

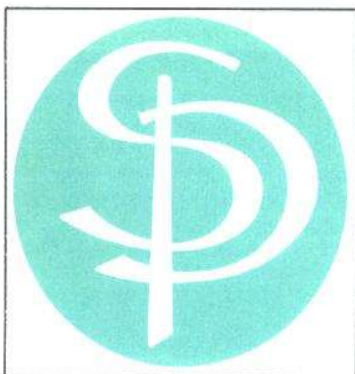
Sailor Tandem Station

Only station in the world
with full back-up on all facilities

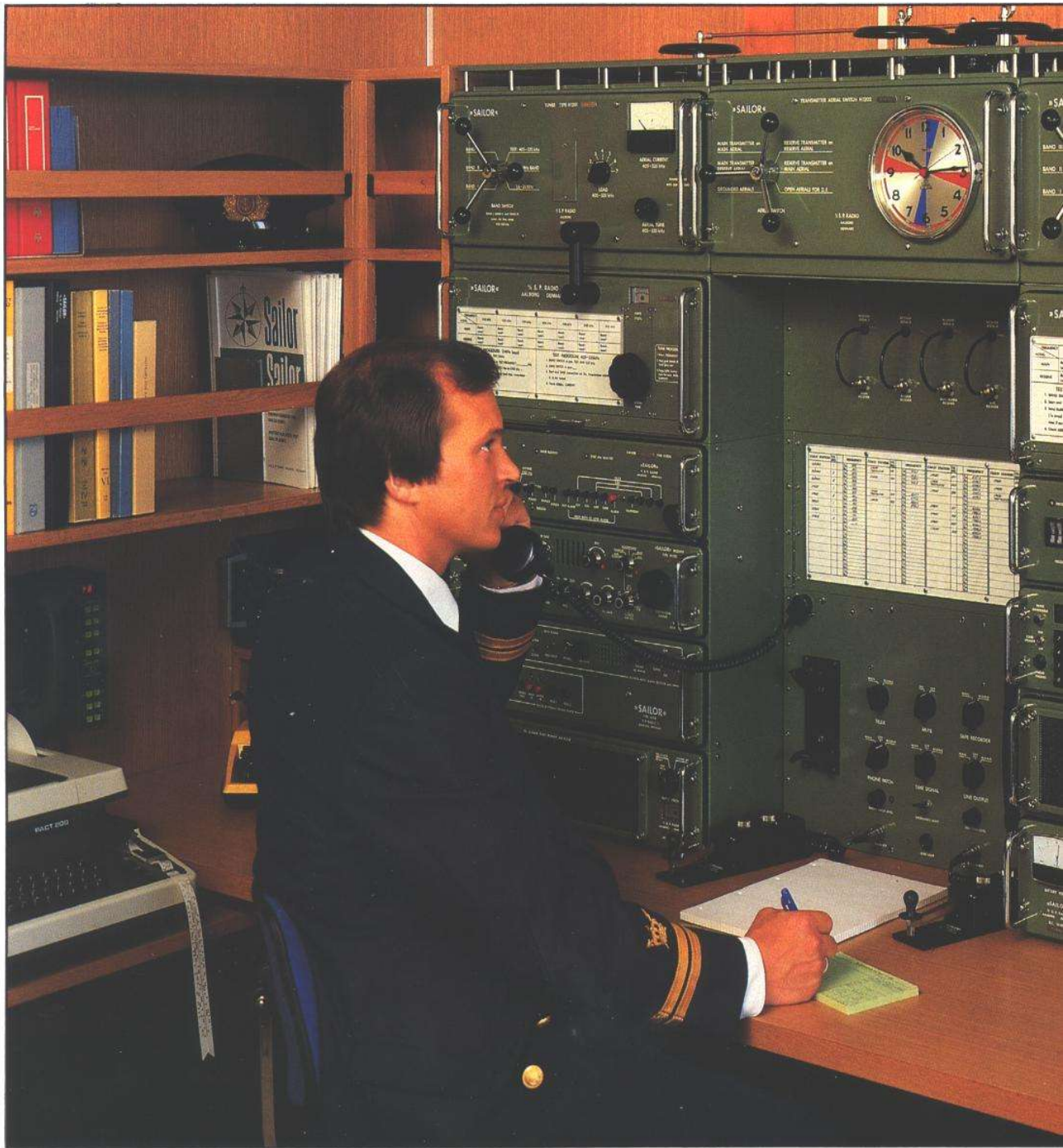


Sailor

Main
Radio Station
Programme 1000



S.P. RADIO A/S · AALBORG · DENMARK



Introduction

Sailor Tandem Station is developed and produced in Europe's leading factory dealing in maritime radiotelephones, with an annual output exceeding 20,000 sets.

Years of experience with SSB radiotelephone equipment working in the most harsh environments has enabled S. P. Radio to develop the SAILOR short wave programme 1000 which is one of the most popular short wave stations in the world.

Unique Concept

Sailor Tandem Station is built-up of the well-known mass produced units from the SAILOR short wave programme 1000 providing the renowned SAILOR performance and reliability for good world-wide service and the benefit of an economically priced main radio station.

Sailor Tandem Station is also unique in the fact that the communication possibility has been duplicated. Main transmitter and reserve transmitter are equally powerful and have the same facilities, and it is therefore unimportant which transmitter or receiver is used. Interchangeability of units can be made if required.

Long Range Coverage

The transmitter has an output power of 800 Watt PEP measured according to CEPT specs. The measured «talk power» which is the maximum power the transmitter gives in the speech peaks is about 1200 Watt PEP. This is achieved by a combination of a soft anode voltage together with a regulation of the screen grid voltage depending on modulation, and a modulation limiter which is a combination between a compressor and a clipper. The high efficiency of the unique aerial tuning circuit and the perfect tuning to the aerial under any condition together with the above mentioned fact of a bigger mean power give this transmitter just as great a range as most stations rated at 1500 Watt PEP, and in many cases it will exceed their performance.

These design principles have made it possible to minimize the current consumption of the transmitters enabling the main and reserve transmitter to be identical, and being powered by an emergency battery of medium capacity.

To ensure long range reception and good duplex performance the receiver is provided with a specially designed front end with high order tunable RF filters which give exceptionally good large signal capabilities and easy matching into the aerial conditions prevailing on board ships.

Sailor Tandem Station

- Exceeds IMCO's SOLAS regulation and complies with CEPT and UK MPT requirements.
- Based on tried and proven SAILOR short wave programme 1000 units.
- SAILOR short wave programme 1000 one of the most popular short wave stations in the world.
- World wide service because of well-known SAILOR programme 1000 units.
- Capable of full world-wide communication even on reserve transmitter and receiver.
- Reserve transmitter and receiver have identical communication facilities as the main equipment with full output power.
- In the event of mains failure the reserve transmitter and receiver give 100% back-up.
- Pre-wired to accept telex, ships automatic telephone system and tape recorder from either main or reserve station.
- Pre-wired console for ease of installation.

SOLAS Main Radio Station

Sailor Tandem Station is built-up of the following units from SAILOR short wave programme 1000, which exceeds IMCO's requirements for SAFETY OF LIFE AT SEA (SOLAS) and complies with the most demanding requirements such as UK MPT and CEPT.

Sailor H1201 Main and Reserve 500 kHz Tuner

With built-in dummy load for 400 - 535 MHz and 2 MHz bands. Can in an emergency situation be tuned to any antenna just by setting the controls on the front.
Output power 500 kHz band: 10 Amp. in 400 pF and 4 ohm.

Sailor H1202 Transmitter Aerial Switch

Complies with SOLAS and national requirement for switching, closing and opening of the aerials.
Has built-in clock marked with W/T and R/T silence periods.

Sailor H1218 Automatic Keying Device & Auto Alarm Receiver

Sends radiotelegraph alarm signal and distress signal followed by the ships call signal. Auto alarm receiver with built-in loudspeaker for 500 kHz watch keeping purposes.

Sailor T1127L Main and Reserve Transmitter

Output power 500 kHz band: 10 Amp. in 400 pF and 4 ohm.
Output power 1.6 - 4 MHz: 400 Watt PEP.
Output power 4 - 26 MHz band: 800 Watt PEP (1200 Watt »talk power«).

Sailor S1301L Main and Reserve Exciter

All frequencies in the maritime bands from 410 kHz - 26 MHz.
Modes: A3J - A3A - A3H - A2H - A1 - Telex.
Frequency stability 0° - 40°C less than ± 25Hz.
Built-in 2182 kHz two tone alarm signal generator.

Sailor R1120 Main and Reserve Receiver

Frequency range 10 kHz - 30 MHz.
Modes: A1 - A2 - A2H - A3 - A3H - A3A - A3J - F1 - 2.4F4.
Frequency stability: 0° - 40°C less than ± 25 Hz.

Sailor N1400 DC Power Supply

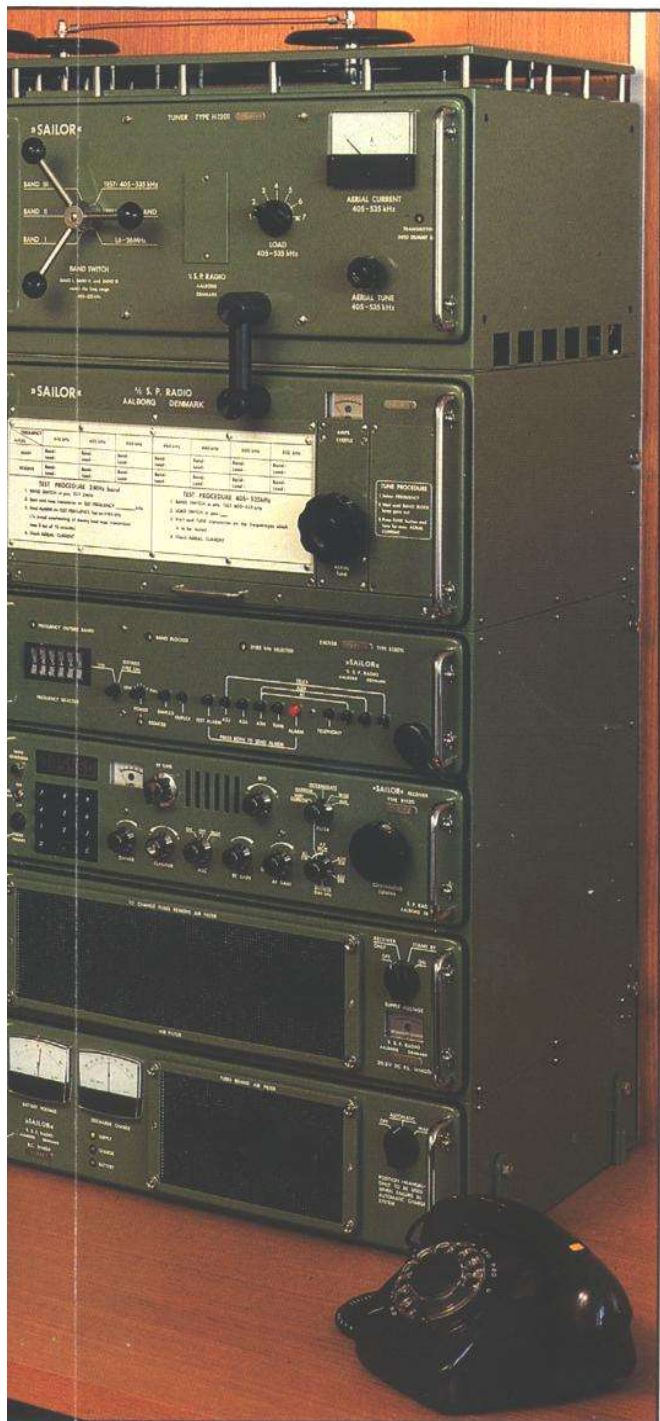
24V DC from battery.

Sailor N1401 AC Power Supply

110/127/220/237V AC from mains.

Sailor N1404 Battery Charger

40 Amp. automatic charging.
105 - 140V AC one version.
205 - 265V AC one version.



Installation

Sailor Tandem Station is the simplest and most compact desk top installation ever seen.

The station is provided with a mounting plate, where all connections are placed in the CENTER SECTION on terminal blocks. Only external connections are required to these blocks, making for an easy, low cost installation.

Center Section

Between the two - from communication point of view - identical stations, all shipborne supplies and connections to ancillary equipment are placed to obtain easy installation and service.

The ancillary equipment such as Telex - Facsimile - Tape recorder and Phone Patch can quickly be switched from the main station to the reserve station.

This unit also includes the transmitter aerial switch H1202 which complies with SOLAS and national requirements for switching, closing and opening of the aerials for D/F purposes etc.

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Center Panel H1222

Telex

The Simplex TOR equipment can be switched from the main transmitter and receiver to the reverse transmitter and receiver.

Phone Patch

The ships automatic telephone exchange can be connected to either main or reserve equipment for duplex radiotelephone link calls.

Phone Patch Level

Adjustment of interphone level so that the lamp is just flashing.

Mute

ON: Both main and reserve receivers are muted from the transmitter in operation (with full break-in).

OFF: The main receiver is muted from the main transmitter. The reserve receiver is muted from the reserve transmitter.

Time signal

An external loudspeaker in the chart room or on the bridge can be connected to the main or reserve receiver.

Tape Recorder

For tape recording from the main or reserve receiver.

Line Output

Output from the main or the reserve receiver for auxiliary amplifier equipment.

Side Tone Level

Level of side tone when key down.

Lead Light

For connection of lead light or a small solder iron (25 Watt).



Receiver Aerial Selector Panel

Possibility for selection of four aerials to the receiver.

Incorporating four SAILOR Receiver Protecting Units H1223 which protect the receiver front end against power from near-by transmitter antenna and secondary lightning effects.

Technical Data H1222

Phone Patch

AF output to telephone line 100 mV ± 2 dB/600 ohm.
AF output from telephone line..... 150 mV ± 15 dB/600 ohm.

Line Output

AF output from Receiver 400 mV ± 3 dB/4,7 kohm

Time signal

AF output from Receiver 4 Watt/8 ohm

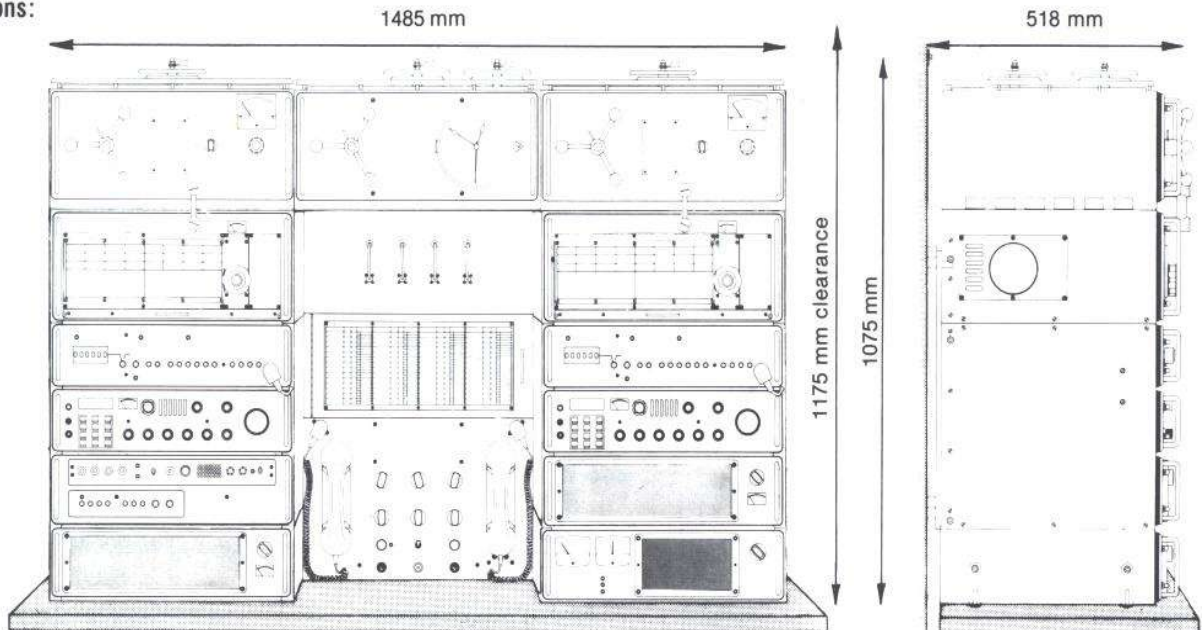
Telex

AF output from Receiver 700 mV ± 2 dB/600 ohm
AF input to Transmitter 350 mV ± 10 dB/600 ohm
TT from TELEX 24 V 50 mA
Teleprinter start (High tension ON) 24 V 13 mA

Tape Recorder

AF output from Receiver 20 mV ± 3 dB/4,7 kohm

Dimensions:



Desk top installation

Notice:
Extreme compact dimensions

