

MAINTENANCE MANUAL

406-512 MHz MONITOR RECEIVER

Maintenance Manual LBI30688A



TABLE OF CONTENTS

SPECIFICATIONS	ii
SYSTEM BOARD & ASSOCIATED ASSEMBLIES	LBI30665 (DF4101)
MAINTENANCE	LBI30689 (DF1120)
RF ASSEMBLY & IF-FILTER	LBI30032 (DF1107)
OSCILLATOR/MULTIPLIER	LBI30147 (DF1106)
IF-DETECTOR	LBI31118

406-512 MHz MONITOR RECEIVER

SPECIFICATIONS*

Dimensions		
Height	3.5 inches (8.89 cm)	
Width	8.4 inches (21.34 cm)	
Depth	10.6 inches (26.92 cm)	
Weight	9.25 pounds (4.2 Kg)	
Input Power	15 Watts	
Input Voltage	121/242 VAC, 50/60 Hz	
Regulated DC Voltages	15 VDC @ 0.8 Amperes 10 VDC @ 0.250 Amperes	
Current Drain (@ 121 VDC)		
Standby	0.05 Amperes	
Receive	0.12 Amperes	
Audio Output	3 Watts at less than 5% distortion	
Sensitivity	Standard Receiver	Ultra-High Sensitivity Receiver
12-dB SINAD (EIA Method)	0.35 μ V	0.20 μ V
20-dB Quieting Method	0.50 μ V	0.25 μ V
Selectivity		
EIA Two-Signal Method	-85 dB	-85 dB
Spurious Response	-100 dB	-90 dB
Intermodulation (EIA)	-80 dB	-75 dB
Squelch Sensitivity		
Fixed Squelch	6 dB SINAD	
Frequency Stability		
Crystal Module	0.0005%	
Temperature Range	-30°C to +60°C (-22°F to +140°F)	
Modulation Acceptance	$\pm$ 7 kHz	
Maximum Frequency Separation	Full Specifications	3 dB Degradation
406-470 MHz	1.60 MHz	2.0 MHz
470-494 MHz	1.80 MHz	2.3 MHz
494-512 MHz	1.50 MHz	2.0 MHz
Frequency Response	Within +1 and -8 dB of a standard 6-dB per octave de-emphasis curve from 300 to 3000 Hz (1000-Hz reference)	
RF Input Impedance	50 ohms	
* These specifications are intended primarily for the use of the serviceman. Refer to the appropriate Specification Sheet for the complete specifications.		

WARNING

No one should be permitted to handle any portion of the equipment that is supplied with high voltage; or to connect any external apparatus to the units while the units are supplied with power. KEEP AWAY FROM LIVE CIRCUITS!

GENERAL ELECTRIC COMPANY • MOBILE COMMUNICATIONS DIVISION
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