

S-50B transmitter unit

Polish S-50B suitcase set

Country of origin: Poland

DATA SUMMARY

Organisation: 2nd directorate of the General Staff of the Polish Armed Forces.

Design/Manufacturer: Experimental Department at the Military Institute of Communications, Warsaw.

Year of introduction: 1980s.

Purpose: Agents, military intelligence, possibly diplomatic service.

Transmitter:

Frequency coverage: 3.5-14 MHz in two ranges: 3.5-7 and 7-14MHz. Crystal control or separate synthesiser unit. Hand speed and high speed CW.

RF output: 25W.

Valves: ECF82, EL90, 6146A.

Aerial: Wire and counterpoise on spool.

Power Supply: Separate AC Mains power unit.

Dimensions (cm):

Height 4.9, length 12, width 16.9 (S-50B).

Accessories: Morse key, aerial wire and counterpoise on spool, and an unknown type high speed Morse keyer.

REMARKS

The S-50B was a small but powerful short wave transmitter believed to be known as 'Channel transmitter'. It formed the basis of two Polish agents and military intelligence radio stations: S-50B-S and S-50B suitcase. The CW Morse transmitter was developed and built around 1970/71 based on a copy of a FS-7 from the Federal Republic of Germany, captured by Polish counterintelligence. At first glance the similarity to the West German FS-7 (and the East German SE 25 copy) is apparent. Its purpose can only be speculated which leads to the belief that it might have been used by special forces, agents, and possibly diplomatic service. Construction of the transmitter and power supply unit was professionally done. It is remarkable that the frequency coverage was related to the 80/40 and 20M amateur radio bands. The Polish suitcase set comprising a S-50B transmitter was developed in the 1980s. It was complemented with an unknown type of high speed Morse keyer, and a synthesiser unit similarly as used with the S-50B-S station (See Chapter 331). It was noted that S-50B stations were used during trials with the M-135 and M-135P in the early 1980s.

References:

Photographs, research, and information for this chapter was kindly provided by Bogdan Szkudlarek, SP3LD, Poland.



General view of the S-50B Polish suitcase with the transmitter and AC mains power supply unit in position. Missing in this photo is the synthesiser and an unknown type of high speed Morse keyer.

Origin of the S-50B transmitter

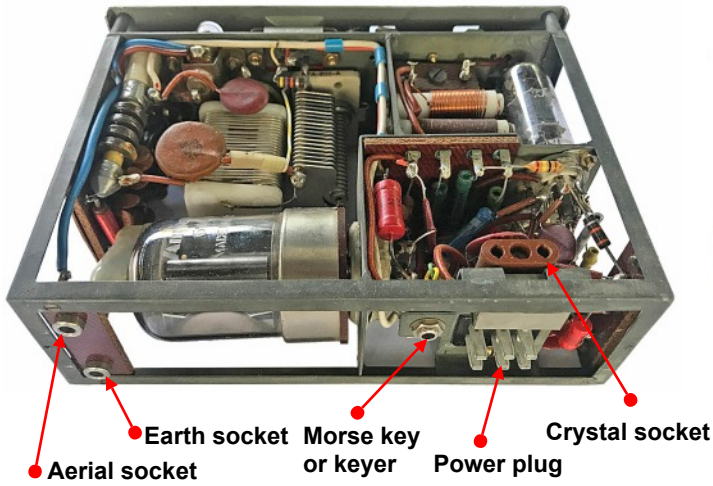


The West German FS-7 transmitter was part of the SP-15 station which was comprised of a FS-7, FE-10 receiver, AC mains power unit, DC power pack and RT-3 high speed Morse keyer (See Chapter 56).

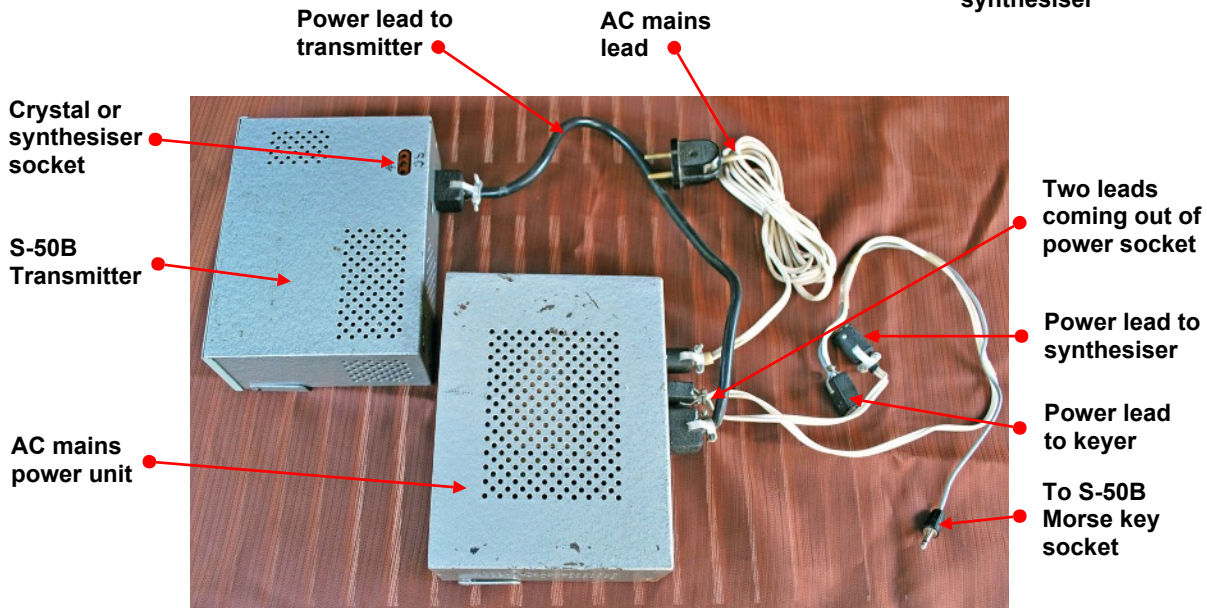
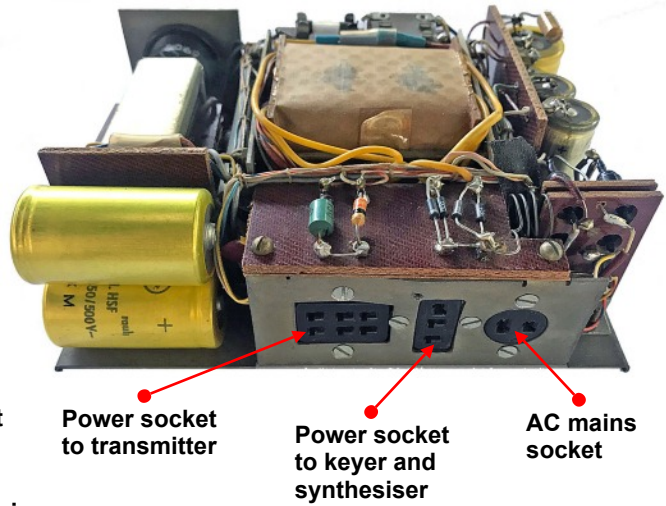


The SE 25, also known as 'Elbe' was an East German agents transmitter. It was used in combination with a NE 25 AC mains power unit or a 12V DC transverter, and a high speed Morse Keyer 'Geber E' (See Chapter 60).

Transmitter S-50B



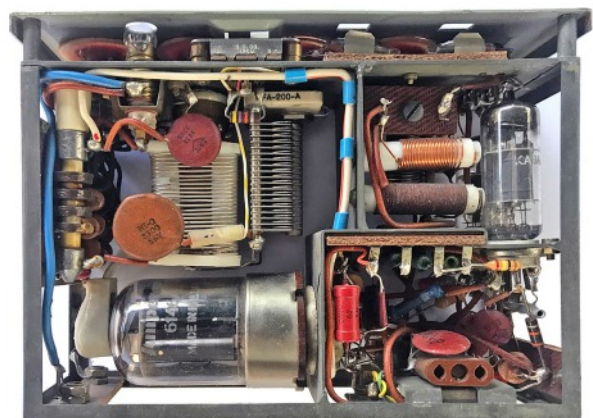
AC mains power unit



The aerial and counterpoise comprised two lengths of wire, terminating in banana type plugs and sockets, wound up on a spool.



Front panel view of AC mains power unit with its cover detached showing meter and on/off switch.



Top view of transmitter with cover removed.