

查询"MHW1254LC"供应商

CATV Amplifier Module

Features

- Excellent Distortion Performance
- Low Power Consumption
- Capable of Handling Multiple Channels in the Return Path with Good Distortion Performance
- Silicon Bipolar Transistor Technology
- Unconditionally Stable Under All Load Conditions

Applications

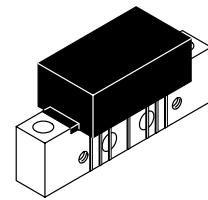
- CATV Systems Operating in the 5 to 75 MHz Frequency Range
- Specified for Use as a Return Path Amplifier for Low-Split 2-Way Cable TV Systems

Description

- 24 Vdc Supply, 5 to 75 MHz, CATV Reverse Amplifier

MHW1254LC

5-75 MHz, 25.5 dB
CATV LOW CURRENT AMPLIFIER

**CASE 1302-01, STYLE 1****Table 1. Maximum Ratings**

Parameter	Symbol	Value	Unit
DC Supply Voltage	V_{CC}	+28	Vdc
RF Input Voltage (Single Tone)	V_{in}	+60	dBmV
Operating Case Temperature Range	T_C	- 20 to +100	°C
Storage Temperature Range	T_{stg}	- 40 to +100	°C

Table 2. Electrical Characteristics ($V_{CC} = 24$ Vdc, $T_C = 30^\circ\text{C}$, 75 Ω system, unless otherwise noted)

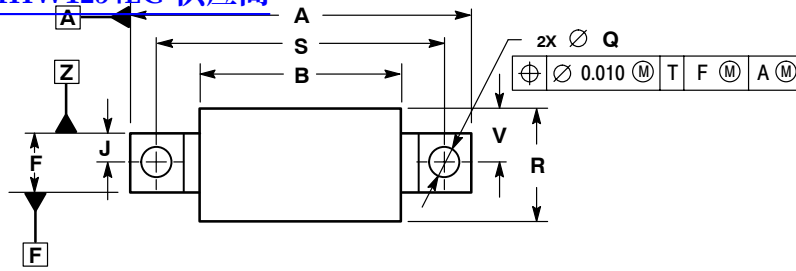
Characteristic	Symbol	Min	Typ	Max	Unit
Bandwidth All	BW	5	—	75	MHz
Power Gain (f = 5 MHz)	G_p	25	25.5	26	dB
Slope (5-75 MHz)	S	- 0.2	—	0.5	dB
Gain Flatness (Peak To Valley) (5-75 MHz)	G_F	—	—	0.4	dB
Return Loss — Input/Output (@ f = 5-75 MHz)	IRL/ORL	20	—	—	dB
Composite Second Order ($V_{out} = +50$ dBmV per Ch., Worst Case) 4-Channel FLAT	CSO_4	—	- 73	- 68	dBc

Table 2. Electrical Characteristics ($V_{CC} = 24 \text{ Vdc}$, $T_C = 30^\circ\text{C}$, 75Ω system, unless otherwise noted) **(continued)**

Characteristic	Symbol	Min	Typ	Max	Unit
Cross Modulation Distortion ($V_{out} = +50 \text{ dBmV}$ per Ch., Worst Case) 4 - Channel FLAT	XMD_4	—	- 69	- 65	dBc
Composite Triple Beat ($V_{out} = +50 \text{ dBmV}$ per Ch., Worst Case) 4 - Channel FLAT	CTB_4	—	- 78	- 75	dBc
Noise Figure ($f = 5 - 75 \text{ MHz}$)	NF	—	5.8	6.5	dB
DC Current	I_{DC}	85	95	110	mA

PACKAGE DIMENSIONS

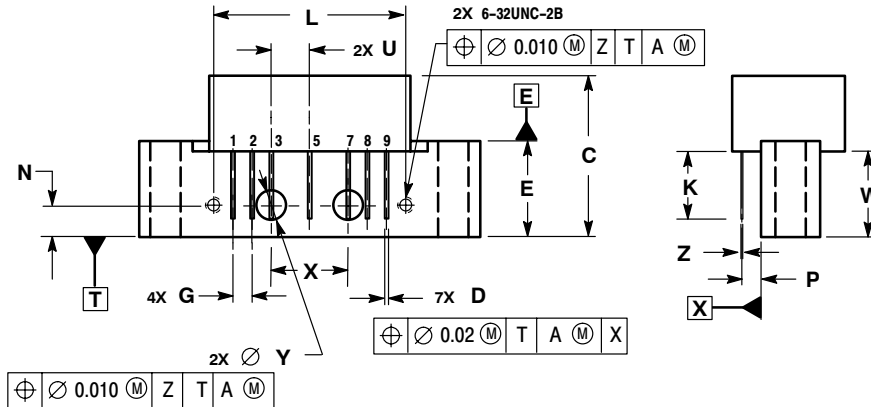
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NOTES:

1. CONTROLLING DIMENSION: INCH.
2. INTERPRET DIMENSIONS AND TOLERANCES PER ASME Y14.5M, 1994.

DIM	INCHES		MILLIMETERS	
	MIN	MAX	MIN	MAX
A	----	1.775	----	45.085
B	----	1.085	----	27.559
C	----	0.840	----	21.336
D	0.015	0.021	0.381	0.533
E	0.465	0.510	11.811	12.954
F	0.300	0.325	7.620	8.255
G	0.100 BSC		2.540 BSC	
J	0.156 BSC		3.962 BSC	
K	0.315	0.355	8.001	9.017
L	1.000 BSC		25.400 BSC	
N	0.165 BSC		4.191 BSC	
P	0.100 BSC		2.540 BSC	
Q	0.148	0.168	3.759	4.267
R	----	0.600	----	15.240
S	1.500 BSC		38.100 BSC	
U	0.200 BSC		5.080 BSC	
V	----	0.250	----	6.350
W	0.435	----	11.049	----
X	0.400 BSC		10.160 BSC	
Y	0.152	0.163	3.861	4.140
Z	0.009	0.011	0.229	0.279



STYLE 1:

- PIN 1: RF INPUT
 2. GROUND
 3. GROUND
 4. DELETED
 5. VDC
 6. DELETED
 7. GROUND
 8. GROUND
 9. RF OUTPUT

CASE 1302-01
 ISSUE C

MHW1254LC

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