FEATURES
* Voltage Gain of 100
* Wideband Performance DC to 100 MHz
* Excellent Stability - Low Distortion
* Input and Output Protection

DESCRIPTION
The Model 6931 is a wideband bipolar amplifier housed in a small, rugged aluminum enclosure. It is direct coupled, has a non-inverting voltage gain of 100, and bandwidth over 100 MHz. The amplifier exhibits excellent gain stability, linearity, and noise characteristics. To ensure reliable operation, the input stage is protected from transients and the output stage is short circuit protected. Also the output stage is capable of driving two 50 ohm loads for fan-out of the amplified signal.

SPECIFICATIONS
Input : One; 50 ohms ±1%, Direct Coupled. Protected from ±100 Volt transients for 1µSec.
Outputs : Two; Capable of driving ±2 Volts into a 50 ohm load and ±1.5 Volts into 25 ohms.
Voltage Gain : 100, ±2%, Non-inverting.
Gain Stability : ±0.01%/°C above 1 MHz.
DC Stability : Typically ±4 µVolt/°C, referred to the input;
Non-Linearity : ±0.1% for ±2 Volt output into 50 ohms; ±1 Volt into two 50 ohm loads.
Bandwidth (3db) : DC to 100 MHz, 3 db point; 1 Volt output excursion.
Risetime : Less than 3.5nSec for a 1 Volt output excursion.
Insertion Delay : Typically 6.0nSec.
Wideband Noise : Less than 10 µVolts RMS; Referred to the input.
Overdrive Recovery : Less than 25nSec to recover from a ±1 Volt input pulse.
DC Offset Control : Variable with a 15-turn screwdriver adjustment; ±2.5mVolt referred to the input, (±250mV at output). A test point provides a DC Voltage equal to the threshold setting.
Output Protection : Outputs can be continuously shorted to ground without damaging the output stage.
Power Supply : +8 Volts to +28 Volts @ 30 mA. Note: Power supplies are internally regulated, and Requirements are not required to be balanced. An 18" three-wire cable is provided, unless otherwise specified.
Connector Type : BNC unless otherwise specified. LEMO or SMA optional. (Specify when ordering)
Packaging : Black anodized aluminum enclosure. 2.25" x 3" x 1.75", (5.72cm x 7.6cm x 4.45cm).
Operating Temp. : 0°C to 70°C ambient.