

8. ALIGNMENT INSTRUCTIONS

Warning : Any repairs or adjustment should be made under the supervision of a qualified radio-telephone technician.

8.1. VCO

- a. Connect the power supply (DC 13.8 V)
- b. Connect the oscilloscope probe to test point
- c. Adjust the coil L601 for 2V at 1-Ch RX.
- d. Check that T401 voltmeter of receiver reads from 2 to 4 volts.

8.2. Transmitter

- a. TX Power alignments

With RF voltmeter at base of Q701, transmit of channel 19. Adjust in turn L701,L702 for maximum reading on RF voltmeter. Repeat as needed. Remove RF voltmeter.

- b. Max Mod Alignments

Adjust RV401 to obtain 90% MOD. At 16 dB greater than 50% MOD. AF 1 KHz.

- c. Final Check

1. Output power should be from 3.6 to 4.0 watts.
2. Frequency should be within +400 Hz of channel center frequency.
3. Spurious content as observed on spectrum synthesizer should be at least 60 dB below carrier.
4. With 2500 Hz modulation at 16 dB greater than that required to produce 50% modulation, occupied bandwidth should be at least 2 dB better than limit spec.