

TimeTools NTP s5000 Radio NTP Time Server

- Stratum 1 NTP/SNTP IP Network Time Server utilising MSF or DCF-77 Radio.
- NTP version 4.2.0 (latest release).
- Highly accurate: Ethernet NTP output jitter typically within 1.4 milliseconds of UTC.
- High Reliability: Convection cooled, solid state design, no moving parts.
- Web based user interface.
- Free firmware upgrades.
- 3 Year Warranty.
- 30 day money-back guarantee.



Product Overview

TimeTools NTP s5000 is a 1U high, rack-mountable stratum 1 Radio NTP Server. It utilises an unmodified version of the latest network time protocol distribution, NTP version 4.2.0.

A high-gain radio receiver constantly monitors either the MSF or DCF-77 radio transmissions to provide a highly accurate timing reference. An ethernet NTP output jitter of less than 1.4 milliseconds is typically achieved.

The unit is a low-power convection cooled device with no moving parts, aiding long term reliability. Our confidence in the reliability of the NTP s5000 is reflected in the provision of a 3 year warranty.

An easy to use password-protected web interface is provided for system configuration and management. FTP can be utilised to download NTP statistics and upload firmware upgrades, provided by TimeTools free of charge.

Radio Antenna

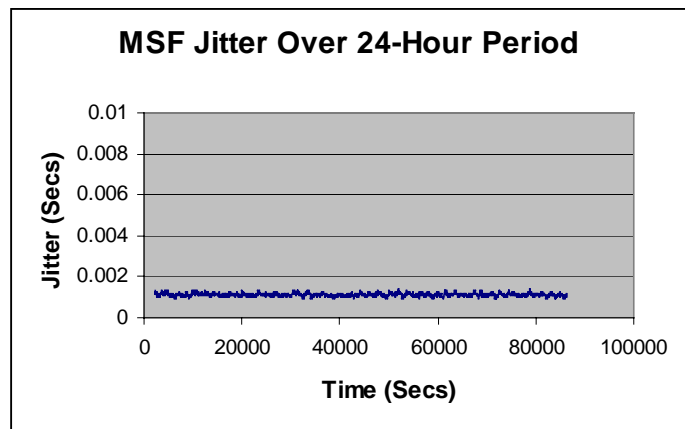
The NTP s5000 is available with MSF-60 or DCF-77 radio antennas. The MSF-60 time signal is available throughout the British Isles and North-Western Europe. The DCF-77 signal is available throughout central and western Europe. The weatherproof antenna supplied can be wall-mounted, outdoors if required, upto 100m from the ntp server with CAT3 or better structured cabling.

Accuracy

With a consistent signal lock, the NTP s5000 Radio Time Server can maintain an accuracy of better than 1.4 milliseconds UTC.

Jitter measures the variance between successive time queries.

The graph opposite shows the jitter between successive time queries of the MSF clock over a 24-hour period.



Product Specification

Accuracy	Ethernet NTP	< 1.4 milliseconds UTC typical
Protocols	NTP SNTP Additional	NTP 4.2.0 (RFC 2030), NTP v4, NTP v3, NTP v2 SNTP v4 HTTP (Web), FTP, Telnet, RS232 Console, Syslog
Connectivity	Ethernet RS232 Radio Connection	10/100 Mbit BaseT , RJ45 auto-sensing RS232 DB9 Console Configuration Port DB9/RJ45 with CAT3,4,5 connectivity
Enclosure	Construction Dimensions Weight Operating Temperature	1U High 19" Rackmount, 1.8mm Aluminium 483 x 158 x 44 mm 2.2Kg -20C ~ +60C
	Relative Humidity	95% non-condensing
Power	Supply Power Consumption	Universal 85-264 VAC 47-440 Hz CE/UL/CSA Approved PSU with standard IEC inlet, other power supply options available on request. 12W approx
Warranty	3 Year Warranty	Extended warranty options available.

Product Codes

NTP s5000 with MSF-60 radio antenna	S50-MPS
NTP s5000 with DCF-77 radio antenna	S50-DPS

Accessories

Cable	20m Antenna Extension Cable	TMC-020
	100m Antenna Extension Cable	TMC-100