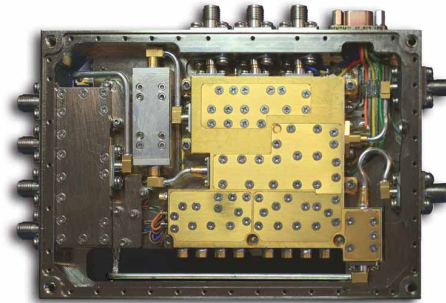


FEATURES:

- TYPE 1 TUNER
- 2.0 - 6.0 GHz INPUT FREQUENCY
- 1.0 - 2.0 GHz IF OUTPUT
- 25 dB IF OUT NET GAIN
- HERMETIC PACKAGE OPTIONS AVAILABLE
- EXCELLENT TEMPERATURE STABILITY
- SIZE: 4.98" x 3.42" x 0.89"



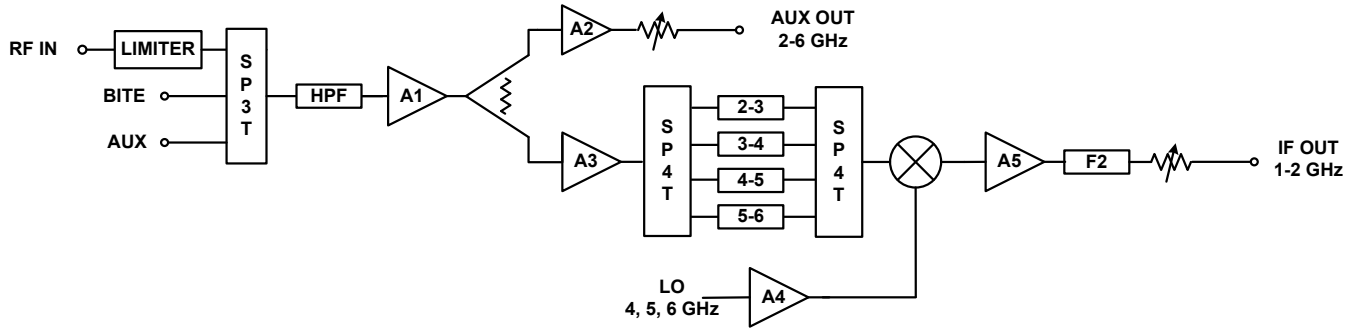
AKON's A60-ML008 is a high gain downconverter which accepts inputs in the 2.0 to 6.0 GHz frequency band, incorporates a 4-channel preselector filter, each channel being 1 GHz wide, and individually down converts those channels to a 1.0 to 2.0 GHz IF output. Conversion gain is approximately 25 dB, and dynamic range is 52 dB. 0 dB SNR threshold is -72 dBm. Deselected channel isolation is over 60 dB and switching time is less than 200 nS typical.

SPECIFICATIONS:

| | |
|---|--|
| Model Number | A60-ML008 |
| Frequency Range (GHz) | 2.0 - 6.0 |
| IF Output (GHz) | 1.0 - 2.0 |
| Noise Figure (dB) | 10 |
| Switching Time (nS) | 200 (for switch filter bank) |
| Survival Power (W) | 2 (max) CW or 200 W 1% duty ratio |
| SP3T Switch Isolation (dB) | 50 (min) |
| SP4T Switch Isolation (dB) | 30 (min) |
| SP3T Controls (TTL) | 2 bit |
| SP4T Controls (TTL) | 2 bit ganged |
| VSWR | 2.5:1 (max) for all RF and IF ports |
| LO Input (dBm) | -10 (min) (amplifier is used to meet the LO drive requirement) |
| LO Radiation (dBc) | -90 (max) |
| Output Frequency Bandwidth (GHz) | 2.0 - 6.0 |
| Aux RF Out Net Gain (dB) | 12 +/- 1 |
| 1dB Compression Point (dBm) | +12 at output |
| Rejection For Input Less Than 1.7 GHz (dBc) | -50 (min) |
| IF OUT Frequency Bandwidth (GHz) | 1.0 - 2.0 |
| IF OUT Net Gain (dB) | 25 +/- 2 |
| Rejection at IF Output of 1.0 - 2.0 GHz (dBc) | <-30 (max) -60 <850 MHz |
| In Band Spurious (dBc) | <-30 (max) |
| In Band Harmonics (dBc) | <-30 (max) |
| IF Linear Dynamic Range (dB) | 52 (min) (-72 to -20 dBm) |
| Input RF Power for 0dB SNR at IF Output (dBm) | -72 |
| Power Supply (VDC) | +12V / +8.5V @ 1.5A, -12V / -8.5V @ 300mA (max) |
| Operating Temperature (°C) | -10 to + 60 |

Note: All dimensions are specified in inches (mm)

BLOCK DIAGRAM:



OUTLINE DRAWING:

