EnSky On-Premises Suite of Wi-Fi Tools

Simple, high-powered, and affordable on-site WIFI 6 network

EnSky is an on-premise Wi-Fi 6 network solution for any sized business that needs a managed, plug-and-play, hassle-free, wireless network for their employees and customers.

EnSky lets you build, deploy, and monitor a powerful managed indoor and outdoor wireless network that can integrate with on-premise or multiple site remote network.

Whether you have a small office, a large office, or a geographically diverse enterprise, EnSky's hardware and software meet any business' Wi-Fi requirements. EnSky's Wi-Fi 6 (802.11ax) support provides excellent futureproofing for businesses that must support increasing numbers of network devices with better connections and stronger capabilities.

The EnSky solution's suite of hardware and tools include:

- Indoor and outdoor access point (AP) options

- Layer 2 network power over Ethernet (PoE) switches

- SkyKey controller for easy setup and configuration

- Several software management options

EnGenius EnSky suite is a flexible and robust solution designed to bring managed Wi-Fi to any sized network, with the simplicity and flexibility to fulfill any customer requirements – from small shop and storefront setups to large geographically diverse enterprise deployments.

- Simple deployment. Using a plug-and-play solution, EnSky allows you to quickly set up and manage your Wi-Fi network with no hassle and minimal ramp-up time. There is no complicated or lengthy discovery or configuration process Using the EnGenius Wi-Fi app, businesses can easily create a network and configure access points locally or remotely.

- Easy management. EnSky uses an intuitive, centralized, single-pane-of-glass platform to configure, monitor, and manage the entire network remotely by web or on a mobile app. The ezMaster software allows you to monitor, troubleshoot, and provision your entire Wi-Fi network on-premises or from any location.

- Rapid scalability. As your business grows, EnSky scales up to 5000 APs – at a single site or across different geographical locations. This means that EnSky easily expands functionality and coverage to meet the growing needs or your business as your office environment grows locally or in different branches worldwide.

- Flexible options. EnSky includes a variety of AP devices and management options to meet any on-site requirements including local, mixed network, and geographically diverse deployments. It allows you to deploy your network in multiple ways:

- Strong security. EnSky deploys completely on premises and uses next-generation WPA3 certified security standards to provide worry-free security. WPA3 builds on previous security standards for better encryption strength, more robust authentication, and safer networks. This ensures that only authorized devices are on the network. Using data encryption, EnSky keeps managed data secure while it transmits over the network between devices.

- Cost effective. EnSky guarantees performance with remote access, software updates, and tech support included with no additional fees or licensing charges. There are no hidden costs to expanding your deployment.

A Simple Solution that Scales with Your Business

Simple to Set Up

The EnGenius EnSky suite of products is designed to be quickly and simply set up. It doesn't require a complex configuration process or deep understanding of technical IT knowledge. EnSky allows you to take any existing WAN deployment and add a Wi-Fi extension so that wireless device can connect and use the network. EnSky is engineered to be deployed easily, quickly, and with little training. With a couple of hardware APs and management software as simple as a mobile app, you can deploy a Wi-Fi network both indoors and outdoors in less than a day.

Ease of Use

Once deployed, the EnSky suite of products doesn't require constant tuning and configuration. You can deploy and forget it. If any issues do occur, single-pain-of-glass management software allows you to observe the health and performance of your network locally or remotely. Included with your deployment are tools to correctly provision your network so as to maximize performance while minimizing your spending.

Scales with Your Business

EnSky was created to grow as your business grows. It can be a simple set up with a single access point, or a complex deployment with multiple geographical network locations across the globe. Each deployment can expand to meet the needs of the location as the usage expands by simply adding more APs and controllers, indoors and outdoors. EnGenius convenient and robust management software also allow expands to handle your network growth so that you can use the same tools and processes over time.

Affordable

The EnSky Wi-Fi solution is designed to meet the budget of any sized business that needs a Wi-Fi deployment. Beyond the cost of APs and other hardware and software, there are no license or subscription costs for EnSky, no matter how many devices you add to grow your network.

Secure

Since the EnSky solution is deployed and managed on-premises, the solution is more secure than web-based deployments. EnSky also uses the latest encryption protocols and WPA2 security to protect device login and network access.

Features & Benefits

- Quick and painless setup with no required high-tech expertise.

- Flexible deployment scenarios to meet and business requirement.

- Single-pane-of-glass monitoring and troubleshooting with EnGenius App.

- Embedded Wi-Fi site survey tool to streamline and successfully deploy APs.
- Real-time system metrics, deep-dive analytics and remote configurations.
- Modular by design to accommodate any sized network, with no need for costly controllers.

- License free hardware and software with no continuing or hidden costs.

- A variety of management implementations that meet your business growth.

- Mobile management for dealing with issues, updates, and requests wherever and whenever needed.

EnSky Suite of Components

Access Points (AP)

EnSky Solution includes a variety of indoor and outdoor access point (AP) devices. APs provide the connection for various devices to your Wi-Fi network and, meshed together, provide access and performance for your whole network. APs can be deployed as standalone devices or managed by any of EnSky's solution management platforms such as ezMaster, SkyKey, or the EnGenius mobile app.

Indoor APs

EnSky managed indoor APs provide wireless connectivity that's flexible, scalable and reliable for a broad range of indoor applications. With the versatile line of EnSky indoor APs, you can connect a home office, store, school, campus or resort with ultra-fast Wi-Fi Access. The APs operate alone or can be centrally managed with no licensing or subscription fees.

EnSky indoor APs meet the high density and bandwidth requirements and features of today's BYOD users. Equipped with Qualcomm's latest chipset, Wi-Fi 6 standards, up to 2.5 Gbps ports, 802.11ax technology, and anywhere-mounting capabilities, EnSky indoor APs provide the needed speed, strength, steady, and efficient Wi-Fi connections required for today's businesses.

Start small and grow or go big. Deploy and manage a few or 1,000+ APs on an unlimited number of networks distributed across various locations—regardless of their size and infrastructures. Neutron Series easily scales with your networking needs.

Outdoor APs

EnSky managed outdoor APs provide ultra-fast wireless connectivity that is flexible, scalable, and durable. With a variety of EnSky outdoor APs available, you can extend your indoor network to outside and provide high-capacity Wi-Fi to parking areas, outdoor meetings areas, pools, campus quads, or other outdoor properties with high performance, optimal reach, and reliable range in difficult environments. The APs operate alone or can be centrally managed with no licensing or subscription fees.

EnSky outdoor APs meet the high density and bandwidth requirements and features of today's BYOD users. Designed for peak performance in harsh climates, they feature an IP55-rated weatherproof and dustproof enclosure so that they withstand varied and difficult outdoor and indoor environments regardless or temperature or weather conditions.

The outdoor APs allow administrators to utilize the most advanced Wi-Fi technology standard available while supporting the future of mobile technology for their users. The AP handles crowded outdoor client environments through its feature-rich AP leverages advanced Wi-Fi and Beamforming antenna technology, maximizing performance and increasing outdoor or indoor network capacities. The outdoor APs are easy to install in virtually any location with its included PoE adapter for quick deployment regardless of its proximity to power outlets.

SkyKey

The EnGenius SkyKey Controller is a simple hardware device that extends your exiting WAN network to discoverable indoor and outdoor access points. With built-in ezMaster, the Engenius SkyKey Controller transforms plain LAN and WLAN into managed Wi-Fi with up to 100 APs. SkyKey can easily be added to manage EnGenius Wireless Access Points and Switches from both remote and local sites.

With its compact size and magnetic backing, SkyKey fits in small spaces and stays securely on the server. There is no complex or difficult installation or integrations issues simply plug it in, discover APs, and run the Wi-Fi network.

SkyKey does not require a dedicated computer or virtual machine to control. From any computer on the local WAN, you can access SkyKey for a single place to view status and analytics of each device. SkyKey also allows you to perform administrative tasks for both wired and wireless devices.

Since SkyKey is installed at each deployment site, the device offers an always-on, secure single sign-on service. SkyKey is powered by simply plugging it in to any PoE (Power Over Ethernet) Switch or using the included DC12V power supply.
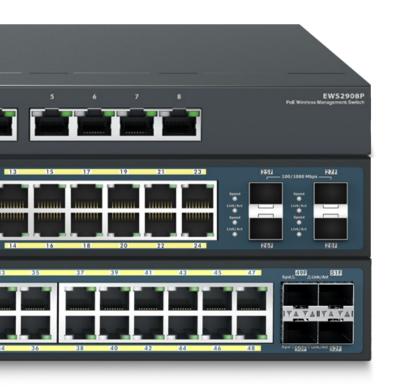
Switches

EnSky managed Gigabit Power over Ethernet (PoE+) network switches provide enterprise-class features, simplified network configuration, monitoring, and robust management options. Each switch is a full-feature Layer 2 platform capable of managing up to 50 EnSky Access Points.

Besides providing PoE power to APs, each switch itself is a controller switch. It can play a role as an intermediate connection coordinator when it is managed by ezMaster or SkyKey.

Choose between 8-, 24-, and 48-Gigabit ports with 1-10 Gbps SFP+ ports. The managed switches also include desktop and rack mountable, fanless and SmartFan options.

EnGenius managed Gigabit switches are easily installed, configured, and operated. Organizations with limited IT support and budgets can quickly create a reliable, efficiently managed network.

Managed Indoor & Outdoor Access Points

Provide wireless connectivity that's flexible, scalable and reliable. Operate alone or remotely manage with **no licensing** or subscription fees. Product features include High-Capacity **11ax** MU-MIMO performance, **gigabit PoE** ports to expand deployments & power options, and optional internal or detachable antennas.

Indoor

	EnSky Pro					EnSky		
Models	**EWS377AP**	**EWS357AP**	**EWS385AP**	**EWS360AP**	**EWS355AP**	**EAP1300**	**EAP1300EXT**	**EAP1250**
Standards	802.11a/b/g/n/ac /ax	802.11a/b/g/n/ac /ax	802.11a/b/g/n/ac Wave 2	802.11a/b/g/n/ac	802.11a/b/g/n/ac Wave 2	802.11a/b/g/n/ac Wave 2	802.11a/b/g/n/ac Wave 2	802.11a/b/g/n/ac Wave 2
Frequency	2.4 & 5 GHz	2.4 & 5 GHz	2.4 & 5 GHz	2.4 & 5 GHz	2.4 & 5 GHz	2.4 & 5 GHz	2.4 & 5 GHz	2.4 & 5 GHz
2.4 GHz Max. Data Rate	1148 Mbps	574 Mbps	400 Mbps	450 Mbps	400 Mbps	400 Mbps	400 Mbps	400 Mbps
5 GHz Max. Data Rate	2400 Mbps	1200 Mbps	867+867 Mbps	1,300 Mbps	867 Mbps	867 Mbps	867 Mbps	867 Mbps
Radio Chains/Streams	4 x 4:4	2 x 2:2	2 x 2:2	3 x 3:3	2 x 2:2	2 x 2:2	2 x 2:2	2 x 2:2
RF Output Power (2.4 GHz)	23 dBm	20 dBm	22 dBm	28 dBm	23 dBm	23 dBm	23 dBm	23 dBm
RF Output Power (5 GHz)	23 dBm	20 dBm	22 dBm	28 dBm	23 dBm	23 dBm	23 dBm	23 dBm
Ethernet Ports	1 x 2.5 Gigabit PoE	1 x Gigabit PoE	2 x Gigabit PoE	1 x Gigabit PoE	1 x Gigabit PoE	1 x Gigabit PoE	1 x Gigabit PoE	1 x Gigabit PoE
Power-over-Ethernet	802.3at	802.3af	802.3 af	802.3at	802.3 af	802.3 af	802.3 af	802.3 af
Power Consumption (Peak)	19.5 W	12.5W	10W	22.8W	9W	12W	12W	9W
Integrated Antenna	4x3 dBi (2.4 GHz) 4x3 dBi (5 GHz)	2 x 3 dBi (2.4 GHz) 2 x 3 dBi (5 GHz)	2 x 5 dBi (2.4 GHz) 2 x 5 dBi (5 GHz) 2 x 5 dBi (5 GHz)	3 x 5 dBi (5 GHz)	2 x 5 dBi (2.4 GHz) 2 x 5 dBi (5 GHz)	2 x 5 dBi (2.4 GHz) 2 x 5 dBi (5 GHz)	NA	2 x 5 dBi (2.4 GHz) 2 x 5 dBi (5 GHz)
External Antenna	NA	NA	NA	NA	NA	NA	4 x 5 dBi Omni-Directional Detachable SMA-Type	NA

Outdoor

	EnSky Pro		EnSky		
Models	**EWS860AP**	**EWS660AP**	**ENH1350EXT**	**ENS620EXT**	**ENS500EXT-AC**
Standards	802.11a/b/g/n/ac	802.11a/b/g/n/ac	802.11ac Wave 2	802.11ac Wave 2	802.11ac Wave 2
Frequency	2.4 & 5 GHz	2.4 & 5 GHz	2.4 & 5 GHz	2.4 & 5 GHz	5 GHz
2.4 GHz Max. Data Rate	450 Mbps	450 Mbps	400 Mbps	400 Mbps	-
5 GHz Max. Data Rate	1,300 Mbps	1,300 Mbps	867 Mbps	867 Mbps	867 Mbps
Radio Chains/Streams	3 x 3:3	3 x 3:3	2 x 2:2	2 x 2:2	2 x 2:2
RF Output Power	29 dBm	29 dBm	23 dBm each band	27 dBm each band	23 dBm each band
Ingress Protection Rating	68	55	67	55	55
Primary Ethernet Port	1 x Gig Port	1 x Gig Port	1 x Gigabit Port	1 x Gigabit PoE	1 x Gigabit PoE
Secondary Ethernet Port	1 x Gig Port (PoE Output)	1 x Gig Port	1 x Gigabit Port	1 x Gigabit Port	1 x Gigabit PoE
PoE Compliant	802.3at (PoE+)	802.3at (PoE+)	802.3at (PoE+)	-	-
Power Consumption (Peak)	35.71W	23W	12.6W	15W	6.3W
Integrated Antennas	N/A	6 x 5 dBi	N/A	N/A	N/A
External Antenna	3 x 5 dBi (2.4 GHz:) 3 x 7 dBi (5 GHz)	N/A	4 x 5 dBi Omni-Directional SMA-Type	4 x 5 dBi Omni-Directional SMA-Type	2 x 5 dBi Omni-Directional SMA-Type

Wireless Bridges

Outdoor Wireless Bridges provide long-range network expansion and wireless connectivity that is powerful and reliable. Products feature high-gain antennas that extend Point-to-Point networks up to 5 miles, ruggedized IP-rated housing to defy harsh climates, and dual-gigabit PoE ports to expand deployment & power options.

Models	EnStationAC	EnStation5-AC	ENS500AC	ENH500v3
Standards	802.11a/n/ac	802.11ac Wave 2	802.11ac Wave 2	802.11ac Wave 2
Frequency	5 GHz	5 GHz	5 GHz	5 GHz
Max. Data Rate	Up to 867 Mbps	Up to 867 Mbps	Up to 867 Mbps	Up to 867 Mbps
RF Output Power	26 dBm	23 dBm	23 dBm	27 dBm
Primary Ethernet Port	1 x Gigabit Port (PoE Input)	1 x Gigabit Port (PoE Input)	1 x Gigabit PoE	1 x Gigabit PoE
Secondary Gigabit Port	1 x Gigabit Port (PoE Output)	1 x Gigabit Port	1 x Gigabit Port	1 x Gigabit Port
Power-over-Ethernet	802.3at (in)/802.3af (out)	24V Proprietary	24V Proprietary	24V Proprietary
Power Consumption (Peak)	23.4W	7.5W	6.3W	8.9W
Integrated Antenna	19 dBi	19 dBi	14 dBi Directional	16 dBi Directional

Network Switches

Managed Gigabit PoE+ Network Switches offer enterprise-class features, simplified network configuration, monitoring and robust management options. Each switch is a full-feature Layer 2 platform capable of managing up to 50 EnGenius Access Points.

Models	EWS7952FP	EWS7952P	EWS7926EFP	EWS1200-28TFP	EWS7928P	EWS5912FP	EWS2910P
10/100/1000 Base-T, POE+	48	48	24	24	24	8	8
10/100/1000/10000 SFP+ Ports	-	-	2	-	-	-	-
10/100/1000 SFP Ports	4	4	-	4	4	2	2
Auto Uplink Gigabit Ports	-	-	-	-	-	2	-
Total PoE Budget	740W	410W	410W	410W	185W	130W	61.6W
PoE+ Capable Ports	1-48	1-48	1-24	1-24	1-24	1-8	1-8 (802.3af only)
Switching Capacity	104 Gbps	104 Gbps	56 Gbps	56 Gbps	56 Gbps	24 Gbps	20 Gbps
Forwarding Mode	Store-and-forward	Store-and-forward	Store-and-forward	Store-and-forward	Store-and-forward	Store-and-forward	Store-and-forward
MAC Address Table	8k	8k	8k	8k	8k	8k	8k
Management	Wireless AP Controller, ezMaster Network Management Software, Web GUI, CLI, SNMP, RMON, HTTPS, Dual Image						
Wireless EWS AP Support	Up to 50	Up to 50	Up to 50	Up to 50	Up to 50	Up to 50	Up to 50
Advanced QoS with IPv4/IPv6 Multicast Filtering	IGMP and MLD Snooping						
Auto-VoIP	•	•	•	•	•	•	•
VLANs	Max 4094 Static Groups, Voice VLAN						

ezMaster

ezMaster is EnGenius's flexible and highly scalable Wi-Fi network management system, in which all distributed Wi-Fi network deployments can be linked together to form a unified network. ezMaster allows you to easily add new Wi-Fi components such as APs to the network and provides a single-pane-of-glass for monitoring and configuration of the Wi-Fi network.

ezMaster allows your Wi-Fi to grow as your business grows. It can manage a handful of devices up to 1000+ on an unlimited number of networks. You can easily configure and maintain multiple customer sites with thousands of devices, all with no extra or hidden license or subscription fees.

The ezMaster Dashboard provides at-a-glance insight into your network's status and allows you to drill down to any issue locations – switches, APs, and other devices. The various views allow you to monitor real-time and historical traffic flow, the deployment topology with device relationships, a map view that shows device locations and coverage within a building, and a map view that shows device locations across a campus or similar deployment.

ezMaster is packaged as a virtualization appliance image for quick and easy deployments. It can be launched using VirtualBox, VMware or other virtualization products. For even more simplicity, ezMaster comes already loaded on the SkyKey controller, which can be access by any workstation via the SkyKey IP address.

ezWiFi Planner

EnSky users can guarantee that their Wi-Fi network deployment is optimized for best effect. The EnGenius ezWiFi Planner allows customers to map out Wi-Fi coverage and AP placement so that their Wi-Fi network provides the best and most comprehensive coverage for all mobile devices.

ezWiFi Planner lets users import floor plans or area maps and set a specified scale that matches the distances where Wi-Fi will be deployed. Once confirmed, ezWiFi Planner provides tools that allow you to place AP models and simulate potential obstacles that can affect signal strength. ezWiFi Planner then graphically displays coverage heat maps visualizations to help businesses effectively set up and plan Wi-Fi networks.

Once completed, users can generate a planning report for deployment with suggested AP models and device placement for an optimized coverage scenario that closely mirrors reality

The ezWiFi Planner tool is included as part of EnSky and is available from the EnGenius partner portal.

enWiFi App

EnGenius Mobile Apps are designed to access your home or small business while you're on the move. The enWiFi app for the EnSky suite allows you to quickly manage your network, store and retrieve your files, and keep an eye on what matters.

The EnWiFi App facilitates the initial quick set-up for an AP or group of APs before so they can be added to the management system. This is especially helpful for service providers or operators to do initial deployment on-site with devices just taken out of the box with factory default settings.

Once you power up an AP, it broadcasts a specific management SSID for connection. enWiFi app users can match the MAC address to the corresponding SSID and then add it to the management software. Once a single AP is added, it can be

used to discover any further APs that use a similar configuration to make group adds fast and simple.

For any LAN or WLAN deployment that needs coverage extensions, the enWiFi App also assists users in setting up WDS links to extend the coverage.

Maximum data rates are based on IEEE 802.11 standards. Actual throughput and range may vary depending on distance between devices or traffic and bandwidth load in the network.