

Product Highlights

HIGH SPEED

Total wireless connection rate up to 1200Mbps

EXTREME WI-FI PERFORMANCE

MU-MIMO for best rates, 2 data streams for increased throughput

IPV6 SUPPORT

All needed functions for up-to-date networking



DIR-815

AC1200 Wave 2 MU-MIMO Wi-Fi Router

Wireless Interface

Using the DIR-815 device, you are able to quickly create a high-speed wireless network at home or in your office, which lets computers and mobile devices access the Internet virtually anywhere (within the operational range of your wireless network). Simultaneous activity of 2.4GHz band and 5GHz band allows performing a wide range of tasks. The router can operate as a base station for connecting wireless devices of the standards 802.11a, 802.11b, 802.11g, 802.11n, and 802.11ac (at the wireless connection rate up to 1167Mbps¹).

Secure Wireless Connection

The router supports multiple functions for the wireless interface: several security standards (WEP, WPA/WPA2), MAC address filtering, WPS, WMM.

Advanced Capabilities of Wireless Network

Multi-user MIMO technology allows to distribute the router's resources to let multiple wireless clients use the Wi-Fi network efficiently, keeping high rates for HD media streaming, lag-free gaming, and fast transfer of large files.

Transmit Beamforming technology allows to flexibly change the antennas' radiation pattern and to redistribute the signal directly to wireless devices connected to the router.

Smart adjustment of Wi-Fi clients is useful for networks based on several D-Link access points or routers – when the smart adjustment function is configured on each of them, a client always connects to the access point (router) with the highest signal level.

Support of guest Wi-Fi network allows you to create a separate wireless network with individual security settings and maximum rate limitation. Devices connected to the guest network will be able to access the Internet, but will be isolated from the devices and resources of the router's LAN.

Security

The wireless router DIR-815 includes a built-in firewall. The advanced security functions minimize threats of hacker attacks, prevent unwanted intrusions to your network, and block access to unwanted websites for users of your LAN.

In addition, the router supports IPsec and allows to create secure VPN tunnels.

Built-in Yandex.DNS service protects against malicious and fraudulent web sites and helps to block access to adult content on children's devices.

¹ Up to 300Mbps for 2.4GHz and up to 867Mbps for 5GHz.

Easy configuration and update

You can configure the settings of the wireless router DIR-815 via the user-friendly web-based interface (the interface is available in two languages – in Russian and in English).

The configuration wizard allows you to quickly switch DIR-815 to one of the following modes: router (for connection to a wired or wireless ISP), access point, repeater, or client, and then configure all needed setting for operation in the selected mode in several simple steps.

Also DIR-815 supports configuration and management via mobile application for Android and iPhone smartphones.

You can simply update the firmware: the router itself finds approved firmware on D-Link update server and notifies when ready to install it.

Hardware	
Processor	<ul style="list-style-type: none"> RTL8197FN (1GHz)
RAM	<ul style="list-style-type: none"> 64MB, DDR2, built in processor
Flash	<ul style="list-style-type: none"> 16MB, SPI
Interfaces	<ul style="list-style-type: none"> 10/100BASE-TX WAN port 4 10/100BASE-TX LAN ports
LEDs	<ul style="list-style-type: none"> Internet WLAN 2.4G WLAN 5G WAN 4 LAN LEDs
Buttons	<ul style="list-style-type: none"> RST/WPS button to restore factory default settings and set up wireless connection
Antenna	<ul style="list-style-type: none"> Four internal antennas (3.5dBi gain)
MIMO	<ul style="list-style-type: none"> 2 x 2, MU-MIMO
Power connector	<ul style="list-style-type: none"> Power input connector (DC)
Software	
WAN connection types	<ul style="list-style-type: none"> PPPoE IPv6 PPPoE PPPoE Dual Stack Static IPv4 / Dynamic IPv4 Static IPv6 / Dynamic IPv6 PPPoE + Static IP (PPPoE Dual Access) PPPoE + Dynamic IP (PPPoE Dual Access) PPTP/L2TP PPTP/L2TP + Static IP PPTP/L2TP + Dynamic IP
Network functions	<ul style="list-style-type: none"> Support of IEEE 802.1X for Internet connection DHCP server/relay Support of basic DHCP options Stateful/Stateless mode for IPv6 address assignment, IPv6 prefix delegation Automatic obtainment of LAN IP address (for access point/repeater/client modes) DNS relay Dynamic DNS Static IP routing Static IPv6 routing IGMP Proxy MLD Proxy RIP Support of UPnP IGD Support of VLAN WAN ping respond Support of SIP ALG Support of RTSP WAN reservation Autonegotiation of speed, duplex mode, and flow control/Manual speed and duplex mode setup for each Ethernet port Setup of maximum TX rate for each port of the router Built-in UDPXY application
Firewall functions	<ul style="list-style-type: none"> Network Address Translation (NAT) Stateful Packet Inspection (SPI) IP filter IPv6 filter MAC filter URL filter DMZ Prevention of ARP and DDoS attacks Virtual servers Built-in Yandex.DNS web content filtering service
VPN	<ul style="list-style-type: none"> IPsec/PPTP/L2TP/PPPoE pass-through IPsec tunnels

Software	
Management and monitoring	<ul style="list-style-type: none"> · Local and remote access to settings through TELNET/WEB (HTTP/HTTPS) · Bilingual web-based interface for configuration and management (Russian/English) · Support of D-Link Assistant application for Android and iPhone smartphones · Notification on connection problems and auto redirect to settings · Firmware update via web-based interface · Automatic notification on new firmware version · Saving/restoring configuration to/from file · Support of logging to remote host · Automatic synchronization of system time with NTP server and manual time/date setup · Ping utility · Traceroute utility · TR-069 client
Wireless Module Parameters	
Standards	<ul style="list-style-type: none"> · IEEE 802.11ac Wave 2 · IEEE 802.11a/b/g/n
Frequency range <i>The frequency range depends upon the radio frequency regulations applied in your country</i>	<ul style="list-style-type: none"> · 2400 ~ 2483.5MHz · 5150 ~ 5350MHz · 5650 ~ 5850MHz
Wireless connection security	<ul style="list-style-type: none"> · WEP · WPA/WPA2 (Personal/Enterprise) · MAC filter · WPS (PBC/PIN)
Advanced functions	<ul style="list-style-type: none"> · Support of client mode · WMM (Wi-Fi QoS) · Information on connected Wi-Fi clients · Advanced settings · Smart adjustment of Wi-Fi clients · Guest Wi-Fi / support of MBSSID · Rate limitation for wireless network/separate MAC addresses · Periodic scan of channels, automatic switch to least loaded channel · Support of 802.11ac (5GHz) and 802.11n (2.4GHz) TX Beamforming · Autonegotiation of channel bandwidth in accordance with environment conditions (20/40 Coexistence)
Wireless connection rate	<ul style="list-style-type: none"> · IEEE 802.11a: 6, 9, 12, 18, 24, 36, 48, and 54Mbps · IEEE 802.11b: 1, 2, 5.5, and 11Mbps · IEEE 802.11g: 6, 9, 12, 18, 24, 36, 48, and 54Mbps · IEEE 802.11n (2.4GHz): from 6.5 to 300Mbps (MCS0–MCS15) · IEEE 802.11n (5GHz): from 6.5 to 300Mbps (from MCS0 to MCS15) · IEEE 802.11ac (5GHz): from 6.5 to 867Mbps (from MCS0 to MCS9)

Wireless Module Parameters	
<p>Transmitter output power</p> <p><i>The maximum value of the transmitter output power depends upon the radio frequency regulations applied in your country</i></p>	<ul style="list-style-type: none"> · 802.11a (typical at room temperature 25 °C) 14dBm at 6, 9, 12, 18, 24Mbps 13dBm at 36Mbps 12.5dBm at 48Mbps 12dBm at 54Mbps · 802.11b (typical at room temperature 25 °C) 16.5dBm at 1, 2, 5.5, 11Mbps · 802.11g (typical at room temperature 25 °C) 16.5dBm at 6, 9, 12, 18, 24, 36, 48Mbps 15dBm at 54Mbps · 802.11n (typical at room temperature 25 °C) 2.4GHz HT20/HT40 16.5dBm at MCS0~6 16dBm at MCS7 5GHz, HT20 14dBm at MCS0~4 13dBm at MCS5 12.5dBm at MCS6 12dBm at MCS7 5GHz, HT40 14dBm at MCS0~2 13dBm at MCS3~4 12.5dBm at MCS5~6 12dBm at MCS7 · 802.11ac (typical at room temperature 25 °C) VHT20 14dBm at MCS0~4 13dBm at MCS5 12.5dBm at MCS6 12dBm at MCS7 11dBm at MCS8 VHT40 14dBm at MCS0~2 13dBm at MCS3~4 12dBm at MCS5~6 11dBm at MCS7/8/9 VHT80 14dBm at MCS0~4 13dBm at MCS5~6 12dBm at MCS7 11dBm at MCS8/9
<p>Receiver sensitivity</p>	<ul style="list-style-type: none"> · 802.11a (typical at PER < 10% (1000-byte PDUs) at room temperature 25 °C) -82dBm at 6Mbps -81dBm at 9Mbps -79dBm at 12Mbps -77dBm at 18Mbps -74dBm at 24Mbps -70dBm at 36Mbps -66dBm at 48Mbps -65dBm at 54Mbps · 802.11b (typical at PER = 8% (1000-byte PDUs) at room temperature 25 °C) -80dBm at 1Mbps -80dBm at 2Mbps -76dBm at 5.5Mbps -76dBm at 11Mbps · 802.11g (typical at PER < 10% (1000-byte PDUs) at room temperature 25 °C) -82dBm at 6Mbps -81dBm at 9Mbps -79dBm at 12Mbps -77dBm at 18Mbps -74dBm at 24Mbps -70dBm at 36Mbps -66dBm at 48Mbps -65dBm at 54Mbps

Wireless Module Parameters

- 802.11n (typical at PER = 10% (1000-byte PDUs) at room temperature 25 °C)
 - 2.4GHz, HT20
 - 82dBm at MCS0
 - 79dBm at MCS1
 - 77dBm at MCS2
 - 74dBm at MCS3
 - 70dBm at MCS4
 - 66dBm at MCS5
 - 65dBm at MCS6
 - 64dBm at MCS7
 - 2.4GHz, HT40
 - 79dBm at MCS0
 - 76dBm at MCS1
 - 74dBm at MCS2
 - 71dBm at MCS3
 - 67dBm at MCS4
 - 63dBm at MCS5
 - 62dBm at MCS6
 - 61dBm at MCS7
 - 5GHz, HT20
 - 82dBm at MCS0
 - 79dBm at MCS1
 - 77dBm at MCS2
 - 74dBm at MCS3
 - 70dBm at MCS4
 - 66dBm at MCS5
 - 65dBm at MCS6
 - 64dBm at MCS7
 - 5GHz, HT40
 - 79dBm at MCS0
 - 76dBm at MCS1
 - 74dBm at MCS2
 - 71dBm at MCS3
 - 67dBm at MCS4
 - 63dBm at MCS5
 - 62dBm at MCS6
 - 61dBm at MCS7

- 802.11ac (typical at PER = 10% (1000-byte PDUs) at room temperature 25 °C)
 - VHT20
 - 82dBm at MCS0
 - 79dBm at MCS1
 - 77dBm at MCS2
 - 74dBm at MCS3
 - 70dBm at MCS4
 - 66dBm at MCS5
 - 65dBm at MCS6
 - 64dBm at MCS7
 - 56dBm at MCS8
 - VHT40
 - 79dBm at MCS0
 - 76dBm at MCS1
 - 74dBm at MCS2
 - 71dBm at MCS3
 - 67dBm at MCS4
 - 63dBm at MCS5
 - 62dBm at MCS6
 - 61dBm at MCS7
 - 56dBm at MCS8
 - 54dBm at MCS9
 - VHT80
 - 76dBm at MCS0
 - 73dBm at MCS1
 - 71dBm at MCS2
 - 68dBm at MCS3
 - 64dBm at MCS4
 - 60dBm at MCS5
 - 59dBm at MCS6
 - 58dBm at MCS7
 - 53dBm at MCS8
 - 51dBm at MCS9

Wireless Module Parameters	
Modulation schemes	<ul style="list-style-type: none">· 802.11a: BPSK, QPSK, 16QAM, 64QAM with OFDM· 802.11b: DQPSK, DBPSK, DSSS, CCK· 802.11g: BPSK, QPSK, 16QAM, 64QAM with OFDM· 802.11n: BPSK, QPSK, 16QAM, 64QAM with OFDM· 802.11ac: BPSK, QPSK, 16QAM, 64QAM, up to 256QAM with OFDM

Physical Parameters	
Dimensions (L x W x H)	<ul style="list-style-type: none">· 160 x 55 x 110 mm (6 x 2 x 4 in)
Weight	<ul style="list-style-type: none">· 197 g (0.43 lb)

Operating Environment	
Power	<ul style="list-style-type: none">· Output: 12V DC, 0.5A
Temperature	<ul style="list-style-type: none">· Operating: from 0 to 40 °C· Storage: from -20 to 65 °C
Humidity	<ul style="list-style-type: none">· Operating: from 10% to 90% (non-condensing)· Storage: from 5% to 95% (non-condensing)

Delivery Package	
<ul style="list-style-type: none">· Router DIR-815· Power adapter DC 12V/0.5A· Ethernet cable· "Quick Installation Guide" (brochure)	