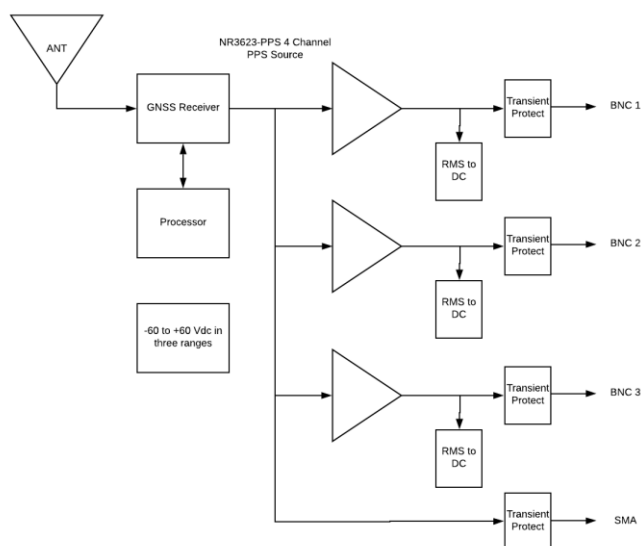


NR3623-PPS

Four Output GNSS PPS/NMEA Source

KEY FEATURES



The signal source is a GNSS 26 channel receiver providing a PPS pulse with an accuracy of 1σ 15ns @ -130 dBm. The unit can be operated from an AC power adapter or -60 to +60 VDC in three separate power ranges. There is extensive built-in test that drives an LED and relay contacts for system integration. There is also a GNSS lock status signal (and LED) and a serial port to provide access to NMEA time stamp data. Power converter provides electrical isolation from the power source to the output (configuration option). Available in a kit that includes the NR3623-PPS, antenna, power supply and cable to connect the antenna to the unit.

Product Highlights



High Sensitivity GNSS Receiver

The 26 channel high-sensitivity, high-accuracy Multi-GNSS receiver. Supports TRAIM, GPS, GLONASS, QZSS, SBAS, Active Anti-Jamming and Advanced Multipath Mitigation Functions.

Four Protected Outputs

3.3 VDC LVCMOS with programmable cable delay compensation.

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Technical specifications

PPS 3.3 LVCMOS or 5 Vdc CMOS 50 Ohm Drive capability	3 BNC connectors on the front panel
PPS 3.3 Vdc 1000 Ohm	1 SMA on front panel
Receiver sensitivity	-155dBm
PPS	20ns(1 σ) (@-130 dBm) accuracy, 3.3 volt logic, output impedance CMOS (\pm 20ma)
Power Requirements	Three ranges \pm (9 to 18, 18 to 36, 36 to 65) Vdc (AC adapter available) Power converter can be configured to provide > 500 volts isolation)
Connectors	Power/Alert mate TE Connectivity- 106527-4 (unit comes with mate)
PPS	
Amplitude for 1PPS	3.3 Vdc CMOS (5 Vdc option) on BNC
Pulse width for 1PPS	Programmable 1 to 500ms in 1 ms steps
Rise time for 1PPS	<10 ns (faster edge available)
Connector	BNC
Load Impedance	50 Ohm on three BNC 1000 Ohm on SMA
Location	Rear- SMA on front
Remote interface & control	
Protocol	RS232 NMEA-0183
Connector	DB-9
Location	Rear panel
Protocol	Bit plus stop
Standard Baud Rates	Selectable 4800, 9600, 19200, 38400, 57600 or 115200 bps
GNSS receiver	GPS L1 C/A, GLONASS L1OF, QZSS L1 C/A, SBAS L1 C/A (Ready): Galileo E1B/E1C, QZSS L1S
Channels	26 channels (GPS, GLONASS, QZSS, SBAS)
Sensitivity	
GPS	Tracking: -161 dBm Hot Start: -161 dBm Warm Start: -147 dBm Cold Start: -147 dBm Reacquisition: -161 dBm
GLONASS	Tracking: -157 dBm Hot Start: -157 dBm Warm Start: -143 dBm Cold Start: -143 dBm

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	Reacquisition: -157 dBm	
	With Novus recommended antenna	
Antenna with LNA		
Antenna power	3.5 Vdc, < 35 ma (on center conductor) (factory configurable to 5 Vdc)	
Frequency	1574-1607 MHz	
Nominal Gain	2 dBic	
Amplifier gain	26 dB	
Noise Figure	< 2.0 dB	
Out of Band rejection	Fo±50MHz=60 dBc, Fo±60 MHz	
DC current	<25 ma@3.5 Vdc	

Environmental and Mechanical

Operating temperature	0 to 50C non-condensing (extended temperature range available)	
Storage temperature	-40 to 70C	
Width	5 " (exclusive of connectors)	
Depth	6.4 "	
Height	1.5 "	
Weight	~16 oz	

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