

Highlights

Radio Technology

- 802.11ac - 5 GHz 3x3:3
- 802.11ac - 2.4 GHz 3x3:3

Simplified Deployments

- Device auto-provisioning
- Visual and audio RF alignment tools

Reliable Outdoor Access

- Distributed control Wi-Fi delivers self-optimizing and self-healing mobility
- Automated client distribution between radios or neighboring access points
- Dynamic mesh backhaul

Secure Network Access

- Broad range of authentication modes for all devices from Corporate to IoT
- Integrated enterprise protection mechanisms including WIPS and VPN



ExtremeWireless[™] AP1130

Enterprise-Grade High Performance, Rugged 2x2:2 802.11ac MIMO Solution, Especially Designed for Outdoor High-Bandwidth-Demand Wireless Deployments in Harsh Environments

The AP1130 is designed for extended temperature range and a watertight chassis making it suitable for the toughest environments. The AP1130 provides high-performance dual band concurrent (2.4 GHz and 5 GHz) 802.11ac (2x2:2) MIMO.

The AP1130 can be easily installed in hard-to-reach places like rooftops and poles by a single person. It also features intuitive LEDs which indicate the AP status and backhaul connections either over Ethernet or wireless (mesh backhaul). Additionally, the AP1130 enables accurate tuning of directional antennas for long range point-to-point mesh connections, providing a visual and audio mechanism to accurately identify the most suitable orientation for antennas, such that the mesh link is formed at the highest possible negotiated rate, leading to improved user experience.



Built to Suit Your Business Needs

Extreme Elements are the building blocks that allow you to tailor your network to your specific business environment, goals, and objectives. They enable the creation of an Autonomous Network that delivers the positive experiences and business outcomes most important to your organization.

Combining architecture, automation, and artificial intelligence, Extreme Elements enable you to ensure that your users get what they need — when and where they need it. Providing these superior user experiences is as simple as mixing and matching the right elements.

Learn more at extremenetworks.com/elements/.



Advanced Security

This access point delivers the highest level of security services, including a fully stateful L2-L7 DPI firewall for context-based access security, Private Pre-Shared Key (PPSK) authentication, on-board RADIUS services, WIPS, VPN tunnelling, and much more.



Easy Deployment

Intuitive LEDs which indicate the AP status and backhaul connections either over Ethernet or wireless (mesh backhaul). Accurately tune directional antennas for long range point-to-point mesh connections with visual and audio mechanisms to accurately identify the most suitable orientation for antennas, such that the mesh link is formed at the highest possible negotiated rate, leading to improved user experience.



Resilient Outdoor Access

Distributed control Wi-Fi architecture delivers self-organizing, self-healing, and self-optimizing connectivity in the most challenging environments, eliminating single points of failure and bottlenecks, delivering bulletproof stability and unbridled performance, and offering unparalleled scale.



Management Analytics

In conjunction with Extreme's management system, this access point provides a rich set of data displayed via context driven widgets, detailing historical data and real-time analytics. This provides context-specific granularity with perspective views for locations, network, network devices, individual client devices, as well as policy roles. In each context, administrators can adjust dashboards from the widget library.



RF Monitoring

Adaptive RF algorithms provide intelligent selection of the best channels and transmit power for unimpaired network access. Load balancing, band steering and many other attributes of the RF can all be automated. In addition, administrators can view network health through Extreme's management system.



Performance Optimization

With a performance optimized operating system, this access point works collectively with neighboring devices to fine tune overall network health for connected clients, utilizing a granular, customizable QoS engine that adjusts performance based on user, device, and application privileges.

Product Specifications

Radio Specifications

802.11a

- 5.150–5.850 GHz Operating Frequency
- Orthogonal Frequency Division Multiplexing (OFDM) Modulation
- Rates (Mbps): 54, 48, 36, 24, 18, 12, 9, 6 w/ auto fallback

802.11b

- 2.4–2.5 GHz Operating Frequency
- Direct-Sequence Spread-Spectrum (DSSS) Modulation
- Rates (Mbps): 11, 5.5, 2, 1 w/auto fallback

802.11g

- 2.4–2.5 GHz Operating Frequency
- Orthogonal Frequency Division Multiplexing (OFDM) Modulation
- 20 dBm (100 mW) Transmit Power
- Rates (Mbps): 54, 48, 36, 24, 18, 12, 9, 6 w/ auto fallback

802.11n

- 2.4–2.5 GHz & 5.150–5.850 GHz Operating Frequency
- 802.11n Modulation
- Rates (Mbps): MCS0 - MCS15 (6.5Mbps - 300Mbps)
- 2x2 Multiple-In, Multiple-Out (MIMO) Radio
- HT20 High-Throughput for 2.4 GHz and 5 GHz
- HT40 High Throughput for 5 GHz
- A-MPDU and A-MSDU Frame Aggregation

802.11ac

- 5.150–5.850 GHz Operating Frequency
- 802.11ac Modulation (256-QAM)
- Rates (Mbps): MCS0–MCS9 (6.5Mbps - 867Mbps), NSS = 1-2.
- 2x2:2 Stream Multiple-In, Multiple-Out (MIMO) Radio
- VHT20/VHT40/VHT80 support

Interfaces

- Autosensing 10/100/1000 BASE-T Ethernet PoE (Power over Ethernet 802.3at) Port

Power Specifications

- IEEE 802.3at PoE Power
- 12 V DC input

Physical

- LxWxH: 7.71x7.71x2.12in (196x196x54mm) without brackets and antennas
- 2.6 lbs (1.079 Kg), without brackets and antennas

Antennas

- 4x N-type jack antenna connections for external antennas
- Antennas sold as accessory

Included Mounting Options

- Wall Mounted
- Pole mounted – 1-2.75inch pole strap included

Environmental

- Operating: -40 to 55 °C, Storage: -40 to +80 °C
- Humidity: 95%

Environmental Compliance

- IP 67

Power Options

- 802.3at Power over Ethernet (PoE) port

Power and Sensitivity

Power - 2.4 GHz

Channel	Data Rate	Power (dBm)
11b	1,2,5,5,11 Mbps	23
11g	6 - 24 Mbps	21
	36 Mbps	20
	48 Mbps	19
	54 Mbps	18
11n HT20	MCS0-4, 8-12	22
	MCS5, 13	21
	MCS6, 14	19
	MCS7,15	18

Receive Sensitivity - 2.4 GHz

Channel	Data Rate	Power (dBm)
11b	1 Mbps	-98
	11 Mbps	-90
11g	6 - 24 Mbps	-94, -85
	36 Mbps	-82
	48 Mbps	-77
	54 Mbps	-76
	MCS0 - 4, 8 - 12	-93, -80
11n HT20	MCS5,13	-76
	MCS6,14	-74
	MCS7,15	-73

Power - 5 GHz

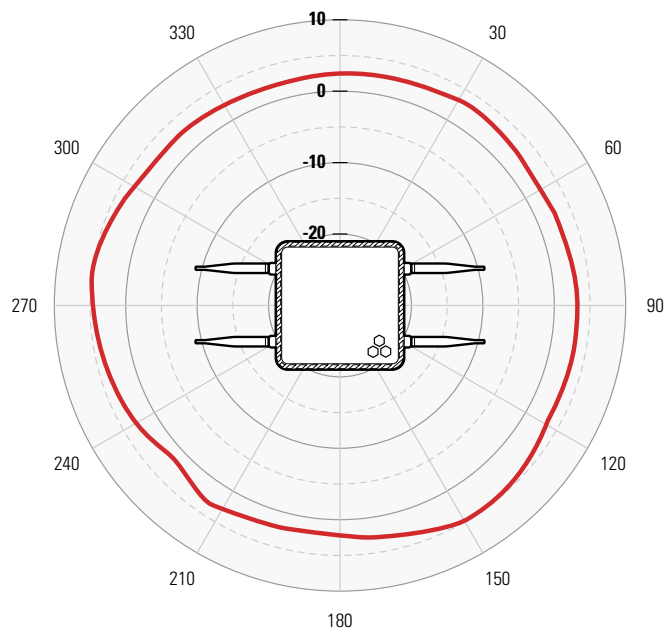
Channel	Data Rate	Power (dBm)
11a	6 - 24 Mbps	21
	36 Mbps	19
	48 Mbps	18
	54 Mbps	17
11n HT20	MCS0 - 4, 8 - 12	21
	MCS5, 13	19
	MCS6, 14	18
	MCS7, 15	17
11n HT40	MCS0 - 4, 8 - 12	20
	MCS5, 13	19, 18
	MCS6, 14	18, 17
	MCS7, 15	17, 16
11ac VHT	256QAM @ 3/4 Code Rate	16
	256QAM @ 5/6 Code Rate	15

Receive Sensitivity - 5 GHz

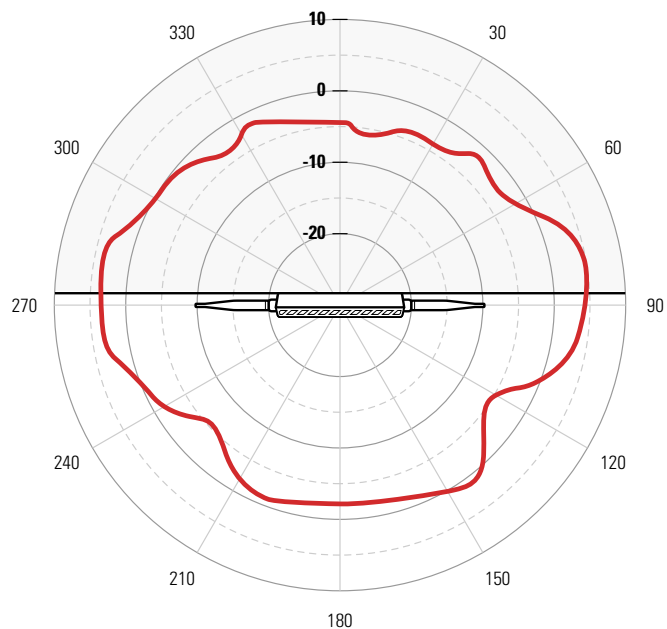
Channel	Data Rate	Power (dBm)
11a	6 - 24 Mbps	-94, -86
	36 Mbps	-82
	48 Mbps	-78
	54 Mbps	-77
11n HT20	MCS0 - 4, 8 - 12	-93, -81
	MCS5,13	-76
	MCS6,14	-75
	MCS7,15	-73
11n HT40	MCS0 - 4, 8 - 12	-93 to -81, -90 to -78
	MCS5,13	-77, -74
	MCS6,14	-75, -72
	MCS7,15	-74, -71
11ac HT20	256QAM @ 3/4 Code Rate	-69
11ac HT40	256QAM @ 3/4 Code Rate	-66
	256QAM @ 5/6 Code Rate	-64
11ac HT80	256QAM @ 3/4 Code Rate	-63
	256QAM @ 5/6 Code Rate	-61

Radiation Patterns - Azimuth and Elevation

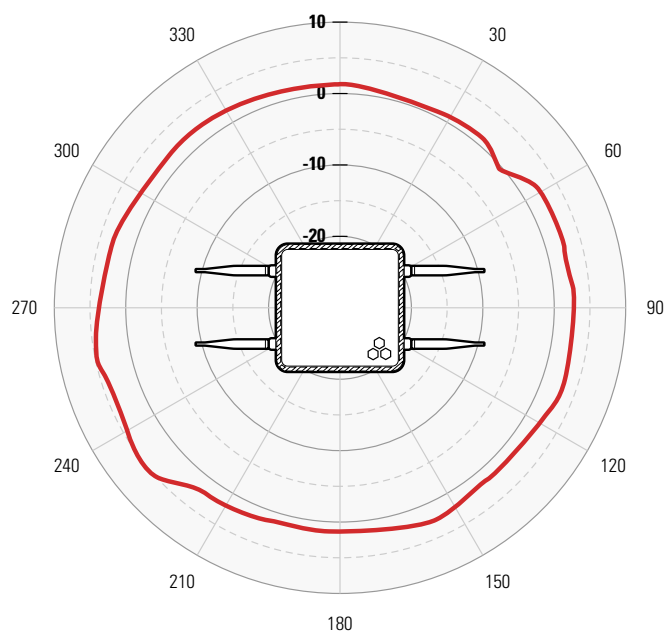
Azimuth - 2.4 GHz



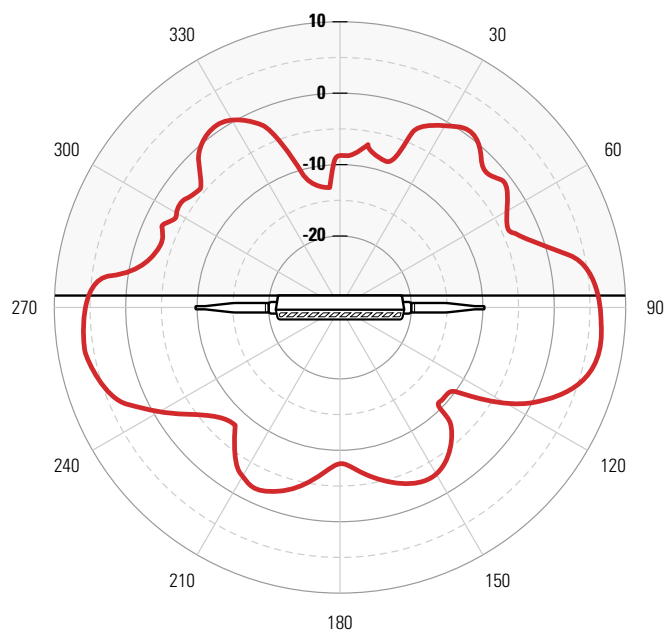
Elevation - 2.4 GHz



Azimuth - 5 GHz



Elevation - 5 GHz



Ordering Information

AP1130 - SKUs

SKU	Description
AH-AP-1130-AC-XX	AP1130, outdoor rated, 2 radio 2x2 802.11a/b/g/n/ac, 110/100/1000, configurable regulatory domain, without power supply. Includes HiveManager Connect & HiveCare Community. (Regulatory Domains available: FCC, CE, W (World))

AP1130 - Miscellaneous SKUs

SKU	Description
AH-ACC-1130-ANT-5G	5 GHz N-Plug outdoor 5dBi antenna for AP1130
AH-ACC-1130-ANT-2G	2.4 GHz N-Plug outdoor 5dBi antenna for AP1130
AH-ACC-1130-ANT-18	5 GHz 18-dBi Outdoor Directional Antenna with N-connectors for AP1130
AH-ACC-ANT-KIT	AP1130 outdoor antenna kit (2x2.4 GHz 5dBi and 2x5 GHz 5dBi)
AH-ACC-ANT-SEC	120 degree dual band 2x2 sector antenna for AP1130. 4 x N connectors. Kit includes coaxial cables and mounting assembly.
AH-ACC-BKT-ASM	AP1130 Mounting Bracket Assembly
AH-ACC-GND-STRP	AP1130 7ft GND Strap
AH-ACC-MRN-KIT	AP1130 Marine grade accessory kit. All items are marine grade. Includes screw pack, mounting brackets, locking screw for mounting bracket, 1-2.75" metal hose strap.
AH-ACC-RJ45-PLG	AP1130 Waterproof Ethernet Plug
AH-ACC-SCW-PACK	AP1130 Screw Pack (1 bag of 4x wall mount screws and 1 bag of 5x pole mount screws)
AH-ACC-STR-3-15	AP1130 Metal Hose Strap for 3-15 in diameter pole (Larger Pole)
AH-ACC-STRP-1-2	AP1130 Metal Hose Strap for 1-2.75 in diameter pole



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