Alcatel-Lucent OmniAccess AP124, OmniAccess AP125
DUAL-RADIO MIMO ACCESS POINTS

The Alcatel-Lucent OmniAccess™ AP124 (OAW-AP124) and OmniAccess AP125 (OAW-AP125) are high-performance, multi-band [802.11a/b/g and 802.11n Draft 2.0 (3x3 MIMO)] dual-radio indoor wireless access points capable of delivering wireless data rates of up to 300Mbps. These multi-function access points provide wireless LAN access, air monitoring, and wireless intrusion detection and prevention over the 2.4-2.5GHz and 5GHz RF spectrum. These access points work in conjunction with Alcatel-Lucent OmniAccess WLAN switches to deliver high-speed, secure network services.

802.11n increases performance through techniques such as channel bonding, block acknowledgement, and Multiple In Multiple Out (MIMO) radio technology. In addition, advanced antenna technology also increases the range and reliability.

The OmniAccess AP124 and AP125 feature dual 100/1000 Ethernet interfaces and operate from standard 802.3af power over Ethernet (PoE) sources. The OmniAccess AP124 features detachable antenna interfaces while the OmniAccess AP125 features integrated 3x3 MIMO dual-band antenna elements.

These access points are also available in a 802.11a/b/g-only variant that can be converted to full 802.11n Draft 2.0 support through a software unlock key. This feature allows organizations to prepare for future 802.11n deployments without paying for 802.11n today.

FEATURES	BENEFITS
IEEE 802.11n (draft2.0) 3x3 MIMO access point	High speed wireless with up to 300Mbps of throughput. Improved coverage compared to 802.11a/b/g technologies. Backward compatibility with 802.11a/b/g Wi-Fi clients
Intelligent PoE power sourcing	Operates with existing IEEE 802.3af compliant PoE devices as well as PoE+ and IEEE 802.3at devices.
Dual Ethernet interfaces	High availability with dual homing of the access point to the wire line infrastructure.
Fully featured, enterprise-grade access point	Integral part of the OmniAccess wireless product family. These APs offer high speed wireless deployment enterprise wide including branch and small offices.
	Supports key enterprise grade functions such as dynamic RF management (taking into account 802.11n spectral width), air monitoring over 2.5 and 5GHz spectrum, wireless intrusion prevention, Call Admission Control (CAC), QoS, and battery life extension for converged communications.

Technical specifications

Application

- High-performance 802.11n enterprise campus or branch office applications, high-performance secure-jack, indoor use.

Operating mode

- Multi-service concurrent 802.11a/n + b/g/n WLAN
- 802.11a/b/g/n air monitor
- Hybrid combination of WLAN/AM
- Remote AP
- Configurable to support 802.11n draft 2.0 HT 20/40 channels or mixed-mode deployment IEEE 802.11a/b/g/n.

Radios

- Dual radio - software configurable to support 2.4-2.5 GHz + 5 GHz

RF management

- Automatic transmit power and channel management control with auto coverage hole correction via ARM

Advanced features

- Remote AP (RAP) capable with addition of optional RAP license
- Integrated Trusted Platform Module (TPM) for secure storage of credentials and keys
- SecureJack capable for secure tunneling of wired Ethernet traffic

Antenna

- OAW-AP124: Tri (3x3), RP-SMA interfaces for external antenna support (supports up to 3x3 MIMO with spatial diversity)
- OAW-AP125: Integral, tri (3x3), omni-directional multi-band dipole antenna elements (supports up to 3x3 MIMO with spatial diversity)

- OAW-AP125 antenna max gain
  - ¬ 2.4 GHz - 2.5 GHz / 3.2 dBi
  - ¬ 5.150 GHz - 5.875 GHz / 5.2 dBi

Wireless radio specifications

- AP type: 3x3 Multiple-In, Multiple-Out (MIMO)
- Supported frequency bands (country-specific restrictions apply):
  - ¬ 2.400 - 2.4835 GHz
  - ¬ 5.150 - 5.250 GHz
  - ¬ 5.250 - 5.350 GHz
  - ¬ 5.470 - 5.725 GHz
  - ¬ 5.725 - 5.850 GHz
- Available channels: WLAN switch-managed, dependent upon configured regulatory domain
- Modulations:
  - ¬ 802.11b: Direct-Sequence Spread-Spectrum (DSSS)
  - ¬ 802.11a/g: Orthogonal Frequency Division Multiplexing (OFDM)
  - ¬ 802.11n: 802.11n draft 2.0
- Transmit power: Configurable in increments of 0.5 dBm
- Association rates (Mbps):
  - ¬ 802.11b: 11, 5.5, 2, 1 with automatic fallback
  - ¬ 802.11a/g: 54, 48, 36, 24, 18, 12, 9, 6 with automatic fallback
  - ¬ 802.11n: MCS0 – MCS15 (6.5Mbps – 300Mbps)
- 802.11n High-Throughput (HT) Support: HT 20/40
- 802.11n Packet Aggregation: A-MPDU, A-MSDU

Interfaces

- Network
  - ¬ 2 x 10/100/1000Base-T Ethernet (RJ45), auto-sensing link speed and MDI/MDX

- ¬ 48 V DC 802.3af or 802.3at or PoE + interoperable power-over-Ethernet (PoE) with intelli-source PSE sourcing intelligence (both ports)
- Antenna (model OAW-AP124 only):
  - ¬ 3 x RP-SMA antenna interfaces (supports up to 3x3 MIMO with spatial diversity)
- Other
  - ¬ 1 x RJ-45 console interface

Power

- 48 V DC 802.3af or 802.3at or PoE + interoperable power-over-Ethernet (PoE)
- 5 V DC for external AC supplied power (adapter sold separately)
- Maximum power consumption: 16W

Mounting

- Standard
  - ¬ Wall
  - ¬ Tool-less ceiling tile rail (15/16")
- Optional mounting kit
  - ¬ Desk stand and wall outlet mount plate
  - ¬ Solid wall stand-off
  - ¬ Ceiling tile rail (15/16" and 9/16" recessed or non-recessed)
- Security
  - ¬ Kensington security lock point (OAW-AP125 only)

Mechanical

- Dimensions / Weight
  - ¬ Height: 2.0 in. (51 mm)
  - ¬ Width: 4.9 in. (130 mm)
  - ¬ Depth: 5.13 in. (124 mm)
  - ¬ Weight: 15oz (0.42 Kg)

Environmental

- Operating temperature range
  - ¬ Temp: 0°C to 50°C (32°F to 122°F)
  - ¬ Humidity: 5 to 95% non-condensing
- Storage and transportation temperature range
  - ¬ Temp: -40°C to +70°C (-40°F to +158°F)

Regulatory

- FCC Part 15
- Industry of Canada
- MIC
- Anatel
- NOM/COFETEL
- SRRC/CCC
- GS Mark
- CE Mark
- R&TTE Directive – 1995/5/EC
- Low Voltage Directive – 72/23/EEC
- EN 300 328
- EN 301 893
- EN 301 489
- UL/IEC/EN 60950-1:2001
- CB, cULus
- AS/NZS 4268, 4771
- UL2043 listed

Certifications

- Planned for Wi-Fi certification for 802.11a/b/g/n

Ordering information

PART NUMBER	DESCRIPTION
OAW-AP124	OmniAccess AP124 wireless access point. OAW-AP124 IEEE 802.11n (draft 2.0) wireless access point with support for selectable 802.11'B/G/N' and 802.11'A/N' operation, 3x3 MIMO dual-band RP-SMA detachable antenna interfaces, 2 x 10/100/1000Base-T (RJ-45) Ethernet interface (supports high power "power-over-Ethernet"), 1 x console Port, 1 x 5V DC power interface. Includes installation guide and removable desktop stand. AC power adapter kit and Antenna sold separately.
OAW-AP124ABG	OmniAccess AP124ABG wireless access point. Dual radio IEEE 802.11a/b/g wireless access point with support for 802.11'B/G' and 802.11'A' operation, dual-band RP-SMA detachable antenna interfaces, 2 x 10/100/1000Base-T (RJ-45) Ethernet interface (supports high power "power-over-Ethernet"), 1 x console port, 1 x 5V DC power interface. Upgradeable through controller license to 802.11n Draft 2.0 compliant AP. Includes installation guide and removable desktop stand. AC power adapter kit and antenna sold separately
OAW-AP125	OmniAccess AP125 wireless access point. OAW-AP125 IEEE 802.11n (draft 2.0) wireless access point with support for selectable 802.11'B/G/N' and 802.11'A/N' operation, 3x3 MIMO dual-band antenna, 2 x 10/100/1000Base-T (RJ-45) Ethernet interface (supports high power "power-over-Ethernet"), 1 x console port, 1 x 5V DC power interface. Includes installation guide and removable desktop stand. AC power adapter kit sold separately.
OAW-AP125ABG	OmniAccess AP125ABG wireless access point. Dual radio IEEE 802.11a/b/g wireless access point with support for 802.11'B/G' and 802.11'A' operation, dual-band integral antenna, 2 x 10/100/1000Base-T (RJ-45) Ethernet Interface (supports high power "power over Ethernet"), 1 x console port, 1 x 5V DC power interface. Upgradeable through controller license to 802.11n Draft 2.0 compliant AP. Includes installation guide and removable desktop stand. AC power adapter kit sold separately
OAW-AP124U-x	OAW-AP124ABG Access Point 802.11pre-n upgrade license (x Access Point License)
OAW-AP125U-x	OAW-AP125ABG Access Point 802.11pre-n upgrade license (x Access Point License)
OAW-AP120-MNT	OmniAccess AP120 series wireless access point wall / ceiling mounting kit. Includes: 1 x wall mounting cradle complete with security plate and anti-tamper screws, 1 x 15/16" to 9/16" recessed ceiling tile rail adapter and 1 x 15/16" to 15/16" recessed ceiling tile rail adapter – suitable for use with OAW-AP124 or OAW-AP125.
OAW-AP120-MNTWJ	Mounting hardware kit and product enclosure to facilitate secure wall or ceiling mounting of an OAW-AP121 or OAW-AP125 access point to a standard North America or BS telecom/data port wall gang box, or to a 15/16" or 9/16" ceiling tile rail. Supports full enclosure of the AP (with knock-out parts to allow several fixed antenna orientations), anti-tampering and optional pass-through ports that accept standard RJ-45 structured cabling modules using custom snap-in plates. The kit includes plates supporting Siemon or Keystone modules, as well as a blank plate.
OAW-AP120-MNTCV	OAW-AP120 Cover Kit. Cabling cover to facilitate tamper-proof mounting of an OAWAP121 or OAW-AP125 access point. The standard mounting options of the AP are fully supported since the cover leaves the back of the AP exposed. Supports partial enclosure of the AP and anti tampering. Mounting plate for wall box mounting included.
OAW-AP-AC2-US	OAW-AP60/61/65/70/120 series AC Power Adapter Kit – North America Version
OAW-AP-AC2-JP	OAW-AP60/61/65/70/120 series AC Power Adapter Kit – Japan
OAW-AP-AC2-UK	OAW-AP60/61/65/70/120 series AC Power Adapter Kit – United Kingdom
OAW-AP-AC2-IT	OAW-AP60/61/65/70/120 series AC Power Adapter Kit – Italy
OAW-AP-AC2-EU	OAW-AP60/61/65/70/120 Series AC Power Adapter Kit – Schuko
OAW-AP-AC2-AU	OAW-AP60/61/65/70/120 Series AC Power Adapter Kit – Australia
OAW-AP-AC2-LA	OAW-AP 60/61/65/70/120 Series AC Power Adapter Kit – North America 2 Prong Version
OAW-AP-AC2-IN	OAW-AP60/61/65/70/120 Series AC Power Adapter Kit – India
OAW-AP-MS1-HP	1 Port midspan power injector. High power PoE over 10/100/1000