin to be extended to the end of patient bed with windows with black tinted glass and rest of the area to be covered with canvas bungee loops
- Canvas covers (zips should be covered / protected from both side of canvas)
- Stainless steel hand railings where required
- SS swim ladder (Detachable) with fixing arrangements on transom.
- Fuel filling point with markings to be located on gunwale of the STBD side

- Fresh water filling point with markings to be located on gunwale of the port side
- Upholstered seating in green / blue with comfortable back rest and SS hand arm rest
- Water drying fire retardant carpet
- Maximum seating arrangements to be provided.
- Comfortable upholstered cushions for driver & crew and back rest with hand rail for both driver and crew seats (seating cushion thickness 08-inch)
- SS drain plates fixed where necessary
- Trim tab to be fixed on both sides of the rear end of the vessel
- Built in water bottle holders where necessary.
- Additional foldable step (material SS) to be fixed near patient door ship side
- Boat mirror (For Driver)
- D - fender to be fixed with SS bolts and SS nuts (D- fender joints to be located near bow)
- SS guard plate to be fixed on stem
- Fuel and water level sensors fixing arrangement to be made with coaming. Separate arrangement from deck to access fuel and water tank sensors must be provided. (window size: 1' x 1')
- Maximum allowed side storages
- Mobile phone USB charging ports near patient headboard
- Overhead cushion strips where necessary
- Install Deck plates where necessary

SEA AMBULANCE FEATURES

- “SEA AMBULANCE” painted in RED color on both sides of freeboard (Font; Arial bold, letter height 12’)
- “SEA AMBULANCE” painted in RED color on both front and rear of hardtop (Font; Arial bold, letter height 5’)
- Crescent painted in GREEN color on hardtop (Size; 5’)
- Crescent painted in GREEN color on both sides of entrance (Size; 16’)
- Crescent painted in GREEN color on both freeboards (Size; 20’)
- Sea Ambulance number painted in RED color on both sides near driver and crew seat (Font; Arial bold, letter height 6’)
- Pennant number painted in JET Black color on both sides of free board (Font; Arial bold, letter height 7’)
- Boat warning labels needs to be fixed where necessary. (First aid kit, Mind your head, Lifejacket, Sanitizer, Fire blanket, Fire extinguisher, No smoking etc.)
- Patient beds for both sides
 - 02 x fixed bed with upholstered cushion on both sides and storage compartments with drawers.
 - Tri-Foldable medical grade waterproof hospital mattresses for both beds (4-5inch thickness)
 - 02 x IV holders
 - Sanitizer stand / Holder (01 In Nos)

- 1x DC and 1x AC waterproof power outlets with universal pins to be fixed on both head boards.
- Oxygen and suction outlets on head board of patient beds
- Railings for both beds on hard top. To provide removable curtains with Velcro for both beds.
- Gas piping arrangements for patient beds
 - Low pressure hoses for medical gases
 - Maximum working pressure 14 bar
 - Hoses to be marked for gas type
- Mediconnect for patient beds
 - To be resistant to abrasion and change of color
 - Latex and phthalate free
 - Containing antistatic inner layer
- Fixed lighting arrangement for patient beds with switches.
- Patient bed panel
 - Oxygen terminal unit
 - Vacuum terminal unit
 - 2 Nos Universal power socket 16 A
 - 2 Nos Universal power socket 13 A
 - USB port
- Provide easy and safe boarding arrangement for patients from port side. (Door fixed on hardtop with hydraulic jacks and safety locks)
- Additional 50W LED light to be fixed on the hard top facing the engines.
- 04 x LED lights to be fixed in the cabin.
- Arrangement for a storage for 2 Nos oxygen cylinders with inter changeable connections

PRINCIPLE FEATURES

- Blue LED beacon bar (1'x1' size) visibility minimum 4 NM
- Electric horn
- Deck cleats, two on forward, two on aft cock pit and two on amid ship (8-12 inch)
- Bow U-bolt clamp
- Sliding pilot side windows
- Front wind screen wipers system with splashing mechanism.
- Deck wash with outlet shower fixed on PORT shipside rear entrance flushed to hull (Pipe length 50 Ft)
- Drawer fridge 30 liters
 - Auto switching 12-24 V DC
 - Capacity 30 liters
 - Internal LED light
 - Temperature range +8⁰ C, -8⁰ C
- Engine flush plumbing arrangement with valve and taps
- 04 x Deck lights

- Natural ventilation for aft bilge area
- Embedded dustbin in toilet and in patient bed area

ELECTRICAL SYSTEM

- 2 x 12V DC outlets for mobile charging (300-500W power inverter)
- Batteries for general service, port and starboard engine and change over switch with common position support
- Separate power supply arrangement to be provided for 2 in Nos AC outlets near patient beds
- Deck wash shower pump

NAVIGATION

- 01 x Compass with light (Plastimo offshore 135)
- 01 x Minimum 9"-12" touch display, Radar, Chart plotter and GPS combo unit (should be serviceable in Maldives)
- 01 x Marine VHF set with antenna
- Full set of navigation lights
- 01 x RC led Search light

ENTERTAINMENT SYSTEMS

- Marine grade music player with Bluetooth and FM function

HELM CONSOLE

- Console in white gelcoat (black top surface for anti-reflection) with ventilation facility in place (grill type)
- 2 Nos DC USB outlets for phone charging
- Natural ventilation arrangement for helm console.
- All necessary controls and display arrangement to be provided
 - PORT and STBD engine display
 - Navigation light switch
 - Search light switch
 - Cabin light switch
 - Deck light switch
 - Stern light switch (Engine service light)
 - Water Pump switch
 - Bilge pump switches
 - Blower switch
 - Wiper controls

- Trim tab gauge and controls
- GPS and Rader display with power on/off switch
- Engine throttle
- Fuel tank level gauge
- Water tank level gauge
- Switch panel 12V DC with marine breakers
- Battery voltage indicator digital

TOILET

- 01 x Marine electric Toilet
- Entrance door with locking arrangement on both side
- 01 x Wash basin with fresh water tap
- 01 x Toilet Mirror
- Ventilating blower
- Sky shower
- Proper lightings with switches
- 01 x Hand shower
- 01 x Hand support rails
- 01 x SS Toilet Roll Holder
- 01 x SS Towel Hanger
- Additional step if necessary

FIRE EXTINGUISHING

- 2 x portable fire extinguishers embedded to hull inside cabin in closed boxes and installed in easily accessible areas (the doors of the boxes to be modified so that it will not crack or break easily)

BILGE

- 02 x Automatic electric bilge pump in necessary compartments (Pump Capacity: 2000-3000 gph)

SAFETY EQUIPMENTS

- 15 x Inflatable life jackets with automatic inflatable mechanism (Adults)
- 04 x self-inflatable life jackets for kids
- 01 x First Aid kit
- 02 x Fire blanket to be fitted
- 02 x Life Ring (one fitted / flushed behind rear seat & one fixed inside cabin)

- 01 x Flag set (CB – 5)
- 01 x Torch light (water proof)
- 02 x Buckets (08 Liter)
- 01 x Anchor (14 kg Danforth ss)
- 01 x Hand mirror (small)

TOOLS

- 01 x Oil extractor pump to change engine oil
- 01 x Wrench set (sizes 8-24 mm)
- 01 x Wrench (size 27 mm)
- 01 x Allen key set (7 pcs)
- 01 x Tool box (18")
- 01 x Ratchet wrench
- 01 x Adaptor for extension (6")
- 01 x Nose plier
- 01 x Plier
- 01 x Adjustable Spanner 12"
- 01 x Adjustable Spanner 06"
- 01 x Socket set (sizes 8-24)
- 01 x socket (size 27 mm)
- 01 x Deep socket (size 14 mm)
- 01 x Screwdriver set
- 01 x Screw driver big (-),
- 01 x Screw driver big (+)
- 01 x Universal piece
- 01 x Hammer 1 lb
- 01 x Grease gun (flexible nozzle)
- 01 x Silicon gun
- 01 x Oil Filter wrench (for fuel filter)
- 01 x Strap wrench
- 01 x Line tester
- 01 x Cable cutter
- 01 x More gripper (medium size)

MISCELLANEOUS

- 02 x F-4 Fenders
- 02 x F-5 Fenders
- 01 x 100ft 14mm Rope for berthing (Yacht Rope)
- 01 x 150ft 16mm Rope for anchor
- 01 x 50m Flexible hose reel
- 01 x Boat hooks

- Snorkel, Mask, Fins (03 sets)
- 02 x Aluminum foil foldable wind shield reflector
- 01 x Rain – x wind screen washer
- 02 x beach towels.
- 01 x grease tin
- 04 x Raincoats with glow tape (2 piece) (with sea ambulance label printed behind the raincoat)
- Hull plate with the necessary information to be fixed in the boat.

WARRANTY AND OTHER DOCUMENTATIONS

- Hull
 - Minimum 5 years Supplier or shipyard warranty from the date of delivery. All warranty documents issued by the manufactures for property articles shall be transferred to the owners.
 - Any repair on hull or superstructure that is raised from non-abusive usage, to be attended by the supplier or the shipyard promptly, within a reasonable scope.
- Engines
 - 1 Year warranty from the date of delivery.
 - Engines are to be procured with full consent of local agent in Maldives with all services and warranty issues being obligatory to such parties, if not supplier shall provide the necessary arrangements in obtaining the services and warranty issues.
- Equipment and accessories
 - 1 Year warranty for all equipment's and machineries installed onboard.
 - All necessary warranty documents, manuals to be given to the owners at the time of delivery.
 - Operational and service manuals for necessary equipment

Thank You