

MODEL VX-5/VX-5M SCHEMATIC
ATLAS RADIO 5-4-76

ATLAS RADIO, INC., INSTALLATION INSTRUCTIONS FOR VOX ACCESSORY.
MODEL VX-5M FOR USE WITH MOBILE OR PORTABLE OPERATION.

TRANSCEIVER MODIFICATIONS: Transceiver Serial Numbers begin with 2 letters, a "T" followed by a second letter. If these letters are TB,TC,TD,TE,TF,TG,TH or TJ, the transceiver will require some modification of wiring to the AUX. socket. However, PLEASE NOTE: These modifications are only required if you expect to use the CW function of the VX-5M kit. If you are strictly a phone man, the following modifications may be ignored, since the VOX will function normally without them.

(1) Remove the transceiver cabinet and bottom cover. Locate the "AUX." 9 pin socket on the rear, just below the ANT. connector.

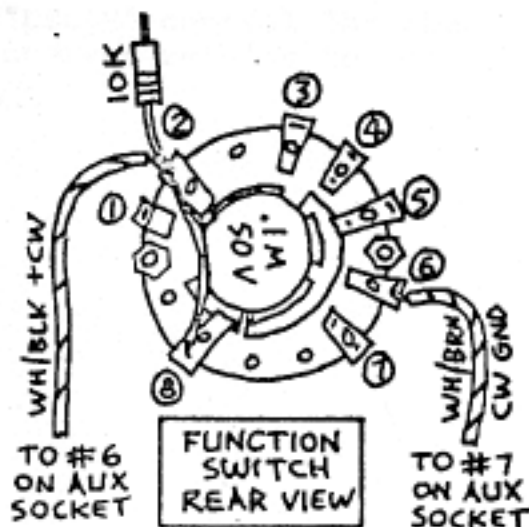
(2) On earlier models you will note that there is small size coaxial cable going to and from the socket. This was done at a time when we expected to have an external noise blanker. After finding that the noise blanker could be an internal accessory, the coax. cable was no longer run to the AUX. socket. If your set is one with coax. on the AUX. socket, disconnect these leads. One of them goes to the input terminal of the crystal filter, the can above the chassis which is marked with the name of Network Sciences. Remove this coax completely from the set. Take the other piece of coax. which comes from term # 13 of the PC-100 plug-in board, and connect it to the input terminal terminal of the crystal filter. Solder the shield connection to the chassis, and center conductor to the filter.

(3) You will find that terminals 5, 7 and 8 of the AUX. socket are connected to chassis ground. Cut these ground connections away, and clear the socket lugs of solder and wire ends.

(4) Remove the PC-100 plug-in board, (or PC-120 if you have the noise blanker board). This will expose the back side of the function switch. Locate terminal #6 on the switch as illustrated, and connect a 7 1/2 in. length of white/brown wire from this terminal to term. #7 of the AUX. socket.

(5) Locate terminal #2 on the switch, and connect an 8 in. length of white/black wire from this terminal to term. #6 of the AUX. socket.

(6) From a bottom view of the transceiver, locate term. #22 of the PC-100 edge connector socket. This is the one on the end nearest the function switch. Connect a 6 1/4 in. length of yellow wire from this terminal to term. #8 of the AUX. socket.



(7) Locate term. #15 on the PC-300 edge connector. (This is the one next to the speaker.) Connect a green wire, 11 1/2 in. long, from term. #15 of PC-300 to term. #5 on the AUX. socket.

(8) Solder all connections well, and check for possible shorts from solder bridges or strands of wire. Replace cabinet and bottom.

(9) Insert the 9 pin plug, the CW key plug, and Mic. plug into their respective places in back of the transceiver. The 9 pin plug goes into the socket labeled "AUX." The CW key plug goes into the CW jack. Both are on the same side of the transceiver, adjacent to the ANT. connector. The Mic. plug goes into the Mic. jack on the other side.

OPERATION:

PTT (Push-to-Talk): Switch in "SSB" position. Turn "VOX GAIN" control to minimum, full counter clockwise.

VOX (Voice Controlled Transmit): (a) Switch is SSB position. Advance "VOX GAIN" control until speaking normally into the Mic. causes the transceiver to go into transmit mode. If control is set too high, background sounds will trip the VOX. (b) Adjust "ANTI-TRIP" control so sounds coming from the receiver speaker do not trip the VOX, causing it to cycle on and off. Keep the Mic. away from the speaker as far as is practical, since close proximity makes adjustment of Anti-Trip more critical. (c) Adjust the "DELAY" control for the amount of time you want before the transceiver goes back to receive mode.

CW TRANSMIT: Move toggle switch to "CW" position. Insert key into Key Jack. When you press the key, the transceiver will automatically go into CW transmit mode with offset frequency transmission. NOTE: Sideband Selector switch on the transceiver must be in NORM. position. Adjust the "DELAY" control for the amount of time you want before the transceiver returns to receive mode.