

DESCRIPTION

THE LVD-218-HERM OPT. 15V IS A HERMETICALLY SEALED 50dB DETECTOR LOG VIDEO AMPLIFIER, OVER THE FULL 2-18 GHz BANDWIDTH, WITH TRUE DC COUPLING. UNITS EMPLOY PLANAR DIODE DETECTORS AND INTEGRATED VIDEO CIRCUITRY FOR HIGH SPEED PERFORMANCE AND OUTSTANDING RELIABILITY. THE DLVA'S ARE OF SUPERIOR CONSTRUCTION USING STATE-OF-THE-ART MIC/MMIC TECHNOLOGY.

FEATURES

- TRULY DC COUPLED
- WIDE BANDWIDTHS
- FAST RISE TIMES
- SHORT RECOVERY TIMES
- SUPERIOR ACCURACY
- EXTENDED DYNAMIC RANGE CAPABILITY
- MINIATURE SIZE
- 1.75 OZ WEIGHT

SPECIFICATIONS

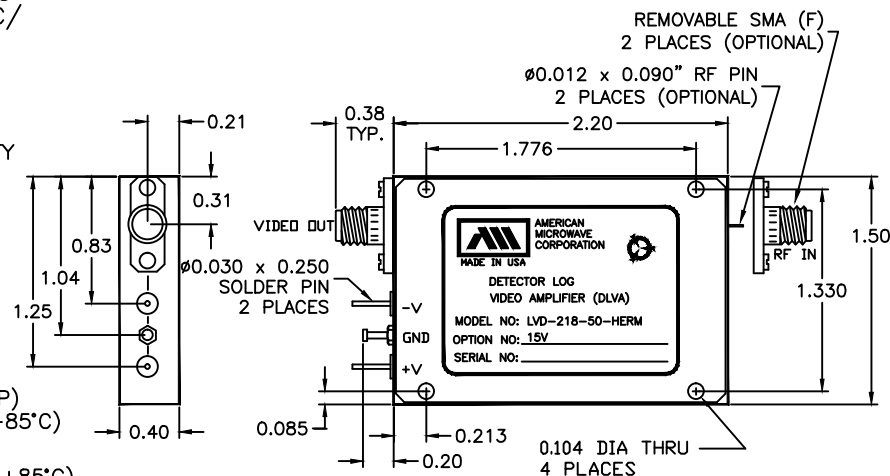
- FREQUENCY RANGE 2 TO 18 GHz
- FREQUENCY FLATNESS ± 1.0 dB MAXIMUM
- LOGGING RANGE -40 TO -0dBm MINIMUM
- USEFUL RANGE -40 TO +5dBm
- LOG LINEARITY ERROR ± 0.5 dB MAXIMUM (ROOM TEMP)
 ± 1.0 dB MAXIMUM (-54° TO +85°C)
- LOG SLOPE 50mV/dB ($\pm 10\%$)
- TEMPERATURE STABILITY ± 1.0 dB MAXIMUM (-54° TO +85°C)
- PULSE RESPONSE 50ns TO CW
- RISE TIME 20ns MAXIMUM
- SETTling TIME 45ns MAXIMUM
- RECOVERY TIME 300ns MAXIMUM
- TSS -42 dBm TYP. (-40dBm MIN)
- VSWR (RF) 3:1 MAXIMUM
- MAXIMUM RF INPUT +15dBm
- VIDEO OUTPUT LEVEL 0 TO 2.5 VOLTS TYPICAL (50 Ω MIN LOAD)
- DC POWER (NO LOAD)
 - +V 15V @ 95MA MAXIMUM
 - V 15V @ 60MA MAXIMUM

AVAILABLE OPTIONS (SPECIFY)

- A01 EXTENDED 0.2 TO 20 GHz RF FREQUENCY RANGE
- A02 EXTENDED 0.5 TO 18 GHz RF FREQUENCY RANGE
- A03 FASTER RISE/RECOVERY TIMES
- A04 ALTERNATE LOG SLOPES
- A05 HIGH POWER RF CW/PEAK PROTECTION
- A07 OTHER VIDEO LOADS

REVISIONS				
ZONE	REV.	DESCRIPTION	DATE	APPROVED
	A	SEE ER# 011-18	2/28/18	

MECHANICAL OUTLINE



NOTES:


- 1) DIMENSIONS ARE IN INCHES
- 2) TOLERANCES: X.XX ± 0.020
X.XXX ± 0.010

ENVIRONMENTAL RATINGS

- **TEMPERATURE** -54°C TO +85°C (OPERATING)
-65°C TO +100°C (STORAGE)
- **HUMIDITY** MIL-STD-202F, METHOD 103B COND. B
- **SHOCK** MIL-STD-202F, METHOD 213B COND. B
- **VIBRATION** MIL-STD-202F, METHOD 204D COND. B
- **ALTITUDE** MIL-STD-202F, METHOD 105C COND. B
- **TEMPERATURE CYCLE** MIL-STD-202F, METHOD 107D COND. A

NOTE: THE ABOVE SPECIFICATION ARE SUBJECT TO CHANGE OR REVISION.

* Units are designed to meet Environmental ratings but not tested. If Environmental Testing is required, please contact Sales Department.

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		PRODUCT FEATURE LVD-218-50-HERM OPTION: 15V	
APPROVALS	DATE	SIZE	A
DRAWN <i>H.H.H.</i>	2/28/18	SHEET	1 OF 2
MODIFIED		DWG. #	100-8841
CHECKED		REV	A