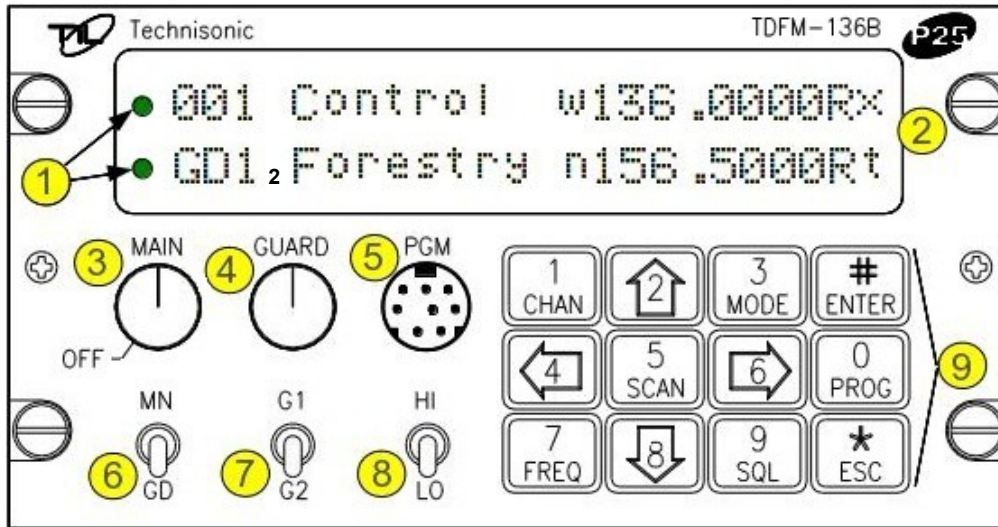




































































































For Radio Firmware: 1.x.x



1. LED channel squelch indicators – Illuminates when signal received (Top: Main/Bottom: Guard).
2. Channel parameter display – (2 line by 24 character LED display) (Top: Main/Bottom: Guard).
3. **MAIN** Multi-function rotary encoder (default: Main volume, **press for ON, press & hold for OFF**).
4. **GUARD** Multi-function rotary encoder (default: Guard volume, **press for Squelch defeat**).
5. Data port – for use with KVL 3000+ keyloader (for encryption) or TDP-136 Programming software. You need the TiL USB driver pre-loaded on your computer **before using the data port**.
6. **MN/GD** (Toggle Switch) – Selects active channel (main or guard) **for transmit and memory edit**.
7. **G1/G2** (Toggle Switch) – Selects guard memory (GD1 or GD2) for transmit, receive and edit.
8. **HI/LO** (Toggle Switch) – Selects transmit power high (10W) or low (1W).
9. **KEYPAD** (12 Keys) – Controls radio functions. Three command levels as shown below.

Basic radio functions on L1 <b>Command Level 1: press the desired "Cmnd" key</b>				
<b>Cmnd</b>	Function	Edit Keys	OK	Exit
[1] CHAN	SELECT CHANNEL MEMORY	[0] PROG TO [9] SQL ENTER THREE DIGIT CHANNEL NUMBER INTO MEMORY (001 to 230)	[#] ENTER	[*] ESC
[2]	DISPLAY BRIGHTER			
* [3] MODE	<b>EDIT OPERATING MODE</b>	[3] MODE [2] [8] STEP UP/DOWN THROUGH OPERATING MODES (" <b>n</b> " or " <b>D</b> ")	[#] ENTER	[*] ESC
* [4]	<b>SCROLL CHANNEL DOWN</b>	SCROLL DOWN THROUGH PROGRAMMED/ACTIVE MEMORY CHANNELS		
[5] SCAN	SCAN ON/OFF	[5] SCAN OR [*] ESC STOP SCAN		
* [6]	<b>SCROLL CHANNEL UP</b>	SCROLL UP THROUGH PROGRAMMED/ACTIVE MEMORY CHANNELS		
* [7] FREQ	<b>EDIT FREQUENCY</b>	[0] PROG TO [9] SQL SELECT Rx FREQUENCY THEN [#] ENTER REPEAT FOR Tx FREQUENCY	[#] ENTER	[*] ESC
[8]	DISPLAY DIMMER			
* [9] SQL	<b>EDIT TONE or CODE</b>	[9] SQL [2] [8] STEP UP/DOWN THROUGH SQUELCH MODES. Tx FOLLOWS Rx.	[#] ENTER	[*] ESC
	<b>Tone:</b> P25 Code: x - Off m - Monitor (i.e. x) t - On n - NAC only c - Code g - TGID + NAC	[2] [8] STEP UP/ DOWN THROUGH: <b>TONES, CODES, TGID &amp; NAC</b> EXAMPLE: Rt 110.9 Rg \$37A1 \$F56 (\$=HEX) or 754 (decimal) [0] PROG TO [9] SQL DECIMAL EDIT FOR NOISE SQL VALUE (00 TO 10)	[#] ENTER	[*] ESC
[0] PROG	GO TO NEXT LEVEL	GO TO THE NEXT HIGHER COMMAND LEVEL		
* [#] ENTER	<b>TOGGLE HOME/CURRENT</b>	TOGGLE BETWEEN 'HOME' CHANNEL AND CURRENTLY DISPLAYED CHANNEL.		
[*] ESC	TOGGLE TALK AROUND	FOR DUPLEX CHANNELS: RADIO USES Rx INFORMATION FOR Tx. "UP" ARROW.		

<b>Press  to get to Command Level 2, then press the "Cmnd" key</b>				
<b>Cmnd</b>	Function	Edit Keys	OK	Exit
* 	<b>CREATE or EDIT CHANNEL</b>	 TO  SELECT CHANNEL MEMORY TO EDIT THEN EDIT: SCAN LIST (L2-5), TEXT DESCRIPTION (L2-6) OPERATING MODE (L1-3), FREQUENCY (L1-7), & SQUELCH (L1-9)		
	COPY GUARD TO MAIN	COPY CHANNEL INFORMATION FROM GUARD TO MAIN (default disabled)		
* 	<b>LOCK KEYPAD</b>	PRESS & HOLD  TO UNLOCK KEYPAD		
	n/u			
	EDIT SCAN LISTS	   STEP UP/DOWN THROUGH AVAILABLE SCAN LISTS  TOGGLE ENABLE/DISABLE FOR SCAN (BAR OVER DIGIT = DISABLED)		
* 	<b>EDIT CHANNEL TEXT</b>	 STEP THROUGH THE FOUR CHARACTER GROUPS ( <b>AZ, az, 09, "BLANK"</b> )   SCROLL UP & DOWN THROUGH CHARACTERS IN SELECTED GROUP   MOVE CURSOR LEFT & RIGHT		
	CREATE SHADOW	 TO  SELECT CHANNEL MEMORY TO EDIT THEN EDIT: TEXT (L2-6), MODE (L1-4), SQUELCH (L1-9)		
	COPY MAIN TO GUARD	COPY CHANNEL INFORMATION FROM MAIN TO GUARD (default disabled)		
	TOGGLE ENCRYPTION	TOGGLE ENCRYPTION ON/OFF (ONLY FOR MEMORIES WITH KEY ASSIGNED)		
	GO TO NEXT LEVEL	GO TO THE NEXT HIGHER COMMAND LEVEL		
	SET HOME CHANNEL	SET THE "HOME" CHANNEL INTO MEMORY (FOR MAIN RADIO ONLY)		
	GO TO PREVIOUS LEVEL	GO TO THE PREVIOUS COMMAND LEVEL		

<b>Press  +  to get to Command Level 3, then the desired "Cmnd" key</b>				
<b>Cmnd</b>	Function	Edit Keys	OK	Exit
	SET BOOT CHANNEL	   STEP UP/DOWN THROUGH BOOT MEMORY OPTIONS		
	ASSIGN KEY BY KEYTAG	  PICK MEMORY,   PICK KEY,   PICK DECRYPT OPTION		
* 	<b>SET P25 MODE</b>	   TOGGLE P25 <b>HEX/DECIMAL</b> EDIT MODE (For TGID & NAC CODES) (\$F56/3926)		
	DISPLAY FIRMWARE REV.	   STEP THROUGH RADIO MAIN & BOOT FIRMWARE VERSIONS		
	SET SCAN PARAMETERS	   SELECT REVERT MODE THEN  TO  SET TIMERS (REPLY, MONITOR, DELAY)		
	SET PTT TIMER	   STEP UP/DOWN THROUGH TIMER VALUES (30, 60, 90 SEC)		
* 	<b>SET SIDETONE AUDIO</b>	 TO  SET SIDETONE LEVEL (00 TO 80) ( <b>TDFM-136B = 44</b> )		
	PC COMMUNICATION	MUST BE CONNECTED TO A PC OPERATING TDP-136 SOFTWARE		
* 	<b>SHOW TONES/CODES</b>	   TOGGLE Rx/Tx SQUELCH PARAMETER DISPLAY ( <b>Check Tones</b> )		
	GO TO NEXT LEVEL	GO TO THE NEXT HIGHER COMMAND LEVEL ( <b>L4 PASSWORD PROTECTED</b> )		
	n/u			
	GO TO PREVIOUS LEVEL	GO TO THE PREVIOUS COMMAND LEVEL		

**NOTES:**

- The channel being edited is determined by the position of the front panel switches MN/GD and G1/G2.
- Current command level is shown at 4<sup>th</sup> character on bottom row (between GD2 and text).
- Levels 2 & 3 time out. The radio will return to Level 1 if a "Cmnd" key is not entered within 5 seconds of entering that level.**
- Download this Quick Reference Guide at [www.nifc.gov/resources/NIICD/niicd-documents](http://www.nifc.gov/resources/NIICD/niicd-documents)