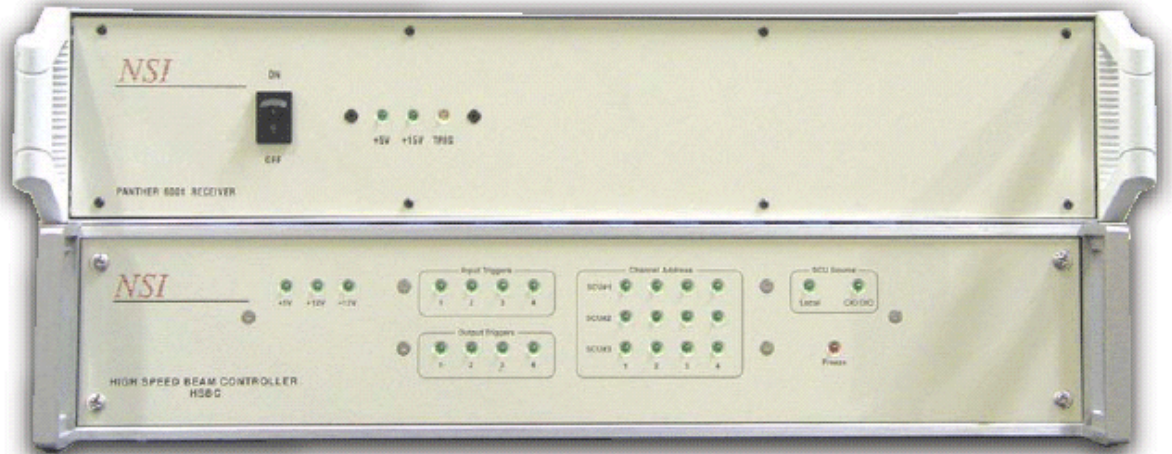


Panther Receiver

NSI

PANTHER 6000

HIGH SPEED RECEIVER



DESCRIPTION

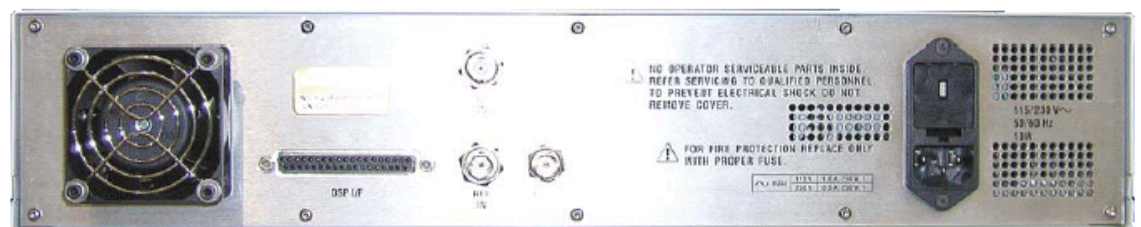
The Panther 6000 Receiver System is designed for high performance antenna testing where speed and accuracy are required. This two-channel system collects multi-port, multi-frequency data at up to 80,000 measurements per second, while freeing the measurement application software from stringent timing

COMPONENTS

- Panther 6001 Receiver
- Panther 6002 High Speed Beam Controller
- Host computer with driver software and test program
- PCI interface card with required cables
- Panther 6000 User's Guide
- One year warranty

FEATURES

- High-speed replacement for 8530A receiver
- Reduces antenna test time - improves range productivity
- Up to 80,000 multi-beam measurements per second
- Frequency coverage from 45 MHz to 110 GHz with appropriate frequency converter
- Fully integrated with NSI 2000 v4.0 antenna measurement software
- Supports a wide variety of RF sources from Agilent, Comstron, Gigatronics, and NSI
- Supports multi-port switching, synchronization, and pulse mode options
- Simple DLL interface allows integration into automated test programs
- Digital interface option for Digital Beam Forming antenna test (Panther 6500)



SPECIFICATIONS	
Measurement speed (max)	80,000 points per second
Receiver integration time (1 average)	3.56 μ sec
IF bandwidth (1 average)	800 KHz
No. channels	2 (test and reference)
Buffer size (memory available for single cut)	2,000,000 measurement points
IF frequency (nominal, others available as an option)	20 MHz
Compression (20 MHz IF level)	-18 dBm
Sensitivity (20 MHz IF level)	-83 dBm at 1 average, -103 dBm at 100 averages
Dynamic range	65 dB at 1 average, 85 dB at 100 averages
Beam controller setup time (min)	8.94 μ sec
Beam controller timing resolution	1.0 μ sec
Multiplexing capacity	9,000 measurements per trigger
Switch control unit (SCU) ports	Three (3) 8-bit ports, RS-422 differential
Frequency source control interfaces	Parallel (two 47-bit ports), GPIB, IEEE-1394 Firewire
Trigger inputs (4)	Four (4) single-ended TTL
Trigger outputs (4)	Four (4) single-ended TTL or differential TTL
Size (Receiver and beam controller)	3.5"H x 17"W x 12"D
Power requirements	100 - 240 VAC, 50/60 Hz, 135W max with 3 active SCUs
Controls and indicators	Power on/off switch, LED indicators for Power, Trigger, and Switch States



OPERATION

The Panther 6000 System consists of two units that work together to provide fast, accurate measurements:

- ◆ The Panther 6001 Receiver collects amplitude and phase data from its Test and Reference IF inputs, and transfers the digitally processed data directly to the host computer through a PCI-bus interface card. The receiver can be commanded to average measurements to increase dynamic range. It is compatible with frequency converter systems including Agilent's 85310A and NSI's Integrated and Distributed Frequency Converters.
- ◆ The Panther 6002 High Speed Beam Controller (HSBC) manages the critical timing for multi-port, multi-frequency measurements, relieving the host computer of exacting timing requirements. This unit can control two sources and three 8-bit switches, and has TTL inputs and outputs for synchronization with external equipment. In pulse-mode antenna measurements, the HSBC will synchronize to an incoming pulse, providing a programmable trigger delay to set the receiver trigger to the desired point along the pulse.

NSI 2000 v4.0 Antenna Measurement Software fully supports the advanced capabilities of the Panther 6000 System. For other applications, NSI provides a simple DLL programming interface, allowing integration of the Panther 6000 System with customer-supplied measurement application software.

ORDERING INFORMATION

Please contact the NSI Sales department to order this product.

Nearfield Systems, Incorporated

19730 Magellan Drive, Torrance, CA 90502, USA, Tel: 310.525.7000, Fax: 310.525.7100
Email: sales@nearfield.com. Visit our website: www.nearfield.com