

TH-2890 Turn up procedure

It can either use PC program software or manual tuning mode to debugging TH-2890. The following method is the latter one. (see "TH-2890 function", manual tuning mode) .

1. Equipment:

1. One comprehensive tester
2. One scanner
3. One 3A/10V power source
4. One digital voltmeter
5. One 3A Ammeter

2. User Mode

Press PTT key to transmit, speak to the microphone with normal voice. Please keep 2.5 to 5 center meters away from your mouth and the microphone. Release PTT key when receiving.

3. Mode Setting

1. Short-circuit two points of SELF on PCB, turn on the radio, LED flashes red and green in turns.
2. Choose channel according to its model.
3. Manual tuning function and wired clone function will be switched on automatically.
4. Press PTT key, then set the current chosen channel, system initialization starts.

Note: Once the radio has been re-initialized, the pre-stored tuning data and channel information (frequency, CTCSS/CDCSS) will be erased and some function may change, too. Therefore try to avoid this operation unless replacing E2PROM and other necessary setting.

4. Wired Clone Mode

- (1) Press SK2 key on the source radio to turn on it, LED will then flash twice in red in 2 seconds, which means the radio entered wired clone mode.
- (2) The target radio needs to be enabled with clone mode by pressing PTT key while the main radio is still in the clone mode. To disable the clone function of the target radio, press [PTT] key again and the indicator flashes red twice. The clone function of target radio is disabled as default.
- (3) Press SK2 key on the source radio, when the red light starts to flash it means it is in the process of clone. When it is finished the red light goes off. If it's failed, the indicator flashes in green instead of red.

Note: The wired clone mode can be disabled through using programming software.

5. Manual Tuning Mode

Manual tuning is aimed for adjust frequency deviation, power, sensitivity, and noise elimination, etc.

Note: Before enter the manual tuning mode, read the radio settings into the computer first using the programming software, and then go to program manual, modulation mode, choose manual tuning mode, close current widow and write in modulated setting from the computer to the radio. This will enable you to enter the manual tuning mode.

(1) To enter the mode:

Press [PTT+Moni] to turn on the power, keep it in 2 seconds until LED flashes twice in green, release to get into manual tuning mode.

No.	Items	Turning up procedure	Work frequency
	Version Display	Press[0] to turn on	
		Press[0] to turn on, input password:	
1	Initialization	Password: 777702	
2	Aging program	Password: 777703 (UHF Rx: 4s, VHF Rx: 4s; UHF Tx: 4s, VHF Tx 4s; Standby 16s)	Rx U:421.115MHz V:141.115MHz Tx U:431.115MHz V:151.115MHz
3	Password: 777705		Low frequency: the lowest frequency High frequency: the highest frequency
	Low power Adjust (the low frequency)	Press [1]	
	Low power Adjust (the high frequency)	Press [2]	
	Middle power Adjust (the low frequency)	Press [3]	
	Middle power Adjust (the high frequency)	Press [4]	
	High power Adjust (the low frequency)	Press [5]	
	High power Adjust (the high frequency)	Press [6]	
	VOX	Press [7]	
4	7.5V Voltage calibration	Password: 777706 Press [Enter] to confirm	

5	SQL adjust	Password: 777707(the top frequency) password: 777708(the bottom frequency)	136.125+5M 400.125+10M
		Press[up]/[down]±10M (U) or ±5M(V) Press[A/B] to select U/V(136-174 400-520)	136.125+5M 400.125+10M
6		Press [#] key to turn Input :777709	
	Tx deviation	Press[1]	
	CTCSS(123.0Hz)	Press[2]	
	DCS(D023NHz)	Press [3]	

Maximum Output Power among production units

Max. tune-up tolerance power limit for Production Unit (dBm)					
PTT/Mode	VHF(MHz)				
	136.0125	143.0125	150.0125	160.0125	173.9875
Analog-12.5 K	37.78	37.78	37.78	37.78	37.78

Max. tune-up tolerance power limit for Production Unit (dBm)					
PTT/Mode	UHF(MHz)				
	400.0125	418.0125	435.0125	450.0125	469.9875
Analog-12.5 K	37.00	37.00	37.00	37.00	37.00