

# Volunteer Satellite Distributors

www.volsatdist.com authorized Motorola distributor  
61A Parris Ave, Nashville, TN TN: 800-726-1298 IN: 888-592-3030 VA: 888-844-1040

## Repairing A Mistuned UHF Can In A DSR920 – page 1

The following procedure was developed to quickly remedy a failure of the 4DTV UHF remote control. If your 4DTV IRD is working properly via infrared remote control, and you have ascertained that the UHF address properly matches on both the remote control and the IRD, and the UHF remote reception is still inoperable then the following procedure may eliminate the problem. Please note- if you are not comfortable working with board level components you should return the receiver to General Instrument for warranty repair.

The likely cause of the failure is the tuned UHF reception "can" that is attached (internally) to the UHF whip antenna. The UHF can is, essentially, a radio receiver. What has happened is that the frequency (the channel, if you will) of the receptor has drifted or was improperly set. Because this part is a purchased subassembly, GI relies heavily on the vendor to assure performance compliance. Over time, or through the rigors of shipping, some of these reception cans may have become mistuned. The following procedure will help a qualified technician to reset the UHF can to the right frequency. Please be sure to disconnect the AC mains before attempting to service the unit.

### Procedure

1. Unplug the 4DTV IRD.
2. Remove the top cover of the receiver by removing the four Torx screws on the sides.
3. Locate the UHF "Can" in the right rear of the unit as viewed from the front. See Illustration 1 for help in identifying the UHF "Can."



Illustration 1



Illustration 2

4. Using a pair of needle nose pliers, carefully straighten the tabs holding the top of the UHF can in place. Remove the cover to the can. See Illustration 2.
5. Inside the UHF "can" you will see a small printed circuit board. On that board are two coils which set the reception frequency. The white arrow points to the two coils. See Illustration 3



Illustration 3

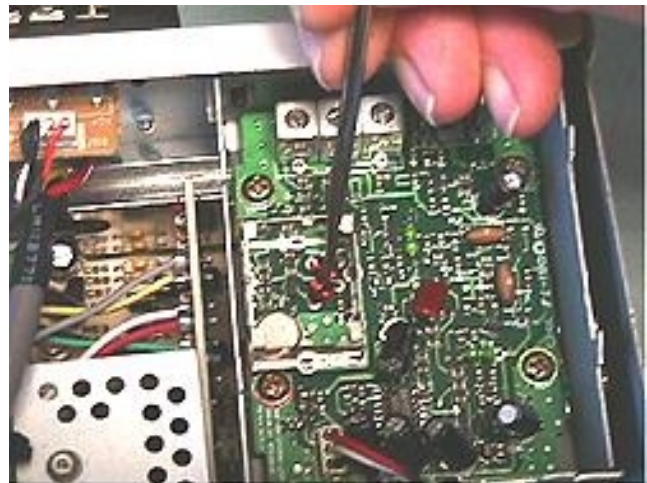


Illustration 4

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## Repairing A Mistuned UHF Can In A DSR920 – page 2

6. An adjustment must be made to the last loop of the lower of the two coils to bring the UHF receptor back to the right frequency so it can respond to the hand held remote control signals. You should use a non-conductive tuning tool (commonly referred to as a "diddle stick") to spread the last turn of this coil about 1/8th of one inch. See Illustrations 4 and 5.

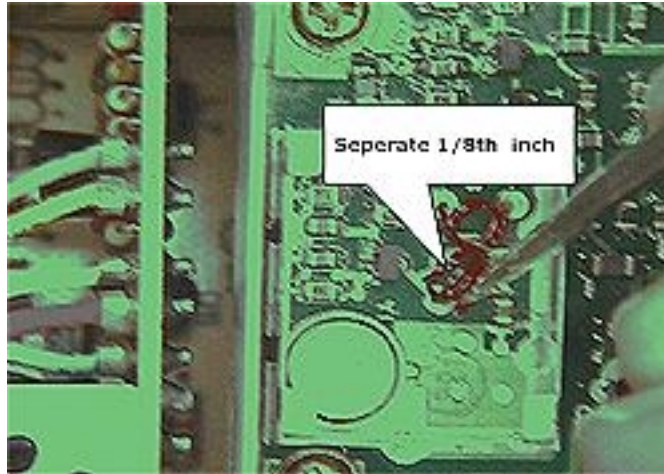


Illustration 5

7. You are now ready to test the frequency. Being careful to shield the unit from the infrared commands, see if the receiver now responds to the UHF remote control. You may have to make small adjustments in the spacing of the coils for best reception. Once reception is established, replace the cover of the UHF remote control can. Reattach the top cover of the IRD and reinstall into the system.

The information above originally appeared on the 4DTV website and is being passed on to Volunteer Satellite Distributing dealers. We cannot be held responsible for your interpretation of the material.