



2.4 GHz 802.11b and 802.11g (b/g) 32W FET High Power WiFi Amplifier with Active Power Control

Features

- Integral lightning protection
- Receive bandpass filter
- 23 dB Receive Signal Gain (Up to 28 dB Available)
- IEEE 802.11g (b/g) and 802.11b compatible (see model chart)
- Streaming media ready
- Standard models: 8W, 10W, 20W and 25W
- Indoor and outdoor models
- Outdoor models include weatherproof enclosure
- Design features 32W FET for maximum linearity
- Machined aluminum construction
- Optional cooling fan available
- Transmit and receive LEDs
- Durable UV-Stable finish
- Available with N-Female connectors
- 1 Year Warranty
- Optional weatherproof enclosures available



Models

Indoor Amp Models	Max Output	Connectors	802.11b	802.11g
HA2408GTI-NF	8 Watt (32W FET)	N-Female		
HA2410GTI-NF	10 Watt (32W FET)	N-Female		
HA2420TI-NF	20 Watt (32W FET)	N-Female		
HA2425TI-NF	25 Watt (32W FET)	N-Female		
Outdoor Amp Models	Max Output	Connectors	802.11b	802.11g
HA2408GT-KIT (Amplifier and Weatherproof Enclosure)	8 Watt (32W FET)	N-Female		
HA2410GT-KIT (Amplifier and Weatherproof Enclosure)	10 Watt (32W FET)	N-Female		
HA2420T-KIT (Amplifier and Weatherproof Enclosure)	20 Watt (32W FET)	N-Female		
HA2425T-KIT (Amplifier and Weatherproof Enclosure)	25 Watt (32W FET)	N-Female		

Optional Cooling Fan



Description

This easy to install high airflow, low noise cooling fan attaches directly to the top of the amplifier. It is powered directly from the amplifier's power terminal strip. Includes Fan, Fan Guard and Mounting Hardware.



Description

HyperAmp® TI/GTI series are high power versions of Hyperlink's indoor RF amplifiers for 2.4 GHz spread spectrum wireless LANs. High power and excellent linearity make it the highest performance wireless LAN amplifiers available today. These WiFi amplifiers are compatible with 802.11g and 802.11b wireless LAN equipment. Hyperlink's APC (Active Power Control) circuit automatically adjusts the amplifier's gain to provide a constant output power regardless of cable length. Consisting of a receive amplifier and a transmit power amplifier, the HyperAmp® TI/GTI series installs indoors near the radio itself, combining ease of installation with significant improvement in operating range and performance.

Our design features 32W FET allowing these amplifiers to deliver full rated linear output in 802.11g mode.

HyperAmp® "TI/GTI" series WiFi amplifiers increase range by providing transmit gain as well as 23 dB of receive gain (up to 28 dB available). This receive gain actually increases the receive sensitivity of most wireless LAN radios. This unit can be configured to deliver full transmit power with as little as 1 mW of input power. This feature permits cable runs of several hundred feet with no degradation in operating range.

Power Supply



The HyperAmp® TI/GTI amplifiers feature a heavy-duty enclosure machined from a single block of aluminum making it suitable for demanding commercial and military applications. Included with the amplifier is a 12 VDC @10.8A (130W) power supply.

Outdoor Applications

The **HA2408GT-KIT**, **HA2410GT-KIT**, **HA2420T-KIT** and **HA2425T-KIT** are ideal for outdoor applications. Along with the amplifier, they feature a 14"x12"x7" weatherproof enclosure with a thermostat controlled cooling fan. These enclosures feature fiberglass construction, stainless steel quick release latches with padlock hasps and integral mounting flange. Each kit includes:



- WiFi Amplifier
- Weatherproof Enclosure with Thermostat Controlled Cooling Fan
- Aluminum Mounting Plate for 12 VDC Operation
- 12 in. DC Jumper Cable (connects amp to power terminal strip)
- (2) N-Male Right Angle to N-Male 2 ft. Pigtail Cables
- (2) N-Female to N-Female Bulkhead Lightning Surge Protectors
- 2-Position Terminal Block (connects power supply to 10 AWG cable)

Note: These enclosures can also be purchased separately (see below).

Streaming Media Ready

WiFi components used in a Streaming Video or Audio system work harder than ones carrying Data only. They are turned on for extended periods of time without the chance to cool off. Microwave devices are very sensitive to the heat generated from operating at high duty cycles. Most amplifiers, or for that matter many Radios, cannot pass Streaming Media content for extended periods of time without overheating. Some products were designed for Data only use and have no method of heatsinking. If you use them in a Streaming Media system, those products will self-destruct or have their lifespan diminished. It would be the equivalent removing the Heatsink or Fans from your PC.



Hyperlink Technologies "Streaming Media Ready" amplifiers were designed from the start to survive the extreme conditions that Streaming Media imposes on an amplifier. Using proprietary Heatsinking and Biasing techniques, Hyperlink's Streaming Media amplifiers will remain at a safe operating temperatures for the most demanding Streaming Media applications.

Product Availability

These amplifier products are available only for export, military, licensed amateur radio and OEM component sales only and are not offered for general sale within the USA.

Note:

This Hyperlink bi-directional amplifier is designed for burst half-duplex operation. It is not intended for constant transmit or CW operation. Operation of the amplifier in CW mode will damage the amplifier and void the warranty.

Specifications

Models	Transmit Power	802.11b	802.11g
HA2408GTI	8 Watt (39 dBm) (32W FET)		
HA2410GTI	10 Watt (40 dBm) (32W FET)		
HA2420TI	20 Watt (43 dBm) (32W FET)		
HA2425TI	25 Watt (44 dBm) (32W FET)		

General Specifications (All Models)	
Frequency	2400 - 2500 MHz
Receive Gain*	23 dB (up to 28 dB available)
Operating Mode	Bi-directional, half-duplex Time Division Duplex. Senses RF carrier from transmitter and automatically switches from receive to transmit mode
Amplifier Dimensions (L x D x H)	8.65 x 4.25 x 2.9 (inches) 220 x 108 x 74 (mm)
Amplifier Weight	3.4 lbs. (1.54 kg)
Current Draw	10A Peak Tx and 0.15A Peak Rx
Supply Voltage	12VDC +/- 0.5V
Operating Temperature	-40°C to 50°C (-40°F to 122°F)
**Receive Gain ranging from 15-28 dB available with custom orders.	

Outdoor Models Enclosure Specifications	
Enclosure Material	Fiberglass Reinforced Polyester
Enclosure Color	Machine Tool Gray
Total Weight (Amplifier and Enclosure)	16.8 lbs. (7.62 kg)
Outside Enclosure Dimensions (max)	15.5 x 13.5 x 8.7 inches (39.3 x 34.2 x 22 cm)
Enclosure Flame Rating	UL 94-5V
Cable Feed	1/2" Cable Conduit Connector
Ratings	NEMA 3R / IP42

Guaranteed Quality

HyperAmp® is designed and manufactured by HyperLink Technologies in the U.S.A. and is backed by Hyperlink's Limited Warranty.



Amplifier Enclosures and Accessories

Part Number	Description
NB141207-10FA 	Weather Proof Enclosure for HA2408/10GTI and HA2420/25TI Amplifiers and Power Supply. Includes: • Enclosure with Thermostat Controlled Cooling Fan • Aluminum Mounting Plate with 110 VAC Outlets • (2) N-Male Right Angle to N-Male 2 ft. Pigtail Cables • (2) N-Female to N-Female Bulkhead Lightning Surge Protectors
NB141207-50FA 	Weather Proof Enclosure for HA2408/10GTI and HA2420/25TI Amplifiers Only (for applications requiring remote mounted power supply). Includes: • Enclosure with Thermostat Controlled Cooling Fan • Aluminum Mounting Plate for 12 VDC Operation • 12 in. DC Jumper Cable (connects amp to power terminal strip) • (2) N-Male Right Angle to N-Male 2 ft. Pigtail Cables • (2) N-Female to N-Female Bulkhead Lightning Surge Protectors • 2-Position Terminal Block (connects power supply to 10 AWG cable)

Note: These enclosures are only available with a purchase of a HA2408GTI, HA2410GTI, HA2420TI or HA2425TI amplifier.

Mounting Brackets	
Part Number	Description
HGX-PMT13 	Universal Pole Mounting Kit. This kit is used to mount NB141207 or NB181608 series weatherproof enclosure to 2" (50.8mm) to 4" (101.6mm) Dia. Poles. For larger diameter poles, slots are provided in the rails for 1/2" (12.7mm) wide worm drive clamps. Kit includes: • (2) Mounting Rails • (2) U-Bolts and Hardware For poles 1-1/4" (31.7mm) to 2" (50.8mm) dia. the HGX-PMT07 (2 required) can be used with this kit.
HGX-PMT07 	U-Bolt Kit for mounting to 1-1/4" (31.7mm) to (50.8mm) dia. poles. For use with the HGX-PMT13. Kit includes (1) zinc plated steel U-Bolt and hardware.