**AKILARIA 950** 

Architects: Lombard Marc

LOA: 9.50 m B0A: 3.69 m Draft: 2.40 m

Displacement: 2700 kg

Water ballast: 2 tanks each side, total 450 liters per side

Ballast: 950 kg

Upwind sail area: 80 m<sup>2</sup> Downwind sail area: 155 m<sup>2</sup> Motor: 21HP NANNI diesel.

Appendages: fixed center line keel and twin rudders.

Construction: Foam and balsa sandwich with glass and vinylester resin using the

infusion process.

Certification: European CE, category A

Class Association: Class 950

### **Construction:**

THE AKILARIA 950 is built from female tooling. The hull is infused using vinylester resin, glass and balsa core. The deck is infused using vinylester resin, glass and foam core. All the internal structures, transverse and longitudinal bulkheads are infused using vinylester resin, glass and foam cores. The centerline structure and keel box area are built using the infusion process and are solid glass and vinylester resin.

Plexus (méthacrylate) adhesive is used through-out. This material guarantees a mechanical as well as chemical bond. The deck to hull joint is also glued together with Plexus. All stanchions, pushpits and pulpits are through bolted through the hull to deck joint. All the internal structures are in composite: bunks, furniture, etc. Every piece and component is carefully built. A comprehensive practice of weighing each part during the building process is used to guarantee that each boat is the same.

#### **Steering System:**

Upper and lower self-aligning JP3 bearings. Centerline, bearing supported jump shaft incorporates twin tiller arms. Port and starboard adjustable con-rods attach centerline tiller arms to rudder stocks. One centerline tiller with extension controls both rudders. Rudder stocks are built in F16PH stainless steel. Stock diameter is 44 mm to align with rudder profiles.

### **Deck and Cockpit:**

The cockpit was conceived in order to optimize the ease and efficiency of sailing maneuvers for either single handed or crewed sailing. The center line tiller is equipped with a large bearing and Spinlock tiller extension to give the helm nice response and make driving fun. Cockpit tooling, including seats, helming station, foot rests and line organization have been designed and laid out to optimize ergonomics and sailing enjoyment. Transom security has been established with

a central arch stanchion spanning the life raft box which can also be used for antennas and the LED stern light. Pushpits on each aft outboard corner allow for secure attachment of double life lines. All stanchions are fabricated in 316L stainless steel.

## **Ballast System:**

Total ballast tank volume each side equals 450 L.

214 L in the forward tank and 236 L in the aft tank.

Each tank is provided with a water tight inspection hatch.

Tanks are filled via a centerline SoFoMarin Scoop and electric pump. Transfer and dump are via gravity.

# **Mast and Rigging:**

Double spreader swept back carbon fiber mast. Mast built by Lorima of pre-preg carbon under vacuum in an autoclave. Spreaders and main boom are built of aluminum, anodized black. Lateral rigging and headstay are rod. Two running backstays per side plus staysail stay are Kevlar. Staysail stay has 2:1 adjustable tackle at base to maintain correct rig tension.

# Running rigging is Dynema:

One main halyard

One genoa halyard

Two spinnaker halyards

One staysail halyard.

Bobstay

Two reef lines

One main sheet

Outhaul for main boom

Two genoa sheets

Two traveler lines for main sheet traveler.

Two running backstay tails.

Adjustable tackle for staysail stay.

Three control lines per side for floating ring sheeting system on solent.

Two spinnaker sheets.

One tack line

Two barber hauler set-ups.

#### **Hardware:**

Harken winches. Two B40-2STA on the cabin top and two B44-2STA in the cockpit. All blocks and organizers are Harken. The rope clutches are Spinlock and the pad eyes are Wichard.

The keel fin is a fabricated, welded rectangular box structure of E 36 steel. The bulb is lead. The fin is shaped with foam leading and trailing edges, faired and glassed over with epoxy resin. The final profile is carefully developed and faired using accurate templates.

Anchor and chain stowed in a drained, forward compartment under hinged deck panel.

## **Engine**

Engine is a Nanni 21 Hp diesel fitted to a saildrive. The sail drive foundation is integrated in to the hull structure. Engine control is Spinlock. Fuel capacity is 53L aft of engine under cockpit sole. Two bladed folding propeller.

#### **Electrics:**

70Amp, 12VDC Balmar alternator. BEP 12 position circuit breaker panel and battery switches. Two 12VDC, 120 amp hour AGM batteries for the house bank. One 12VDC Optima AGM battery, 50 amp hour for engine start. One LED Hella white and red chart table light. One 12VDC charger receptacle. Eight LED battery operated LED lights to be positioned anywhere by Velcro.

## Interior:

Forward compartment - water tight bulkhead with composite watertight hatch at forward end. Compartment is used for sail stowage and has marine head at aft end to port and sink and cabinet at aft end to starboard with pressurized cold water.

Main saloon area has settee bunk port and starboard, with centerline table. Lewmar opening hatch in cabin top. There are two 55 L water tanks, one under each settee bunk.

Aft of main saloon there is a galley to port and nav station to starboard. The nav station has a hinged extension seat that can be used to gain seat width. There is stowage under the chart table as well as outboard. The forward vertical face of the nav station has adequate room for fitting instrumentation. Opposite to port is the galley with deep stainless steel sink that has both cold pressurized fresh water and hand pumped salt water. There is a two burner gas stove with oven and a top opening ice box. There is stowage under the sink, under the stove and outboard.

Aft of the galley / nav station there are port and starboard bunks accessible via full height walk through elliptical cut outs in the main bulkhead. There is a filler piece with cushion that connects these two bunks, under the cockpit sole to make a double for use in port. There are two Lewmar opening port lights in the cabin side, one port and one starboard.

There is one electric and one manual bilge pump.