



ENTERPRISE CLASS
CELLULAR ROUTERS FOR
RUGGED APPLICATIONS



DIGI TRANSPORT® WR44 R

All-in-one cellular router with advanced routing/VPN features,
designed specifically for use in rugged environments

The Digi TransPort WR44 R is a rugged, all-in-one 4G LTE Advanced mobile communications solution with true enterprise class routing, security and firewall. Featuring a heavy-duty cast aluminum enclosure, it offers a flexible interface design with an optional integrated Wi-Fi access point (with multi SSID), USB, serial and 4-port Ethernet switch, as well as a variety of configuration options including GPS and CAN support.

These routers are ideal for transportation and mobile applications. Flexible power options include 9-36 VDC locking barrel or automotive Molex connectors for direct integration into vehicle applications. Also ideal for mobile

applications is the cellular to Wi-Fi autoswitch feature, which uses the highest speed/lowest cost WAN network available.

All Digi TransPort products offer an advanced routing, security and firewall feature set including stateful inspection firewall and integrated VPN. Enterprise class protocols incorporate BGP, OSPF and VRRP+. Advanced features allow the Digi TransPort to be used as a component of a PCI compliant network.

Digi Remote Manager® provides easy setup, configuration and maintenance of large installations of DigiTransPort and third-party devices.

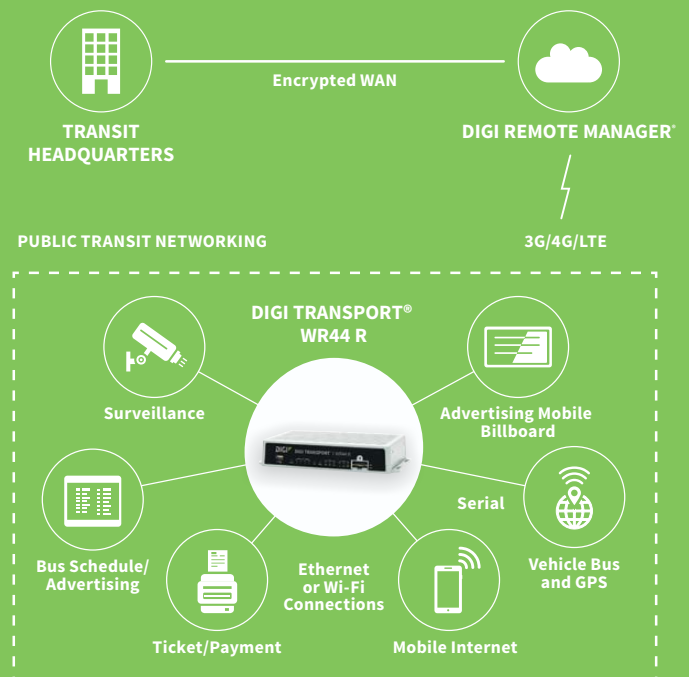
BENEFITS

- Rugged, enterprise-class cellular routers with advanced dynamic routing, security and firewall features
- Heavy-duty cast aluminum enclosure for reliable performance in rugged environments
- Integrated 802.11 ac/a/b/g/n; a/n Wi-Fi access point (optional) and 4-port Ethernet switch
- Flexible interfaces including GPS and CAN with DC power options
- Cellular to Wi-Fi autoswitch feature automatically uses the highest speed/lowest cost WAN network available
- Digi Remote Manager® provides mass configuration, device management and troubleshooting tools

RELATED PRODUCTS



APPLICATION EXAMPLE



SPECIFICATIONS

Digi TransPort® WR44 R

WIRELESS INTERFACES

WWAN**

| | |
|---------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| LTE - EMEA/APAC (L1) | LTE CAT 3: 800(B20)/850(B5)/900(B8)/1800(B3)/1900(B2)/2100(B1)/2600(B7) 3G HSPA+: 850/900/1900/2100 MHz 2G EDGE/GPRS: 850/900/1800/1900 MHz Transfer rate (max): 100 Mbps down, 50Mbps up Approvals: Vodafone |
| LTE - NORTH AMERICA (L5) | Software defined multi-carrier LTE CAT 3: 700(B13,B17)/850(B5)/AWS(B4)/1900(B2,B25) 3G HSPA+: 850/900/1700AWS/1900/2100 MHz 3G EVDO: 800/1900 MHz 2G EDGE/GPRS: 850/900/1800/1900 MHz 2G 1XRTT: 800/1900 MHz Transfer rate (max): 100 Mbps down, 50Mbps up Approvals: Verizon Private Network, DMNR and PNTM, AT&T, Sprint, Telus, Bell |
| CONNECTOR | (2) 50 Ω SMA (Center pin: female) |
| SIM SLOTS | (2) Mini-SIM (2FF) |
| SIM SECURITY | SIM slot cover plate |

WI-FI*

| | |
|----------------------------|--------------------------------------------------------------------------------------------------------------------------------|
| STANDARD | 802.11 ac/a/b/g/n 2.4/5 GHz; Option of dual Wi-Fi modules |
| MODES | Access point, Client and support for multiple SSID |
| TRANSMIT POWER | 20 dBm + 1.0/-1.5 dBm |
| RECEIVE SENSITIVITY | 54 Mbps / <-72 dBm and 11 Mbps / -90 dBm |
| SECURITY | Open or shared key authentication; WEP (64- and 128-bit) encryption; WPA/WPA2 with RADIUS (WPA Enterprise and pre-shared keys) |
| CONNECTORS | (2) 50 Ω RP-SMA (Center pin: male) |

GPS*

| | |
|----------------------------|------------------------------------------------------------------------------------------------------------------------------------------------|
| CHANNELS | 50 |
| SENSITIVITY | -163 dB |
| PROTOCOL | NMEA 0183 V2.3 sentence output; +3.3 VDC active antenna drive; NMEA stream to local serial port or over TCP/IP |
| NAVIGATION | Galileo ready |
| AUGMENTATION | SBAS |
| COLD START | < 27 seconds TTFF (90%) |
| HORIZONTAL ACCURACY | < 2.5 meters (90%) |
| VELOCITY ACCURACY | 0.1m/s |
| CONNECTOR | (1) 50 Ω SMA (Center pin: female) |
| ADDITIONAL FEATURES | Send GPS via UDP/IP, TCP/IP (up to two destinations) or serial; Customize and/or send data using Python; GPS status query; Time source capable |

WIRED INTERFACES

SERIAL

| | |
|-----------------------|-----------------------------------------|
| PORTS | (1) DB-9; DCE |
| STANDARD | RS-232 |
| SIGNAL SUPPORT | TXD, RXD, RTS, CTS, DTR, DCD, DSR, RI |
| FLOW CONTROL | Software (XON/XOFF), Hardware supported |

ETHERNET

| | |
|--------------|---------------------------------------|
| PORTS | (4) RJ-45; 10/100 Mbps (auto-sensing) |
|--------------|---------------------------------------|

USB

| | |
|--------------|--------------------|
| PORTS | (1) USB 2.0 Type A |
|--------------|--------------------|

OTHER

| | |
|------------------------|----------------------------------------|
| EXPANSION CARDS | Option of GPS or Fleet expansion cards |
|------------------------|----------------------------------------|

* Optional hardware.

** Transfer rates are network operator dependent.

SPECIFICATIONS

Digi TransPort® WR44 R

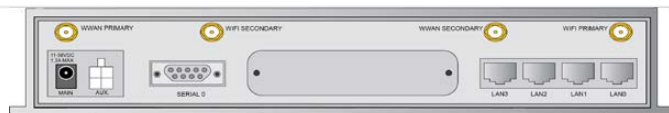
| | |
|-----------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| SOFTWARE | |
| REMOTE MANAGEMENT | Digi Remote Manager* (cloud based); SNMP v1/v2c/v3 (user installed/managed) |
| LOCAL MANAGEMENT | Web Interface (HTTP/HTTPS); CLI (Telnet, SSH, SMS, Serial port) |
| MANAGEMENT/TROUBLESHOOTING TOOLS | FTP, SFTP, SCP, Protocol Analyzer with PCAP for Wireshark, Event Logging with Syslog and SMTP, NTP/SNTP |
| MEMORY | 128 MB NAND Flash/64 MB DDR2 SDRAM |
| POWER | |
| INPUT | 9 – 36 VDC |
| CONSUMPTION | 15W max, 8.5W typical |
| CONNECTOR | Locking barrel and 4-pin terminal block (2 pins are used for power; the other 2 pins are used for I/O). |
| POWER | |
| DIMENSIONS (L X W X H) | 5.5 in x 10 in x 1.9 in (140 mm x 254 mm x 48 mm) |
| WEIGHT | 2.4 lbs (1.1 kg) |
| STATUS LEDS | Power, LAN, Wi-Fi, Serial, WWAN (Link, Act, SIM), Signal strength |
| MATERIAL/RATING | Aluminum Alloy / IP30 |
| MOUNTING | (4) mounting slots on the unit's flange |
| ENVIRONMENTAL | |
| OPERATING TEMPERATURE | Non-Wi-Fi variants: -40° C to +70° C; Single-Wi-Fi variants: -20° C to +70° C; Dual-Wi-Fi variants: -20° C to +60° C; (Reduced cellular performance may occur above +60° C) |
| STORAGE TEMPERATURE | -40° C to +85° C |
| RELATIVE HUMIDITY | 0% to 95% (non-condensing) @ 25° C |
| ETHERNET ISOLATION | 1.5 kV RMS |
| SERIAL PORT PROTECTION (ESD) | 15 kV |
| APPROVALS | |
| CELLULAR | PTCRB, NAPRD.03, GCF-CC, R&TTE, EN 301 511 |
| CDMA/EV-DO | CDG TIA/EIA-690, CDG TIA/EIA-98-E |
| SAFETY | UL 60950, CSA 22.2 No. 60950, EN60950 |
| EMISSIONS/IMMUNITY | CE, FCC Part 15 Class B, AS/NZS CISPR 22, EN55024, EN55022 Class B |
| INDUSTRY | E-Marking (72/245/EEC, 2009/19/EC); Automotive Non-Immunity; applies to WR44-L1F1-NE1-RD only EN 300 019-2-5 (Specification for environmental tests for ground vehicle installations - covers temperature, humidity, vibration and shock) |
| WARRANTY | |
| PRODUCT WARRANTY | 3 years |

ENTERPRISE SOFTWARE

DESCRIPTION

| | |
|-------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| PROTOCOLS | HTTP, HTTPS, FTP, SFTP, SSL, SMTP, SNMP (v1/v2c/v3), SSH, Telnet and CLI for web management; remote management via Digi Remote Manager; SMS management, protocol analyzer, ability to capture PCAP for use with Wireshark; DynDNS; Dynamic DNS client compatible with BIND9/No-IP/DynDNS |
| SECURITY/VPN | Stateful inspection firewall with scripting, address and port translation; VPN: IPSec with IKEv1, IKEv2, NAT Traversal; SSL, SSLv2, FIPS 197, Open VPN client and server; PPTP, L2TP; (5) VPN Tunnels (upgradable to a maximum of 200); Cryptology: SHA-1, MD5, RSA; Encryption: DES, 3DES and AES up to 256-bit; Authentication: RADIUS, TACACS+, SCEP for X.509 certificates; Content Filtering (via 3rd party); MAC Address Filtering; VLAN support; Ethernet Port Isolation |
| ROUTING/FAILOVER | IP pass-through; NAT, NAPT with IP Port Forwarding; Ethernet Bridging; GRE; Multicast Routing; Routing Protocols: PPP, PPPoE, RIP (v1, v2) OSPF, SRI, BGP, iGMP routing (multicast); RSTP (Rapid Spanning Tree Protocol); IP Failover: VRRP, VRRP+TM; Automatic failover/fail-back to second GSM network/Standby APN |
| OTHER PROTOCOLS | DHCP; Dynamic DNS client compatible with BIND9/No-IP/DynDNS; QoS via TOS/DSCP/WRED; Modbus UDP/TCP to serial; X.25 including XOT, SNA/IP, TPAD and PAD; Protocol switch; Modbus bridging for connecting diverse field assets |

PRODUCT IMAGES



* Optional hardware.

** Transfer rates are network operator dependent.

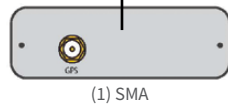
****The enclosure rating is self-declared and has not been formally verified by an independent lab.

SPECIFICATIONS

Connector | Specification

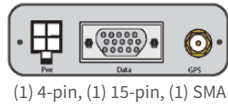


GPS (G1)



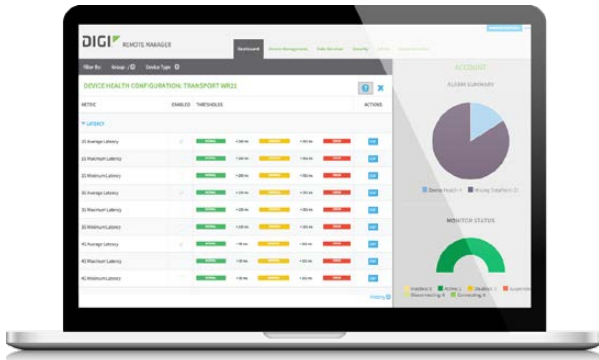
Fully-integrated GPS tracking.
See main specifications area for details.

FLEET (F1)



Flexible transportation/fleet focused applications requiring CAN bus, J1708, GPS, Non-isolated digital I/O, Ignition Sense, 3-Axis accelerometer, and power control of Digi TransPort interfaces. Fully programmable via Python for embedded Digi TransPort applications.

DIGI REMOTE MANAGER®



CAPABILITIES

- Centralized management of remote devices over 3G/4G LTE
- Define standard configurations and automatically monitor individual devices for PCI security compliance
- Report and alert on performance statistics, including connection history, signal quality, latency, data usage and packet loss
- No servers or applications to operate and maintain
- Complete tasks for your entire device network in minutes
- Edit configurations and update firmware for your individual devices or groups
- Monitor the status and location of your remote device via a web browser
- Active or deactivate cellular lines and monitor data to ensure you never incur overage charges

INFRASTRUCTURE

- Hosted in a commercial-grade SAS 70-certified environment
- Superior availability, operating to 99.9% or greater
- Open APIs available to support application development

SECURITY

- Certified SSAE-16 and ISO27001 facilities
- Member of the Cloud Security Alliance
- Over 175 Security Controls in place to protect your data
- Enables compliance with security frameworks like PCI, HIPAA, NIST and more
- Earned SkyHigh's Cloud Trust Program highest ranking of Enterprise-Ready

PART NUMBERS

DESCRIPTION

4G LTE INTERNATIONAL

| | |
|------------------|---------------------------------------|
| WR44-L100-CE1-RF | 4G LTE International, No Wi-Fi |
| WR44-L100-NE1-RF | 4G LTE International, Wi-Fi |
| WR44-L1F1-NE1-RD | 4G LTE International, Wi-Fi, GPS, CAN |
| WR44-L1G1-NE1-RD | 4G LTE International, Wi-Fi, GPS |

4G LTE MULTI-CARRIER SOFTWARE DEFINED, NORTH AMERICA

| | |
|------------------|---------------------------------------------------------------------------|
| WR44-L500-NE1-RF | 4G LTE Multi-Carrier Software Defined, North America, Wi-Fi |
| WR44-L5G1-TE1-RF | 4G LTE Multi-Carrier Software Defined, North America, Dual Wi-Fi, GPS |
| WR44-L500-CE1-RF | 4G LTE Multi-Carrier Software Defined, North America, No Wi-Fi |
| WR44-L5A3-CE1-RF | 4G LTE Multi-Carrier Software Defined, North America, No Wi-Fi, (3) Async |
| WR44-L5F1-NE1-RF | 4G LTE Multi-Carrier Software Defined, North America, Wi-Fi, GPS, CAN |
| WR44-L5G1-CE1-RF | 4G LTE Multi-Carrier Software Defined, North America, No Wi-Fi, GPS |
| WR44-L5G1-NE1-RF | 4G LTE Multi-Carrier Software Defined, North America, Wi-Fi, GPS |

DIGI SERVICE AND SUPPORT / You can purchase with confidence knowing that Digi is always available to serve you with expert technical support and our industry leading warranty. For detailed information visit www.digi.com/support.

© 1996-2017 Digi International Inc. All rights reserved.
All trademarks are the property of their respective owners.

DIGI INTERNATIONAL WORLDWIDE HQ
877-912-3444 / 952-912-3444 / www.digi.com

DIGI INTERNATIONAL GERMANY
+49-89-540-428-0

DIGI INTERNATIONAL JAPAN
+81-3-5428-0261 / www.digi-intl.co.jp

DIGI INTERNATIONAL SINGAPORE
+65-6213-5380

DIGI INTERNATIONAL CHINA
+86-21-50492199 / www.digi.com.cn

91001643
D9/1117

