Cisco DX80

Product Overview

Discover a delightful new approach to working that is simple to use and offers an uncompromised collaboration experience. The Cisco DX80 brings everything you need to be productive in one sleek integrated device. All you need is one screen on the desk. Experience best in class HD video and expanded collaboration capabilities such as extensive UC features, Android applications and email.

- Dedicated, always-on 1080p High-Definition video communication system
- Fully-featured IP Phone that registers to Cisco UCM call control
- High-quality audio system for speakerphone
- 23-inch 16:9 screen provides an engaging experience for video calls and running apps
- Multi-touch capacitive touchscreen provides elegant and powerful user interface
- Security Enhanced Android operating system combined with Cisco's end-to-end security features gives peace of mind to network administrators
- Cisco Extension Mobility supports multiple profiles allowing hot-desking and shared workspaces
- Many options to personalize your experience and maximize productivity; from wallpapers, widgets, and screen layouts to the ability to use a variety of Bluetooth and USB accessories
- Self-provisioning device is simple for users to take out of the box and start using quickly
- Native Cisco AnyConnect VPN makes connecting to the workplace from the home office a snap

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Table 1. Features and Benefits

Feature	Benefit
Design features	• Install in minutes: The DX80 is an integrated device with all on-screen controls. Just plug the power cable and Ethernet (or use Wi-Fi). With self-provisioning your device will register itself. Authenticate to complete the setup. • In-person video: With a large 23-inch screen, best of class video and audio capabilities the DX80 allows for life-like experiences. • Intelligent Audio: With a set of microphone arrays the DX80 is capable of greatly attenuating sound disturbances in your environment and ensures the best sound quality to the other person on the call. • Top-notch monitor: The DX80 can be used as an external monitor and be plugged to a laptop. It has high contrast LED panel with wide viewing angle and a full touch surface. • All controls on screen: Calls can easily be placed from the screen itself. There is no need for an external device. Options are also accessible while on a call to ensure the participants can stay engaged during a conversation. • Document camera: The camera located on top of the DX80 can be tilted down to allow sharing of physical content and drawings. • Inclinable screen: As it is also a tablet capable of running applications, the DX80 accommodates users who want to sit and use the DX80 comfortably at their desk. The device can be pulled easily towards the user and reclines to a 40° angle to the table.
Application features	• Share multimedia and presentation at the touch of a button: While on a call the DX80 allows to see the laptop screen and share it instantly in full HD with the on-screen control bar. • Easy swap between computer and DX interface: Swap between the monitor mode and the DX80 interface by a simple press of the “source” button. • Intelligent Proximity: The DX80 supports the Intelligent Proximity for mobile voice. Contacts on the mobile can be seen from within the DX80 interface and voice calls can be handoff from the mobile to the DX80. • WebEx and Jabber integrated: The DX80 already comes with a Cisco Collaboration applications installed for instant messaging and Web conferencing. • Compatible with Google Android applications: The DX80 can run any Android application on its large touch screen. Users can for example access their emails and calendar.
Performance features	• The system offers simultaneous HD video and content sharing. • RGB input is compatible with all modern PC and Mac computers. • Audio is communicated through full-duplex, full-band audio (CD quality). • Provisioning and self-configuration are easy with Cisco UCM. • The system is natively supported by Cisco UCM version 8.6 or later.

Table 2. Product Specifications

Feature	Benefit
Components	Fully integrated unit including: • Codec • Camera • Display • Microphones and loudspeaker HDMI and USB 2 meter long cable Ethernet 2,9 meters long cable Power adapter
Display	• 23-inch (0.58m) LCD monitor • Resolution: 1920 x 1080 (16:9) • High contrast IPS LED panel • Contrast ratio: 1000:1 (typ.) • Viewing angle: +/-178 deg (typ.) • Response time: 5ms (typ.) • Brightness: 215 cd/m^2 (typ.) • Color depth: 16.7 million colors • Color gamut 72% (of NTSC) • 10 point multi-touch surface
Supported PC input resolutions	Up to 1080p

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Feature	Benefit
Ergonomic design	• The stand is retractable in the upright position for easy transportation • The screen can be tilted from an angle of 11° to 50° from the vertical • Camera can be tilted from an angle of -5° to 70° from the display • The connector lid can be fully lifted and will lock to the back of the unit with magnets
Audio	• Loudspeaker mounted on the front panel and user facing • 4 digital microphones mounted in 2 arrays
Front camera	63° horizontal field of view 38° vertical field of view Resolution: 1080p30 F 2.2 Instant Focus based on face detection Privacy shutter
Operating system	Android OS 4.1.1 (Jellybean)
Processor	TI OMAP 4470 1.5GHz dual-core ARM Cortex-A9 processor
Storage	8-GB eMMC NAND Flash memory (embedded multimedia card; nonvolatile)
Memory	2-GB RAM; Low Power Double Data Rate Synchronous Dynamic Random-Access Memory (LPDDR2 SDRAM)
Ports and slots	• High-Definition Multimedia Interface (HDMI) type A port for PC or Mac video input • High-Definition Multimedia Interface (HDMI) type A port output (reserved for future use) • High-speed USB 2.0 ports: ◦ Three standard type A ports (for keyboard, mouse, thumb drive and memory stick, and headset connectivity) ◦ One standard type B port (reserved for future use) ◦ One Micro-B USB port with native RS232, serial port, intended for service only ◦ Maximum of 500 mA power output at 5V or 2.5W for each USB port • Micro Secure Digital Standard Capacity (HDSC) slot for nonvolatile storage of applications or file expansion up to 32GB (standard-definition [SD] card speed Class 4 or later recommended)
Physical buttons	• Cap sense “source” button to swap between HDMI input and the DX80 interface. Button is lit when HDMI input is connected. • Volume up/down • Mute
Visual indicator	• Camera LED indicator (incoming calls, camera activation) • Microphone LED indicator (mute) • Power button LED indicator (power on, sleeping, message waiting, error) • Source button (monitor mode)
Physical dimensions (HxWxD)	20,2 x 22,2 x 3,5 in. (51.2 x 56. 5 x 8.9 cm)
Weight	15,65 lb (7.1 kg)
Power	Rated: 60 W maximum Low Power Standby mode Integrated EnergyWise support
Physical security	Compatible with Kensington Security Slot
Connectivity	
Ethernet	• Internal 2-port Cisco Ethernet switch allows for a direct connection to a 10/100/1000BASE-T Ethernet network (IEEE802.3i/802.3u/802.3ab) through an RJ-45 interface with single LAN connectivity for both the phone and a co-located PC. • The system administrator can designate separate VLANs (IEEE 802.1Q) for the PC and phone, providing improved security and reliability of voice and data traffic.
Desktop Wi-Fi	As an alternative to wired Ethernet, the DX80 supports a Wi-Fi radio with integrated antenna enabling connectivity to a Wi-Fi access-point infrastructure, thereby saving on the labor costs of pulling Ethernet cables to every work location.
Network features	• Cisco Discovery Protocol • Cisco Peer-to-Peer Distribution Protocol (PPDP) • LLDP-MED • Session Initiation Protocol (SIP) for signaling

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Feature	Benefit
	• Session Description Protocol (SDP) • User Datagram Protocol (UDP) (used only for Real-Time Transport Protocol [RTP] streams) • Dynamic Host Configuration Protocol (DHCP) client or static configuration • Transparent secure roaming • Gratuitous Address Resolution Protocol (GARP) • Switch auto-negotiation • Domain Name System (DNS) • Web proxy (configured manually or by auto-configuration Protected Access Credential [PAC] files) • NT LAN Manager (NTLM) and Kerberos authentication • Trivial File Transfer Protocol (TFTP) • Secure Hypertext Transfer Protocol (HTTPS) • Wi-Fi management • IPv4 configuration • IPv6 configuration • Virtual Local Area Network (VLAN) • Real-Time Control Protocol (RTCP) (provides quality of service [QoS] data [such as jitter, latency, and round-trip delay] • on RTP streams in order to provide a better video experience) • Secure Real-Time Transport Protocol (SRTP) • Software port speed (manual or auto-configuration, including disablement) • PC port speed (manual or auto-configuration, including disablement)
Bluetooth	Bluetooth 3.0 Enhanced Data Rate (EDR) Class 2 technology (up to 30-ft [10m] range) • Human Interface Device (HID) keyboard and mouse support for adding additional input accessories • Hands-Free Profile (HFP) for untethered headset connections and voice communications • Phone Book Access Profile (PBAP), which enables the exchange of phone book objects between devices • Advanced Audio Distribution Profile (A2DP) for streaming audio • Object Push Profile (OPP) for generic file exchange
Accessories	
Cisco VESA adapter and wall mount	The DX80 supports a 100x100 mm VESA mounting. This option includes the VESA adapter as well as a fixed and flat wall mount holder.
Firmware	
Version	Synergy 10.2.1 was the firmware used at the time of this datasheet.
Call platform support; provisioning and management	• Cisco UCM Version 8.6.2, 9.0(1), 9.1(2), 10.0(1) and later • Cisco Hosted Collaboration Solution (HCS) Version 8.6.2 or later • Cisco Business Edition 6000 Version 9.1 or later
Upgrading process	• Software upgrade of the device through Cisco UCM • Support for online firmware upgrades using TFTP • HTTP firmware management
Temperature range	
Operating temperature	32 to 104°F (0 to 40°C)
Relative humidity	10 to 90% (non condensing)
Storage temperature	-4 to 140°F (-20 to +60°C)
Approvals and compliance	
	• Directive 2006/95/EC (Low-Voltage Directive) - Standard EN 60950-1 • Directive 2004/108/EC (EMC Directive) - Standard EN 55022, Class B - Standard EN 55024 - Standard EN 61000-3-2/-3-3 • Compliance with ETSI EN 301 489, ETSI EN 300 328, ETSI EN 301 893 • Directive 2011/65/EU (RoHS), Directive 2009/125/EC (ErP), Directive 2002/96/EC (WEEE) • Approved according to UL 60950-1 and CNA/CSA C22.2 No. 60950-1-07 • Compliance with FCC CFR 47 Part 15 Class B • Compliance with CFR 47 Part 15.247, CFR 47 Part 15.407, 47 CFR Part 2.1093 FCC Applicable KDB's

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Table 3. Video and Audio Specifications

Feature	Specifications
Video standards	H.264 and AVC (H.264/MPEG-4 Part 10 Advanced Video Coding)
Minimum bandwidth for resolution and frame rate	Main video at 30 frames per second • CIF (352 x 288 pixels) - 17kbps • VGA (640 x 480 pixels) - 400kbps • 240p (432 x 240 pixels) - 17 kbps • 360p (640 x 360 pixels) - 300kbps • 480p (848 x 480 pixels) - 600kbps • WSVGA (1024 x 600 pixels) - 800kbps • HD 720p (1280 x 720 pixels) - 1300kbps • HD1080p (1920 x 1080 pixels) - 2000kbps Content channel at 5 frames per second • CIF (352 x 288 pixels) - 17kbps • VGA (640 x 480 pixels) - 200kbps • 240p (432 x 240 pixels) - 17 kbps • 360p (640 x 360 pixels) - 150kbps • 480p (848 x 480 pixels) - 200kbps • WSVGA (1024 x 600 pixels) - 300kbps • HD 720p (1280 x 720 pixels) - 500kbps • HD1080p (1920 x 1080 pixels) - 700kbps
Frame or picture format	• CIF (352 x 288 pixels) • VGA (640 x 480 pixels) • 240p (432 x 240 pixels) • 360p (640 x 360 pixels) • 480p (848 x 480 pixels) • WSVGA (1024 x 600 pixels) • HD 720p (1280 x 720 pixels) • HD1080p (1920 x 1080 pixels)
Video features	• On-screen layout control for video and presentation. • Selfview
Supported HDMI input resolutions	Supports formats up to maximum 1920 x 1080 @ 60 fps (HD1080p60), including: • 640 x 480 @ 60 fps • 1280 x 720 @ 60 fps • 1920 x 1080 @30 fps • 1920 x 1080 @60 fps (available in Synergy release post 10.2.1) High-definition inputs use progressive video formats
Audio standards	• Narrowband audio compression codecs: G.711a, G.711u, G.729a, G.729ab, and Internet Low Bitrate Codec (iLBC) • Wideband and full-band audio compression codecs: G.722, Internet Speech Audio Codec (iSAC), and AAC-LD (MP4A-LATM) audio compression codecs.
Audio features	• Loudspeaker frequency range: 70Hz - 20kHz • Microphones frequency range: 100z - 20kHz • Up to 48kHz sampling rate • Automatic static noise reduction • Configurable directive microphone • Acoustic echo cancellers • Automatic Gain Control (AGC) • Active lip synchronization
Dual stream	• Binary Floor Control Protocol (BFCP) (SIP) dual stream • Supports resolutions up to 1080p (1920 x 1080)

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Table 4. Software Features

Feature	Specifications
Android core features	• Fully customizable Cisco Launcher and App Tray "Home Screen" enables you to place your own application shortcuts, widgets, and folders • Home screen supports up to five separate screen views or pages with a 12 x 9 icon grid • Landscape-orientated applications are supported • On-screen keyboard is supported

Android bundled applications and widgets	• Calculator
	• Calendar
	• Camera
	• Clock
	• Contacts
	• Direct Dial
	• Email
	  ◦ Internet Message Access Protocol (IMAP)
	  ◦ Post Office Protocol 3 (POP3)
	  ◦ Microsoft Exchange ActiveSync
	• Favorites
	• Gallery
	• Phone features (for example, Forward All, Privacy, Do Not Disturb, Mobility, and Self-View)
	• Wallpapers (including Live Wallpapers)
	• Web browser

Google bundled applications	• Google Play (enabled by administrator through Cisco UCM; includes country-approved Google mobile services applications) • Gmail • Google settings • Maps • Play Books • Play Magazines • Play Movies • Play Music • Google Now
Cisco bundled applications	• Cisco AnyConnect® Secure Mobility Client (VPN) • Cisco Jabber IM (which offers chat and presence capabilities) • Cisco WebEx • Quick Contact Badge (allows you to easily collaborate with your contacts to place a call, send an email message, send an instant message (IM), or start a WebEx® meeting) • Visual Voicemail
Intelligent proximity	• Contact synchronization with Bluetooth-paired, Android or iOS mobile device that supports PBAP • Call history synchronization to view placed or missed calls from mobile device on the DX80 • Audio path routing sends audio through the DX80 for a mobile device-connected call
Configuration modes	• Enhanced, fully-functional mode that enables all aspects of the phone including applications and accounts • Simple mode that hides applications, accounts and provides only voice and video call capabilities • Public mode based on Simple mode with restrictions on user settings modifications.

Application deployment options and management	• The administrator can disable any and all applications from being downloaded on the Cisco DX650/70/80. Specifically, the administrator can configure the DX650/70/80 to prohibit the installation of any third-party Android applications.
	• Google Play access can be administratively disabled (default). Applications from "unknown sources" can be administratively disabled (default):
	  ◦ The administrator can optionally install applications using Cisco Unified Communications Manager with the APK file.
	  ◦ Company Photo Directory (ability to set up and link photo directory URL image location associated with respective user)
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Feature	Specifications
Built-in training and setup assistance	• Setup Assistant wizard (helps configure email, Jabber IM, WebEx, and Voice Mail account settings)
Third party application development	Cisco Collaboration application programming interfaces (APIs) through a Software Developer Kit (SDK)
Language support	• Arabic, Egypt (ar_EG) • Bulgarian, Bulgaria (bg_BG) • Catalan, Spain (ca_ES) • Chinese, PRC (zh_CN) • Chinese, Taiwan (zh_TW) • Croatian, Croatia (hr_HR) • Czech, Czech Republic (cs_CZ) • Danish, Denmark (da_DK) • Dutch, Netherlands (nl_NL) • English, Britain (en_GB) • English, United States (en_US) • Finnish, Finland (fi_FI) • French, France (fr_FR) • German, Germany (de_DE) • Greek, Greece (el_GR) • Hebrew, Israel (he_IL) • Hungarian, Hungary (hu_HU) • Italian, Italy (it_IT) • Japanese (ja_JP) • Korean (ko_KR) • Latvian, Latvia (lv_LV) • Lithuanian, Lithuania (lt_LT) • Norwegian bokmål, Norway (nb_NO) • Polish (pl_PL) • Portuguese, Brazil (pt_BR) • Portuguese, Portugal (pt_PT) • Romanian, Romania (ro_RO) • Russian (ru_RU) • Serbian, Republic of Serbia (sr_RS) • Slovak, Slovakia (sk_SK) • Slovenian, Slovenia (sl_SI) • Spanish, Spain (es_ES) • Swedish, Sweden (sv_SE) • Thai, Thailand (th_TH) • Turkish, Turkey (tr_TR)
Calling feature support	• + Dialing (ITU E.164) • Abbreviated dialing • Adjustable ringing and volume levels • Adjustable display brightness • Auto-answer • Auto-detection of headset • Barge (cBarge) • Callback • Call Chaperone • Call forward • Call forward notification • Call history lists • Call park (including Directed Call Park and Assisted Directed Call Park) • Call pickup • Call timer • Call waiting • Caller ID

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Feature	Specifications
	• Corporate directory • Conference (ad hoc) • Direct transfer • Divert (iDivert) • Do Not Disturb (DND) • Extension Mobility service • Fast-dial service • Forced access codes and client matter codes • Group call pickup • Hold (and Resume) • Intercom • International call logging • IP Phone Manager Assistant (IPMA) • Join (ad hoc) • Last-number redial (LNR) • Malicious-caller ID • Message-waiting indicator (MWI) • Meet-me conference • Mobility (Mobile Connect and Mobile Voice Access) • Music on hold (MoH) • Mute (audio and video) • Network profiles (automatic) • On- and off-network distinctive ringing • Personal directory • PickUp • Predialing before sending • Privacy • Private Line Automated Ringdown (PLAR) • Ring tone per line appearance • Self-View (video call) • Service URL • Shared line(s) • Time and date display • Transfer (ad hoc) • Visual Voicemail • Voicemail
Emergency services	Emergency Calling Service dialing
Accessibility features	Additional accessibility features for the vision impaired, blind, and the hearing and mobility impaired include user-defined and customizable: • Display font size and screen brightness settings • Touchscreen customizable touch and hold delay • Talkback audio prompts and spoken password • Support for Explore by Touch features
Security features	
Hardware **(Sat)**	• Secure boot • Secure credential storage • Device authentication • File authentication and encryption • Image authentication and encryption • Signaling authentication • Random bit generation • Hardware cryptographic acceleration • Encrypted configuration files • Encrypted file system

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Feature	Specifications
Certificate management	• Certificate Authority Proxy Function (CAPF) support for additional security • Manufacturer-Installed Certificates (MIC) • Locally Significant Certificates (LSC) • X.509 Digital Certificates (DER encoded binary); both DER and Base-64 formats are acceptable for the client and server certificates; certificates with a key size of 1024, 2048, and 4096 are supported
Network	• Wired: 802.1x supplicant options for network authentication use: ◦ Extensible Authentication Protocol: Extensible Authentication Protocol-Flexible Authentication via Secure Tunneling ◦ (EAP-FAST) ◦ Extensible Authentication Protocol: EAP Transport Layer Security (EAP-TLS) ◦ Extensible Authentication Protocol: EAP Message Digest Algorithm 5 (EAP-MD5) • Wireless: ◦ (refer to Table 5) • Wireless: Wi-Fi Protected Access 2 (WPA2) (EAP-FAST) • Wireless Equivalent Privacy (WEP) • EAP-TLS • Protected Extensible Authentication Protocol - Generic Token Card (PEAP-GTC)
Media and data signaling	• TLS • SRTP • HTTPS for clients
Enterprise access	• Cisco AnyConnect Secure Mobility Client • Web Proxy (manual configuration or auto-configuration of Protected • Access Credential [PAC] files) • NTLM and Kerberos authentication
Device management	• Remote wipe • ActiveSync remote wipe (email, contacts, calendar, etc.) • Self-service wipe • Wipe after unsuccessful login attempts • Factory reset
Policy management	• Password complexity • Disable USB • Disable Speakerphone • Disable Headset • Secure Digital I/O (SDIO) enable/disable • Bluetooth • Wi-Fi • Access to Android market • Screen Lock and Automatic Lock (PIN or password) device • Android Debug Bridge (ADB)
Diagnostics	• The integrated Cisco Collaboration Problem Report Tool can send information directly to your system administrator when you experience problems with your phone or application (requires a configured email account)

Table 5. Wi-Fi Features and Specifications

Feature	Specifications
Protocol	IEEE 802.11a, 802.11b, 802.11g, and 802.11n
Frequency band and operating channels	• 2.412 - 2.472 GHz (channels 1 - 13) • 5.180 - 5.240 GHz (channels 36 - 48) • 5.260 - 5.320 GHz (channels 52 - 64) • 5.500 - 5.700 GHz (channels 100 - 140) • 5.745 - 5.825 GHz (channels 149 - 165) IEEE 802.11d is used to identify available channels

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Feature	Specifications		
Non overlapping channels	• 2.4 GHz (20 MHz channels): up to 3 channels • 5 GHz (20 MHz channels): up to 24 channels • 5 GHz (40 MHz channels): up to 9 channels		
Operating modes	• Auto (default), preference to strongest RSSI for 2.4 GHz or 5 GHz • 2.4 GHz only • 5 GHz only		
Data rates	• 802.11a: 6, 9, 12, 18, 24, 36, 48, 54 Mbps • 802.11b: 1, 2, 5.5, 11 Mbps • 802.11g: 6, 9, 12, 18, 24, 36, 48, 54 Mbps • 802.11n: HT MCS 0, MCS 1, MCS 2, MCS 3, MCS 4, MCS 5, MCS 6, MCS 7		
2.4GHz receiver sensitivity	IEEE 802.11b: • 1 Mbps: -95 dBm • 2 Mbps: -93 dBm • 5.5 Mbps: -90 dBm • 11 Mbps: -86 dBm	IEEE 802.11g: • 6 Mbps: -89 dBm • 9 Mbps: -89 dBm • 12 Mbps: -87 dBm • 18 Mbps: -85 dBm • 24 Mbps: -81 dBm • 36 Mbps: -78 dBm • 48 Mbps: -74 dBm • 54 Mbps: -72 dBm	IEEE 802.11n HT20: • MCS 0: -88 dBm • MCS 1: -86 dBm • MCS 2: -84 dBm • MCS 3: -81 dBm • MCS 4: -78 dBm • MCS 5: -73 dBm • MCS 6: -71 dBm • MCS 7: -69 dBm
5GHz receiver sensitivity	IEEE 802.11a: • 6 Mbps: -91 dBm • 9 Mbps: -91 dBm • 12 Mbps: -90 dBm • 18 Mbps: -88 dBm • 24 Mbps: -85 dBm • 36 Mbps: -81 dBm • 48 Mbps: -77 dBm • 54 Mbps: -76 dBm	IEEE 802.11n HT20: • MCS 0: -91 dBm • MCS 1: -89 dBm • MCS 2: -86 dBm • MCS 3: -84 dBm • MCS 4: -81 dBm • MCS 5: -76 dBm • MCS 6: -74 dBm • MCS 7: -72 dBm	IEEE 802.11n HT40: • MCS 0: -90 dBm • MCS 1: -87 dBm • MCS 2: -85 dBm • MCS 3: -81 dBm • MCS 4: -78 dBm • MCS 5: -74 dBm • MCS 6: -72 dBm • MCS 7: -70 dBm
Transmitter output power	2.4 GHz: • 802.11b: up to 16 dBm • 802.11g: up to 16 dBm • 802.11n HT20: up to 15 dBm	5 GHz: • 802.11a: up to 16 dBm • 802.11n HT20: up to 15 dBm • 802.11n HT40: up to 15 dBm	
Antenna	• 2.4 GHz: 4.6 dBi peak gain • 5 GHz: 7.0 dBi peak gain		
Access point support	• Cisco Unified Access Points ◦ Minimum: 7.0.240.0 ◦ Recommended: 7.4.121.0, 7.6.110.0 or later • Cisco Autonomous Access Points ◦ Minimum: 12.4(21a)JY ◦ Recommended: 12.4(25d)JA2 or later		
Wireless security	Authentication: • Wi-Fi Protected Access (WPA) Versions 1 and 2 Personal and Enterprise • Extensible Authentication Protocol - Flexible Authentication via Secure Tunneling (EAP-FAST) • Protected Extensible Authentication Protocol - Microsoft Challenge Handshake Authentication Protocol Version 2 (PEAP-MSCHAPv2) • Protected Extensible Authentication Protocol - Generic Token Card (PEAP-GTC) • Extensible Authentication Protocol - Transport Layer Security (EAP-TLS)	Encryption: • 40-bit and 128-bit static Wired Equivalent Privacy (WEP) • Temporal Key Integrity Protocol (TKIP) and Message Integrity Check (MIC) • Advanced Encryption Standard (AES)	
Fast secure roaming	Cisco Centralized Key Management (CCKM)		

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Feature	Specifications
QoS	• IEEE 802.11e and Wi-Fi Multimedia (WMM) • Enhanced Distributed Channel Access (EDCA) • QoS Basic Service Set (QBSS)
Radar detection	Dynamic frequency selection (DFS) and transmit power control (TPC) according to IEEE 802.11h

Licensing

Phone licensing depends on the call-control platform and its policies. For the Cisco Unified Communications Manager, the Cisco DX80 requires four Device License Units (DLUs) or a minimum-level Enhanced IP User Connect License (UCL) for Cisco UCM Version 8.6.2 and later. There are no special licenses plus phone bundles for tier 2 distributors. The DX80 is not supported on third-party call-control systems.

Warranty Information

Find warranty information on Cisco.com at the Product Warranties page.

Cisco Services

Cisco Services make networks, applications, and the people who use them work better together.

Today, the network is a strategic platform in a world that demands better integration between people, information, and ideas. The network works better when services, together with products, create solutions aligned with business needs and opportunities.

The unique Cisco Lifecycle approach to services defines the requisite activities at each phase of the network lifecycle to help ensure service excellence. With a collaborative delivery methodology that joins the forces of Cisco, our skilled network of partners, and our customers, we achieve the best results.

For More Information

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