

Product Highlights

HIGH SPEED

Total wireless connection rate up to 750Mbps

DUAL BAND

Simultaneous operation in 5GHz band and 2.4GHz band, 802.11a/b/g/n/ac compatible

SECURITY

Multiple firewall functions, several security standards for wireless connection



DIR-806A

Wireless AC750 Dual Band Router & Access Point

Wireless Interface

Using the DIR-806A 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 733Mbps¹).

Secure Wireless Connection

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

Router Mode

You are able to connect DIR-806A switched to the router mode to a cable or DSL modem or to a private Ethernet line and use a high-speed Internet connection to successfully fulfill a wide range of professional tasks.

Access Point Mode

You are able to use DIR-806A switched to the access point mode to create a wireless network or to connect to a wired router.

“Client” Function

The “client” function in the router mode allows using DIR-806A as a WISP repeater, in the access point mode as a wireless client and a wireless repeater.

Security

The wireless router DIR-806A 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.

Easy configuration and update

You can configure the settings of the wireless router DIR-806A via the user-friendly web-based interface (the interface is available in several languages).

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

¹ Up to 300Mbps for 2.4GHz and up to 433Mbps for 5GHz.

Hardware	
Interfaces	<ul style="list-style-type: none"> 10/100BASE-TX WAN port 4 10/100BASE-TX LAN ports Micro-USB 2.0 type A port for power supply
LEDs	<ul style="list-style-type: none"> Operating mode WLAN Internet 4 LAN LEDs
Buttons	<ul style="list-style-type: none"> RESET/WPS button to restore factory default settings and set up secure wireless connection
Antenna	<ul style="list-style-type: none"> Two external detachable dual band antennas (5dBi gain)
Power connector	<ul style="list-style-type: none"> Power input connector (DC)

Software	
Operation Modes	<ul style="list-style-type: none"> Router mode Access point mode
WAN connection types	<ul style="list-style-type: none"> PPPoE Static IP / Dynamic IP PPPoE + Static IP / Dynamic IP PPTP/L2TP + Static IP PPTP/L2TP + Dynamic IP
Network functions	<ul style="list-style-type: none"> DHCP server/relay DNS relay Dynamic DNS Static IP routing IGMP Proxy RIP Support of UPnP IGD Support of VLAN Flow control WAN ping respond Support of SIP ALG Support of RTSP
Firewall functions	<ul style="list-style-type: none"> Network Address Translation (NAT) Stateful Packet Inspection (SPI) IP filter MAC filter URL filter DMZ Prevention of ARP and DDoS attacks Virtual servers
VPN	<ul style="list-style-type: none"> IPSec/PPTP/L2TP/PPPoE pass-through
Management	<ul style="list-style-type: none"> Local and remote access to settings through TELNET/WEB (HTTP) Multilingual web-based interface for configuration and management Firmware update via web-based interface Automatic notification on new firmware version Saving/restoring configuration to/from file Support of remote logging Automatic synchronization of system time with NTP server and manual time/date setup Ping function Traceroute utility TR-069 client

Wireless Module Parameters	
Standards	<ul style="list-style-type: none"> · IEEE 802.11a/n/ac · IEEE 802.11b/g/n
Frequency range	<ul style="list-style-type: none"> · 2400 ~ 2483.5MHz · 5150 ~ 5350MHz
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 MBSSID · "Client" function in the router mode (WISP repeater) · "Client" function in the access point mode (wireless network client, wireless network repeater) · WMM (Wi-Fi QoS) · Information on connected Wi-Fi clients · Advanced settings
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/5GHz): from 6.5 to 300Mbps (from MCS0 to MCS15) · IEEE 802.11ac (5GHz): from 6.5 to 433Mbps (from MCS0 to MCS9)
Transmitter output power <i>The maximum value of the transmitter output power depends upon the radio frequency regulations applied in your country</i>	<ul style="list-style-type: none"> · 802.11a (typical at room temperature 25 °C) 15dBm (+/-1.5dB) at 6, 9, 12, 18, 24, 36, 48Mbps 14dBm (+/-1.5dB) at 54Mbps · 802.11b (typical at room temperature 25 °C) 15dBm (+/-1.5dB) at 1, 2, 5.5, 11Mbps · 802.11g (typical at room temperature 25 °C) 15dBm (+/-1.5dB) at 6, 9, 12, 18, 24, 36, 48, 54Mbps · 802.11n (typical at room temperature 25 °C) 2.4GHz, HT20 15dBm (+/-1.5dB) at MCS0/1/2/3/4/5/6/7/8/9/10/11/12/13/14/15 2.4GHz, HT40 15dBm (+/-1.5dB) at MCS0/1/2/3/4/5/6/7/8/9/10/11/12/13/14/15 5GHz, HT20 15dBm (+/-1.5dB) at MCS0/1/2/3/4/5/6/7 5GHz, HT40 15dBm (+/-1.5dB) at MCS0/1/2/3/4/5/6/7 · 802.11ac (typical at room temperature 25 °C) HT20 15dBm (+/-1.5dB) at MCS0/1/2/3/4/5/6/7 HT40 15dBm (+/-1.5dB) at MCS0/1/2/3/4/5/6/7 HT80 15dBm (+/-1.5dB) at MCS0/1/2/3/4/5/6/7 14dBm (+/-1.5dB) at MCS8 13dBm (+/-1.5dB) at MCS9

Wireless Module Parameters

Receiver sensitivity

- 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)
 - 84dBm at 1Mbps
 - 84dBm at 2Mbps
 - 82dBm at 5.5Mbps
 - 79dBm 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

- 802.11n (typical at PER = 10% (1000-byte PDUs))
 - 2.4GHz, HT20
 - 91dBm at MCS0
 - 88dBm at MCS1
 - 86dBm at MCS2
 - 83dBm at MCS3
 - 79dBm at MCS4
 - 75dBm at MCS5
 - 74dBm at MCS6
 - 73dBm at MCS7
 - 88dBm at MCS8
 - 85dBm at MCS9
 - 83dBm at MCS10
 - 80dBm at MCS11
 - 76dBm at MCS12
 - 72dBm at MCS13
 - 71dBm at MCS14
 - 70dBm at MCS15
 - 2.4GHz, HT40
 - 88dBm at MCS0
 - 85dBm at MCS1
 - 83dBm at MCS2
 - 80dBm at MCS3
 - 76dBm at MCS4
 - 72dBm at MCS5
 - 71dBm at MCS6
 - 70dBm at MCS7
 - 85dBm at MCS8
 - 82dBm at MCS9
 - 80dBm at MCS10
 - 77dBm at MCS11
 - 73dBm at MCS12
 - 69dBm at MCS13
 - 68dBm at MCS14
 - 67dBm at MCS15
 - 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

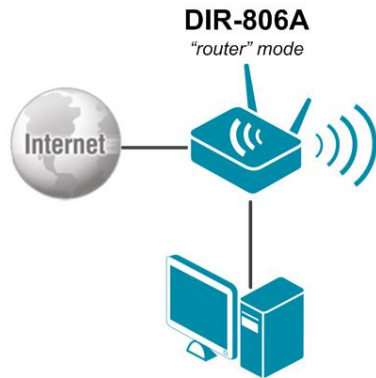
Wireless Module Parameters	
	<p>5GHz, HT40 -79dBm at MCS0 -76dBm at MCS1 -74dBm at MCS2 -71dBm at MCS3 -67dBm at MCS4 -63dBm at MCS5 -62dBm at MCS6 -61dBm at MCS7</p> <ul style="list-style-type: none"> 802.11ac (typical at PER = 10% (1000-byte PDUs)) <ul style="list-style-type: none"> HT20 <ul style="list-style-type: none"> -82dBm at MCS0 -79dBm at MCS1 -77dBm at MCS2 -74dBm at MCS3 -70dBm at MCS4 -66dBm at MCS5 -65dBm at MCS6 -64dBm at MCS7 HT40 <ul style="list-style-type: none"> -79dBm at MCS0 -76dBm at MCS1 -74dBm at MCS2 -71dBm at MCS3 -67dBm at MCS4 -63dBm at MCS5 -62dBm at MCS6 -61dBm at MCS7 HT80 <ul style="list-style-type: none"> -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
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"> 116 x 81.7 x 21.5 mm (0.26 x 0.18 x 0.047 in)
Weight	<ul style="list-style-type: none"> 390 g (0.86 lb)

Operating Environment	
Power	<ul style="list-style-type: none"> Output: 5V DC, 1.2A
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-806A Power adapter DC 5V/1.2A Ethernet cable "Quick Installation Guide" (brochure)

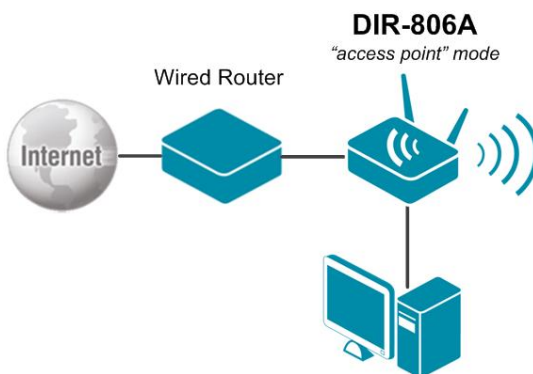
Router



The DIR-806A device in the "router" mode is connected to a private Ethernet line or to a cable or DSL modem. Computers connect to DIR-806A via wireless or wired connection.

It is necessary to specify the same encryption parameters and the channel of the wireless network for DIR-806A and computers with Wi-Fi adapters. In addition, it is necessary to configure a WAN connection for DIR-806A.

Access Point



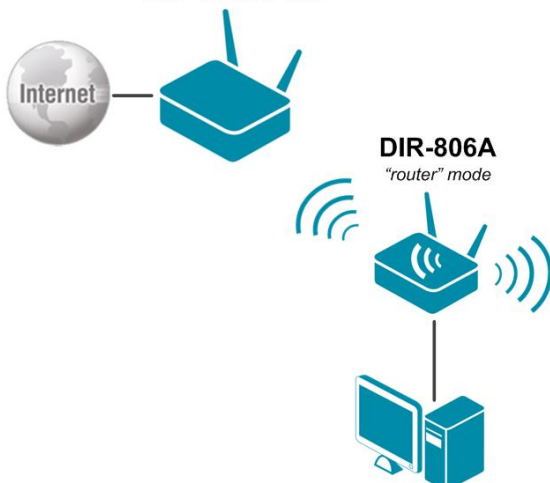
The DIR-806A device in the "access point" mode is connected to the wired router. Computers connect to DIR-806A via wireless or wired connection.

It is necessary to specify the same encryption parameters and the channel of the wireless network for DIR-806A and computers with Wi-Fi adapters.

Client

WISP Repeater

WISP Access Point

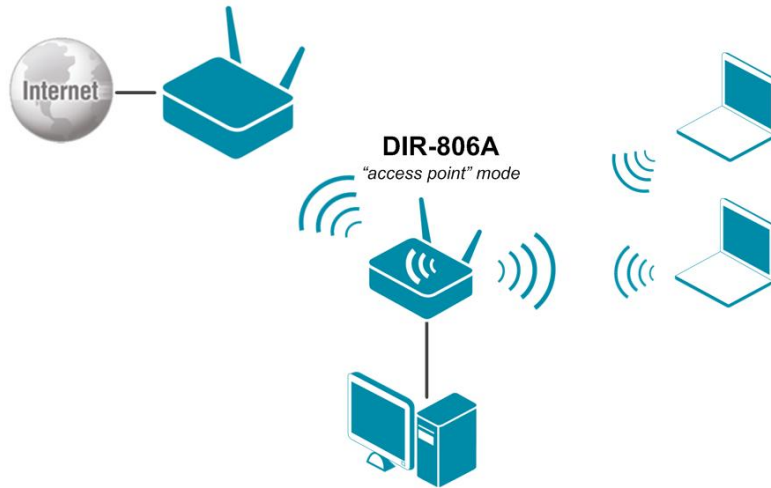


The DIR-806A device in the "router" mode is connected to a WISP access point via wireless connection. Computers connect to DIR-806A via wireless or wired connection.

It is necessary to configure the same channel of the wireless connection for DIR-806A and the WISP access point. Other parameters of the wireless network of DIR-806A do not depend upon the settings of the WISP access point. In addition, it is necessary to configure a WAN connection for DIR-806A.

Wireless Network Client

Wireless Access Point

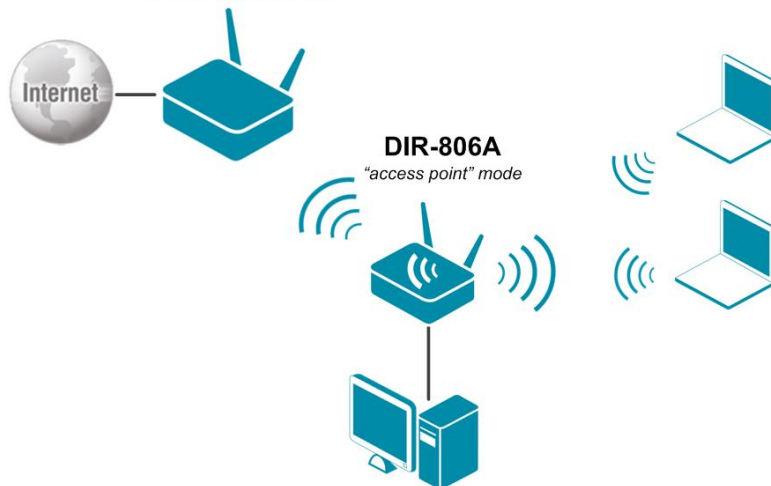


The DIR-806A device in the "access point" mode is connected to an access point via wireless connection. Computers connect to DIR-806A via wireless or wired connection.

It is necessary to configure the same channel of the wireless connection for DIR-806A and the remote access point. Other parameters of the wireless network of DIR-806A do not depend upon the settings of the remote access point.

Wireless Network Repeater

Wireless Access Point



The DIR-806A device in the "access point" mode is connected to an access point via wireless connection. Computers connect to DIR-806A via wireless or wired connection.

It is necessary to configure the same parameters of the wireless connection (the name of the wireless network, encryption parameters, and the channel) for DIR-806A and the remote access point.