

TECHNICAL SPECIFICATIONS

General	VHF	UHF1	UHF2	UHF3
Frequency	146 - 174 MHz	403 - 440 MHz	438 - 470 MHz	465 - 495 MHz
Channel Capacity	4 Channels			
Power Supply	7.5 Volts ± 20%			
Dimensions (H x W x D)	130 x 62 x 42mm (with Slim Li-Ion Battery)			
Weight	376g with Slim Li-Ion Battery			
Average Battery Life at Room Temperature (5:5:90 duty cycle)	1W	5W	1W	4W
Standard Capacity NiMH Battery	13Hrs	10Hrs	13Hrs	10Hrs
Slim Li-Ion Battery	17Hrs	12Hrs	17Hrs	12Hrs
High Capacity Li-Ion Battery	19Hrs	14Hrs	19Hrs	14Hrs

Receiver	VHF		UHF1		UHF2		UHF3	
	12.5kHz	20/25kHz	12.5kHz	20/25kHz	12.5kHz	20/25kHz	12.5kHz	20/25kHz
Sensitivity (12dB EIA SINAD)	0.25 µV (Typical)							
Adjacent Channel Selectivity	-65 dB	-70 dB	-60 dB	-70 dB	-60 dB	-70 dB	-60 dB	-70 dB
Intermodulation	-70 dB							
Frequency Stability (-30°C to +60°C)	0.00025%							
Spurious Rejection	-70 dB							
Audio Output @ < 5% Distortion	500 mW							

Transmitter	VHF		UHF1	UHF2	UHF3
	Low	High	Low	High	High
RF Output: NiMH @ 7.5V	1W	5W	1W	4W	4W
Channel Spacing	12.5/20/25 kHz				
Frequency Stability (-30°C to +60°C)	0.00025%				
Spurs/Harmonics	-36 dBm < 1 GHz		-30 dBm > 1 GHz to 4 GHz		
Audio Response (from 6 dB/oct. Pre-emphasis, 300 to 3000Hz)	+1, -3 dB				
Audio Distortion @ 1000 Hz, 60% Rated Max. Dev.	<3%				
FM Noise	-40 dB (12.5 kHz)		-45 dB (25 kHz)		

MIL Standard 810F

Applicable MIL-STD	Methods	Procedures
Low Pressure	500.4	1
High Temperature	501.4	1,2
Low Temperature	502.4	1,2
Temperature Shock	503.4	1
Solar Radiation	505.4	1
Rain	506.4	1
Humidity	507.4	3
Salt Fog	509.4	1
Dust	510.4	1
Vibration	514.5	1
Shock	516.5	1

MODEL NUMBERS

Model Number	Signalling	Channels	Frequency	Power
MDH50KDC9AA1AN	PL	4	146-174MHz	1-5W
MDH50ODC9AA1AN	PL	4	403-440MHz	1-4W
MDH50RDC9AA1AN	PL	4	438-470MHz	1-4W
MDH50SDC9AA1AN	PL	4	465-495MHz	1-4W

ENVIRONMENTAL STANDARDS & SPECIFICATIONS

Operating Temperature	-30 to +60 °C
Storage Temperature	-40 to +85 °C
Thermal Shock	-40 to +80 °C
Dust & Water Intrusion	IP54
Radios meet all applicable regulatory requirements: R&TTE Directive 1999/5/EC	
Applicable Standards EN300 086-2, EN301 489-01, EN301 489-05, EN60950	
ISO 9001 Standard – Compliance with ISO 9001, an international quality system assurance on design, development, production, installation and servicing of a product.	



ACCESSORIES

All radios are supplied with a slim lithium ion battery for optimal performance. A belt clip and rapid desktop charger are also included to get you started.

Batteries

NNTN4851	Standard Capacity NiMH Battery
NNTN4970	Slim Li-Ion Battery
NNTN4497	High Capacity Li-Ion Battery

Chargers

WPLN4139	Rapid Desktop Charger (Euro)
WPLN4140	Rapid Desktop Charger (UK)
WPLN4162	Rapid Multi Unit Charger (Euro)
WPLN4163	Rapid Multi Unit Charger (UK)

Carry

HLN8255B	7.5cm Spring Action Belt Clip
HLN9701	Nylon Carry Case with Belt Loop and D Rings
HLN9985	Waterproof Bag
RLN4815	Universal RadioPak
RLN5383	Leather Carry Case with Belt Loop and D Rings
RLN5385	Leather Carry Case with Swivel Belt Loop

Audio

HMN9030	Rugged Remote Speaker Microphone
HMN9727	Single Wire Beige Earpiece
HMN9754	Two Wire Beige Earpiece with Combined Microphone and PTT
MDPMLN4445	Ultra Light Earset with In-Line PTT
PMLN4442	Earbud with Combined Microphone and PTT
PMLN4443	Flexible Ear Receiver with Combined Microphone and PTT
PMMN4008	Remote Speaker Microphone
RLN5238	Chunky Lightweight Headset with In-Line PTT
RLN5411	Ultra-Lite Breeze Behind-the-Head Headset
RMN4016	Lightweight Headset with In-Line PTT

All specifications are subject to change without notice.

For more information contact your local Motorola authorised two-way radio dealer:



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