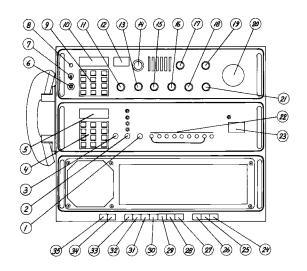
CONTENTS:

CONTROLS

OPERATING INSTRUCTION FOR DISTRESS CALL

OPERATING INSTRUCTION FOR TELEPHONY ETC.



CONTROLS:

1) DIMMER

Controls the light intensity from the DISPLAY and the AERIAL CURRENT meter.

(2) POWER REDUCTION

Reduces the output power to less than 60W in four steps.

(3) DISTRESS (2182 kHz)

Switches between fixed 2182 kHz, external frequency control and frequency control from KEYBOARD (4).

(4) KEYBOARD

Enters the frequency into the frequency synthesizer. The frequency shall be entered in kHz, and only if a fractional kHz is wanted it is necessary to activate the decimal point key. Before a new frequency is entered, and if a wrong figure is keyed all the display is cleared by means of the clear key C.

(5) <u>display</u>

Displays the keyed figures and finally the actual transmitting frequency.

(6) HEADPHONES

Receptable for headphones.

1 LOUDSPEAKER ON/OFF

Switches ON or OFF the loudspeakers.

(8) NOISE GENERATOR

Removes the keyboard controlled receiver blocking and the aerial, and activates the built-in noise generator.

9 KEYBOARD

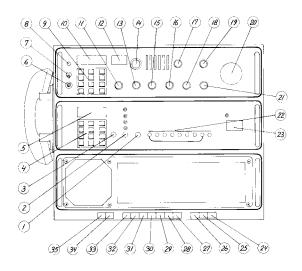
Enters the frequency into the frequency synthesizer. The frequency shall be entered in kHz, and only if a fractional kHz is wanted it is necessary to activate the decimal point key. Before new frequency is entered, and if a wrong figure is keyed all the display is cleared by means of the clear key C. After clearing and keying in a new frequency, the receiver is blocked. Furthermore the zero key and the decimal point key controls the CONTINUOUS TUNING (20).

(10) DISPLAY

Displays the keyed figures and finally the actual receiving frequency.

(11) DIMMER

Controls the light intensity from the DISPLAY and the METER.



(12) METER

Shows the field strength of the incoming signal.

(13) CLARIFIER

Provides incremental tuning over a +150 Hz frequency range.

(14) RF TUNE

Tunes the band filter to the chosen frequency.

(15) <u>ag</u>

Changes between slow (ON) and fast (TELEX) release time for the SSB AGC system. or switches off the AGC.

(16) _{rf gain}

Controls the overall RF amplification in the receiver.

17) _{be}o

Adjusts the beat note in A1 mode.

(18) af gain

Controls the AF output and turns the mains on/off.

(19) _{FILTER}

Chooses the wanted bandwidth in A1- and A2 mode, and disables the BFO in the AUX. position.

20) continuous tuning

is activated by pressing the decimal point key on the KEYBOARD $\{9\}$, and tunes over the full frequency range. The tuning wheel can be disabled by pressing the zero key on the KEYBOARD $\{9\}$

(21) MODE SWITCH

Switches between reception of fixed 2182 kHz (Distress), A3J - (A3J and A3A), A3H - (A3H and A3), A2 (A2 and A2H) and A1 signals.

(22) _{test} alarm

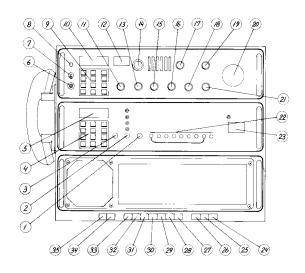
Starts the two tone alarm signal generator. The signal can be heard in the microtelephone.

A3J, A3A, A3H, A1, A2E, TELEX

Selects transmission mode.

SEND ALARM

Keys the transmitter and transmits the two tone alarm signal when TEST ALARM is activated simultaniously.



TUNE

Starts the automatic tuning system of T1130 and AT1500.

AERIAL CURRENT

Shows the current at the aerial insulator of AT1500.

ON

Switches on the complete set.

RX ONLY

Switches on the receiver

26 OFF

Switches off the complete set.

(27)DUMMY LOAD/HEAT

> When the set is in position ON (24)the aerial coupler will be set up as a dummy load and no power will be transmitted from the aerial. The dummy load will only work from 1800 kHz to 1999 kHz and from 2200 kHz to 2399 kHz. The transmitter will be blocked when a frequency in between 2000 kHz and 2199 kHz is selected, e.g. 2182 kHz.

> When the set is in position RX ONLY (25) or ON (24) and unkeyed the aerial coupler will be heated up to get it dryed out.

D.F.

Disconnects TX aerial from AT1500 and disables the transmitter.

GROUND AERIAL

Connects TX aerial to ground and disables the transmitter.

ONE AERIAL SIMPLEX NARROW

Transmitter connected to TX aerial, receiver blocked. TX keved:

TX unkeyed: Receiver unblocked and connected to TX aerial via aerial coupler AT 1500. This position gives better sensitivity and better front-end selectivity of the receiver. Can only be used when RX and TX frequencies are the same.

ONE AERIAL SIMPLEX NORMAL

Transmitter connected to TX aerial, receiver blocked. TX keved:

TX unkeyed: Receiver unblocked and connected to TX aerial.

TWO AERIALS SIMPLEX

Transmitter connected to TX aerial, receiver blocked.

TX unkeyed: Receiver unblocked and connected to RX aerial.

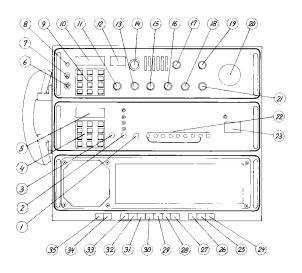
TWO AERIALS DUPLEX

TX keyed: Transmitter connected to TX aerial, receiver unblocked and connected to RX aerial.

TX unkeyed: Receiver unblocked and connected to RX aerial.

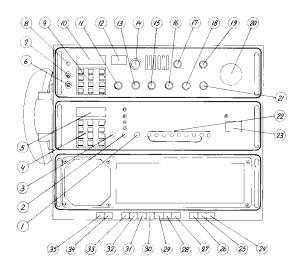
- (34) AUX
 - Faciliates a make or brake contact for special purposes. Connection terminals are located in the connection box H1233.
- (35) EXT. LOUDSPEAKER

Switches on or off the external loudspeaker(s).



OPERATING INSTRUCTIONS FOR DISTRESS CALL

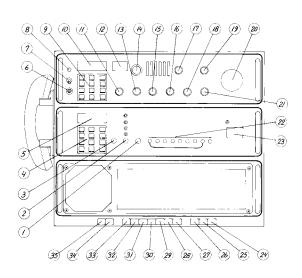
- 1. Activate the ON (24) button and the one aerial SIMPLEX NARROW (30) button.
- 2. Turn the RF GAIN (16) fully clockwise.
- 3. Turn the MODE SWITCH (21) to pos. Distress 2182 kHz.
- 4. Turn the AGC SWITCH (15) to pos. ON.
- 5. Turn the AF GAIN (18) to suitable volume.
- 6. Turn the DISTRESS SELECTOR (3) to Pos. DISTRESS 2182 kHz.
- 7. Activate the TUNE (22) button.
- 8. Activate simultaniously the buttons TEST ALARM and SEND ALARM (22)
- Take the handset, wait until the alarm signal disappears in the earphone, then press the key and make your distress call (MAY - DAY name of ship - position etc.).
 - If you want to interrupt the transmission of the alarm signal to make a distress call, then press the A3H (22) button, press the key and make your distress call.
- 10. Release the handset key and listen for an answer.



OPERATING INSTRUCTIONS FOR DISTRESS CALL WITH MANUEL TUNING

When failure of automatic tuning use the following procedure!

- 1. Activate the ON (24) button and the one aerial SIMPLEX NARROW (30) button.
- 2. Turn the RF GAIN (16) fully clockwise.
- 3. Turn the MODE SWITCH (21) to pos. Distress 2182 kHz.
- 4. Turn the AGC SWITCH (15) to pos. ON.
- 5. Turn the AF GAIN (18) to suitable volume.
- 6. Turn the DISTRESS SELECTOR (3) to Pos. DISTRESS 2182 kHz.
- 7. Remove air filter on Transmitter T1130.
- 8. Set the switch on T1130 (placed in the top right corner) to pos. MAN.
- Place the TUNING INDIKATOR (the fork) on the aerial insulator on the Aerial Coupler AT 1500.
- 10. By means of the Tuning Wrench tune for max light in the TUNING INDICATOR.
- 11. Set the switch on T1130 (placed in the top right corner) to pos. AUTO.
- 12. Activate simultaniously the buttons TEST ALARM and SEND ALARM (22)
- 13. Take the handset, wait until the alarm signal disappears in the earphone, then press the key and make your distress call (MAY - DAY name of ship - position etc.).
 - If you want to interrupt the transmission of the alarm signal to make a distress call, then press the A3H (22) button, press the key and make your distress call.
- 14. Release the handset key and listen for an answer.



OPERATING INSTRUCTIONS FOR TELEPHONY - TELEGRAPHY - AND TELEX

SAILOR R1120 can receive in the frequency range 10 kHz - 30 MHz.

SAILOR S1303 can be set for any frequency in the ranges 1.6 - 4.299 MHz and the 6-8-12-16-22-25 MHz maritime HF bands.

TELEPHONY

- 1. Switch on the station by activating the ON (24) button
- 2. Switch loudspeaker ON/OFF (7) to pos. on.
- 3. Turn the RF GAIN (16) fully clockwise.
- 4. Turn the MODE SWITCH (21) to wanted reception mode.
- 5. Turn AGC SWITCH (15) to pos. ON.
- 6. Key in the wanted frequency on the KEYBOARD (9).
- 7. Set the CLARIFIER (13) to center pos.
- Press NOISE GENERATOR (8) and tune RF TUNE (14) for max. METER (12) deflection.
- 9. Turn the AF GAIN (18) to suitable volume.
- 10. If the received signal is a SSB (A3J) signal the CLARIFIER (13) is to be set for max. clearness.
- 11. If necessary the RF TUNE (14) can be fine adjusted on the received signal.
- 12. If the reception of SSB (A3J) signals is disturbed by noise from rigging etc., turn the AGC SWITCH (15) to pos. TELEX and turn the RF GAIN (16) counter clockwise until the volume just decreases.
- 13. Turn DISTRESS SWITCH (3) fully counter clockwise.
- 14. Key in the wanted frequency on the KEYBOARD (4)
- 15. Turn POWER SWITCH (2) fully clockwise,
- 16. Activate the TUNE (22) button and wait until the TUNE lamp switches off.
- 17. Select transmission mode by activating the MODE (22) button in question.
- Select simplex or duplex by activating one of the buttons (30) (31) (32) and (33)
- 19. Key the transmitter by means of the handset key.

TELEGRAPHY

- Execute points 1 17 inclusive as described in section TELEPHONY except for:
- Turn the MODE SWITCH (21) to either A2 or A1 mode and select bandwidth by means of the FILTER SWITCH (19).
- 3. Adjust beat note in A1 mode by means of the BFO (17).
- 4. Select A1 or A2H by means of the MODE (22) buttons.
- Select the desired simplex mode by activating one of the buttons (30) (31) and (32).
- 6. Key the transmitter by means of the telegraphy-key.

TELEX

 Execute points 1 - 16 inclusive as described in section TELEPHONY except for:

IMPORTANT: The working frequency for Simplex TOR communication is given as assigned frequency (centerfrequency for the modulation). Set the FREQUENCY SELECTOR on the Receiver and Exciter to the assigned frequency minus the modulation centre frequency. Depending of your Simplex TOR equipment the modulation centre frequency is 1.5 kHz $^-$ 1.7 kHz or 1.9 kHz.

2a Telex filter fitted:

Turn the MODE SWITCH (21) to pos. A1 and the FILTER SWITCH (19) to pos. AUX.

2b Without telex filter:

Turn the MODE SWITCH (21) to pos. SSB (A3J).

- 3. Select telex mode by means of the TELEX (22) button.
- Select the desired simplex mode by activating one of the buttons (30) (31) and (32).
- The transmitter and the receiver is now controlled by the Simplex TOR equipment.