# KIT #146 REVISED INSTRUCTIONS FOR REALISTIC TRC-453

### DAVID C. COMPTON

- (1) Isolate pin 10 by removing C67 located between IC2 and L38. SAVE C67!
- (5) Solder the Yellow wire to pin 10 in the hole where C67 was.
- (6) Solder the Green wire to the unused circuit trace that runs from close to pin 1 over to the channel ribbon cable at the front of the board. The green wire should go at the channel cable end.
- (7) Solder the 1pf capacitor that comes with the kit to the other end of the green wire's trace and to the other hole left by c67. From front to rear, the wiring should go as follows. Green wire thru trace to one end of supplied cap.
- yellow wire, then the other end of supplied cap.
- (8) Remove C66 and replace with cap C67.
- (9) Change R106 (100 ohm to 47 ohm) provided in kit. It is next to D26 just in front of pin 11 of IC(2)

## **CLARIFIER MOD**

- (1) Lift the ANODE of D23 and connect the Super Slide in series with it.
- (2) Short across R562 on Front Panel Control P.C. Board. Remove Jumper JP561 at top of Clarifier control. Run jumper from end of Clarifier pot where you removed jumper to JP556 located next to R599 directly below the "3" s units LED.
- (3) Remove D25
- (4) Clarifier range is now approx. 9.5 khz down and 4.0 khz up, xmit and rcv

## **OTHER MODS**

(1) You may remove the wires from the switch on the back of the Squelch knob leaving the NB/ANL permanently on, and wire whichever band you prefer to the

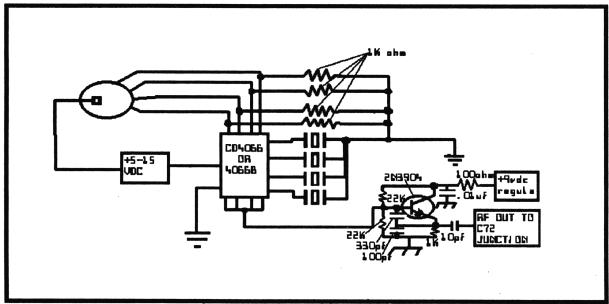
#### IMPROVING THE KIT#106

sw. contacts. Of course you will only have on band as opposed to two but your radio will look STOCK.

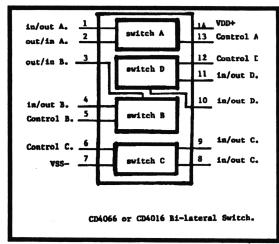
## **IMPROVING THE KIT#106**

#### • LEE LAUFER

I recently purchased kit#106 for a Cobra 146. After installing the unit, I noticed that the injector worked correctly to give the low and high frequencies, but the middle frequencies (ch.1-40) are not covered. The fault is with the radio's vco which doesn't produce enough energy to equal the injector's own energy level. The radio was tuned to get only the high and the middle frequencies, but the radio



FIGURE# 16.....CD4066 SWITCHING CIRCUIT



FIGURE# 17.....CD4066 PIN OUT DIAGRAM

would not cover this set because L13 doesn't tune flatly. The Super Diode was installed next to L14 and it did improve L14's tunability as it was written in the instructions. With this in mind, the kit#106 can be improved by using a three xtal osc. or by having two switches, with one for the extra xtal. I used an electronic switch and a 2N3904 osc. and that did the trick. The output of the oscillator is .5volts of RF. (see diagram)

38.....RADIO SECRETS VOLUME No. 29