

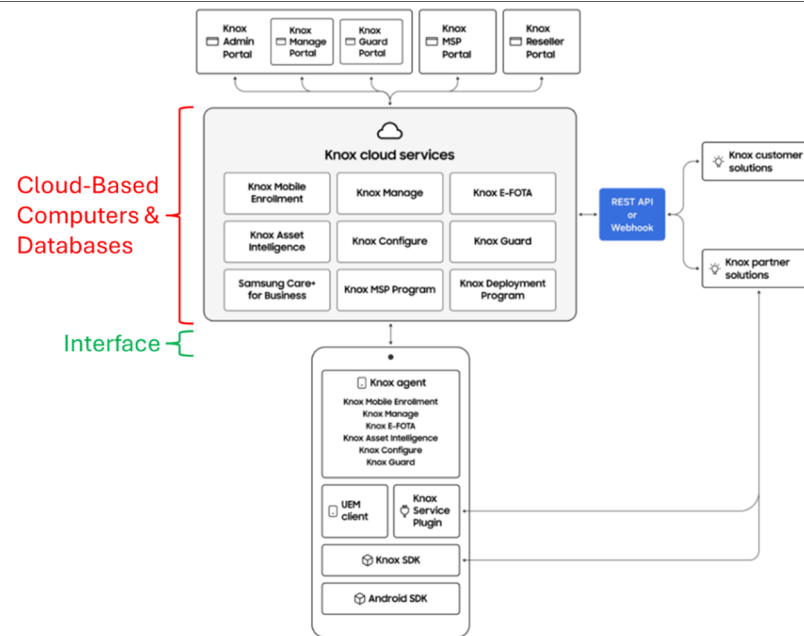
Exhibit 15

EXHIBIT 15 – U.S. Patent No. 8,725,700

Plaintiff asserts that the following products (“Accused Instrumentalities”) infringe the Asserted Claims of U.S. patent No. 8,725,700:

Any enterprise computer system that runs, executes, or uses Samsung’s Knox Suite, including the Knox Admin Portal (including the Knox Manage Portal and/or the Knox Guard Portal), the Knox Cloud Services (including Knox Mobile Enrollment (KME), Knox Manage, Knox Enterprise Firmware Over the Air (E-FOTA), Knox Asset Intelligence (KAI), Knox Configure, Knox Guard, Samsung Care+ for Business, Knox Managed Service Provider (MSP), and/or the Knox Deployment Program), and Knox Agent, and optionally including Knox Platform for Enterprise (KPE), Knox Remote Support, Knox Capture, Knox Authentication Manager, and/or the Knox Deployment Program (collectively, the “Accused Knox Products”).

Claim 1	Accused Knox Products
[1PRE] A method of collecting and providing access to quality or service information associated with one or more wireless communications networks, mobile devices, or end users, comprising:	<p>The Accused Knox Products collect and provide access to quality or service information associated with one or more wireless communications networks, mobile devices, or end users.</p> <p>For example, the Accused Knox Products include an application, the Knox Agent, that can be downloaded and executed on a mobile device and can interface with one or more of the cloud-based computers of the Knox Cloud Services via an application programming interface. As described below, the Knox Agent collects quality or service information from a wireless communication device and the Knox Cloud Services and Knox Admin Portal provide that information to end users, such as an enterprise IT administrator.</p>



Samsung Knox Documentation, Fundamentals, Introduction, the Big Picture,
<https://docs.samsungknox.com/dev/fundamentals/> (last accessed September 2, 2025).

The Knox Asset Intelligence agent is responsible for collecting device health and usage information, and sending this information back to the server to be converted into meaningful dashboard insights. *See* Samsung Knox Documentation, Home, Knox Asset Intelligence, How-to guides, Use the agent app, <https://docs.samsungknox.com/admin/knox-asset-intelligence/how-to-guides/use-the-agent-app/> (last accessed September 2, 2025). Once the agent app is downloaded and installed, device users simply launch the app to let the agent begin collecting data. *See id.* For example, performance or quality of service information for the mobile device, such as network signal strength, can be updated in real time, for example, every 10 seconds. *See id.* Furthermore, users can view their device's Wi-Fi network signal strength over the last ten seconds, updated in real time. *See id.*

Use the agent app

Last updated September 25th, 2024

The Knox Asset Intelligence agent is responsible for enrolling devices into the service, collecting device health and usage information, and sending this information back to the server to be converted into meaningful dashboard insights. Once the agent app is downloaded and installed, device users simply launch the app to let the agent begin collecting data.

Samsung Knox Documentation, Home, Knox Asset Intelligence, How-to guides, Use the agent app, <https://docs.samsungknox.com/admin/knox-asset-intelligence/how-to-guides/use-the-agent-app/> (last accessed September 2, 2025).

Network

The **Network** screen displays the mobile network signal strength of the device, along with information about the carrier network and mobile data usage.

On the chart, users can view their device's mobile network signal strength over the last 10 seconds, updated in real time. Users can tap the **Mobile data usage** field to view additional usage details, or tap **Error report** to send a debug log to their IT admins to help troubleshoot mobile network related issues.

Samsung Knox Documentation, Home, Knox Asset Intelligence, How-to guides, Use the agent app, <https://docs.samsungknox.com/admin/knox-asset-intelligence/how-to-guides/use-the-agent-app/> (last accessed September 2, 2025)

Wi-Fi

Status

The **Wi-Fi** screen shows the **Status** tab default. Here, device users can view the signal strength of a Wi-Fi connection, along with information about the Wi-Fi network's IP address, SSID, and MAC information. On the chart, users can view their device's Wi-Fi network signal strength over the last ten seconds, updated in real time.

If Wi-Fi roaming is detected, additional roaming information is displayed. The signal strength is shown in real-time as a graph, with three statuses indicating the network latency. The status ranges are as follows:

Status	Strength
Excellent	-67 dBm or higher
Very good	-68 dBm to -70 dBm
Okay	-71 dBm to -80 dBm
Not good	-81 dBm to -90 dBm
Unusable	-91 dBm or lower

Samsung Knox Documentation, Home, Knox Asset Intelligence, How-to guides, Use the agent app, <https://docs.samsungknox.com/admin/knox-asset-intelligence/how-to-guides/use-the-agent-app/> (last accessed September 2, 2025)

The Accused Knox Products further enable the Knox Cloud Services, such as Knox Asset Intelligence, to be updated with the most recent signal strength information (e.g., performance or quality of service information) from the mobile device via the first interface. For example, the “data upload” section of the Knox Asset Intelligence settings has several data upload settings. *See* Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Settings, Data conditions tab, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/settings/data-conditions/> (last accessed September 2, 2025).

Data upload

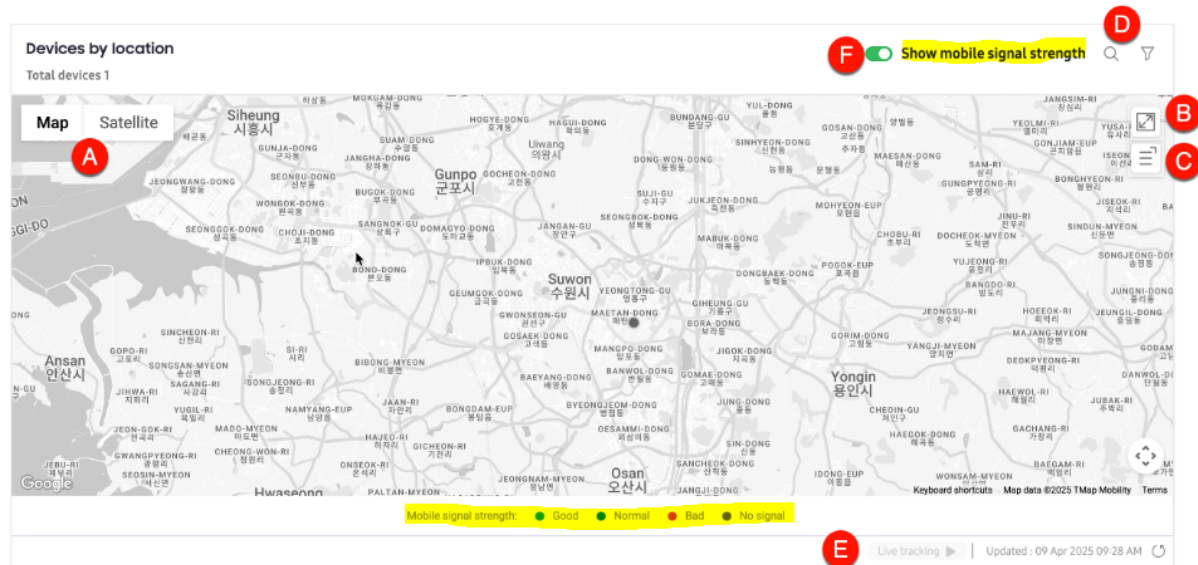
The **Data upload** section lets you specify what type of data gets collected, and — for some insights — how often data gets collected. The following table describes the data upload options available. Select a data upload option checkbox in each category to let Knox Asset Intelligence collect that specific type of data from your devices. To disable data collection for an entire category altogether, toggle the category option off.

Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Settings, Data conditions tab, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/settings/data-conditions/> (last accessed September 2, 2025)

The Accused Knox Products further allow end users, such as enterprise IT administrators, to review, catalog or sort information, such as the mobile signal strength data. Specifically, the mobile signal strength data can be displayed via maps, which enable customers to quickly correlate device IDs with each mobile signal strength statuses. On the map, users can see the mobile signal strength status of every device in a fleet represented by colored dots, which are updated at the same rate as the location data collection frequency. *See* Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-dashboard/#:~:text=To%20use%20this%20feature%2C%20you,next%20to%20the%20Search%20icon> (last accessed September 2, 2025).

Location map

The map displays your device groupings (represented by gray circles on the map) as soon as you open the **Location** dashboard. When you zoom in, the circles updates to show the device distribution across a given area.



Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-manage/introduction/features-and-key-strengths/#:~:text=Effortless%20content%20management,Storage%20of%20device%20analysis%20data> (last accessed September 2, 2025).

The Accused Knox Products provide a network management platform through a network communication interface for managing mobile devices that interact with an enterprise network. The Accused Knox Products include Knox Platform for Enterprise (KPE), Knox Mobile Enrollment (KME), Knox Manage, Knox E-FOTA, Knox Asset Intelligence (KAI), Knox Remote Support, Knox Capture, Knox Authentication Manager, Knox Configure, and Knox Guard.

The Knox Service Guide v3.05 describes Knox Manage as an enterprise mobility management (EMM) platform that includes an EMM console that allows IT administrators to manage mobile devices enrolled with Knox Manage. Knox Service Guide v3.05, p. 7. The Knox Manage Client (e.g., application) is deployed to managed mobile devices when they are enrolled with Knox Manage. Knox Service Guide v3.05, p. 5. In one example, the managed mobile device can be configured, through the EMM application, to report device location information to the EMM console.

See <https://image-us.samsung.com/SamsungUS/samsungbusiness/pdfs/Samsung-KNOX-QuickStarts-3v05.pdf> (“Knox Service Guide v3.05”)

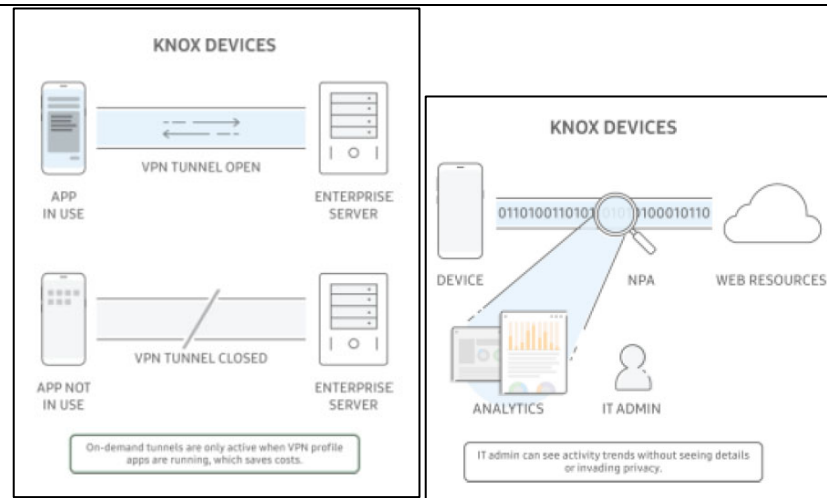
2.7. Device Policy Creation

Device policies are deployed when a device is enrolled in Knox Manage or can be pushed automatically to devices. Knox Manage implements a hierarchy policy set that allows policies to be deployed to all users, while other policies can then be deployed to a subset of users based on your business need. Some of the policies that can be configured include allowing users to use the camera, **configure the device to report the devices location within the EMM console**, and allowing users to wipe devices.

Knox Service Guide v3.05, p. 7 (annotated).

Samsung published several documents outlining the functionality of Knox Suite, including user guides, promotional documents, and white papers. The figures below, from Samsung Knox White Paper v1.5, show the network communication interface that allows for the secure transfer of information between the managed mobile devices and enterprise servers on the enterprise network.

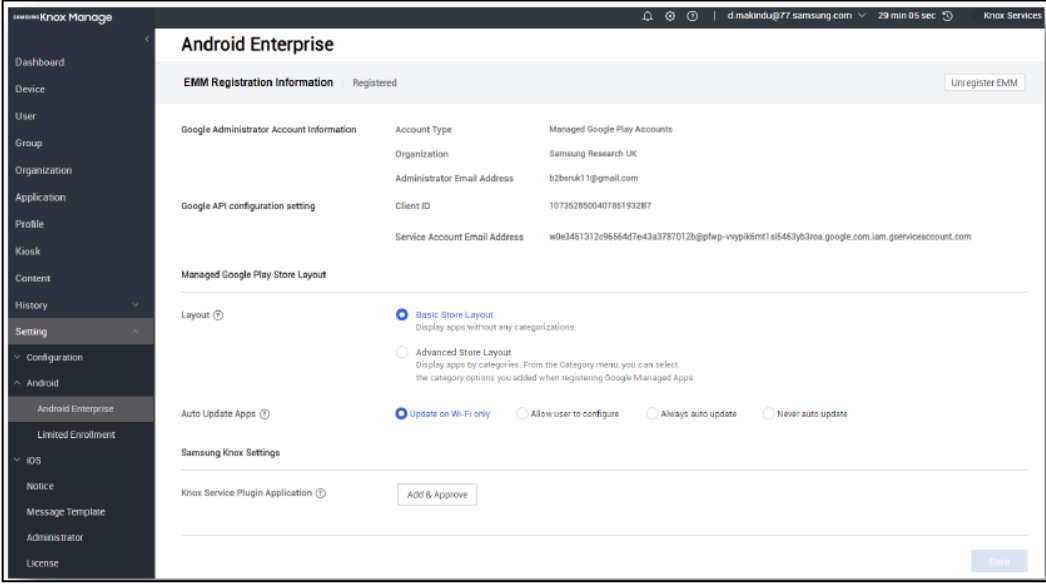
See <https://image-us.samsung.com/SamsungUS/samsungbusiness/solutions/topics/iot/071421/Knox-Whitepaper-v1.5-20210709.pdf> (“Knox White Paper v1.5”)



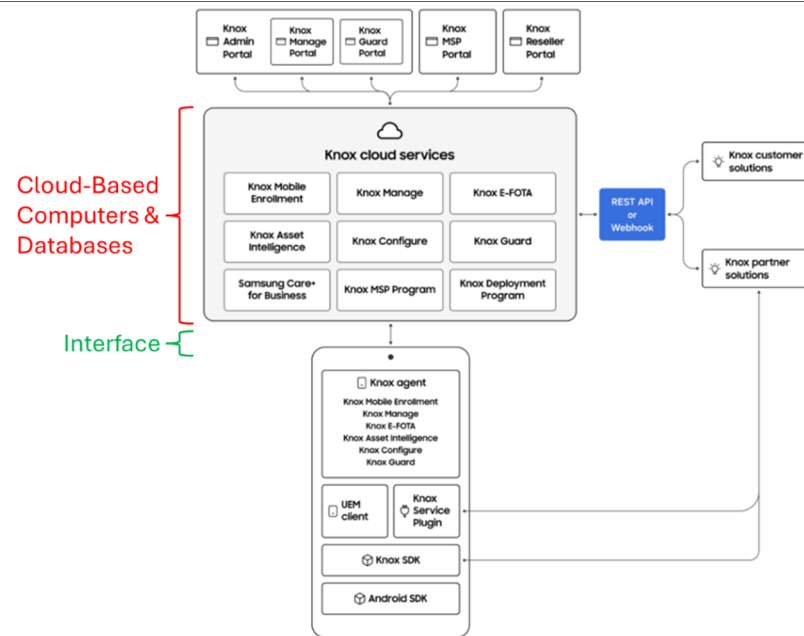
Knox White Paper v1.5, pp. 35 (left), 37 (Right).

The image below shows the EMM console of Knox Manage that allows the IT admin to enroll, configure, manage, or review information associated with the managed mobile devices.

See <https://docs.samsungknox.com/admin/knox-platform-for-enterprise/assets/knox-manage-knox-platform-for-enterprise-guide-v3.0.pdf> ("Samsung Knox Manage 22.5")

	 <p style="text-align: center;">Samsung Knox Manage 22.5, p. 8</p>
<p>[1A] using a computer, receiving mobile device location information of a plurality of mobile devices or end users that are associated with one or more wireless communications networks and quality or service information pertaining to wireless access characteristics</p>	<p>The Accused Knox Products use a computer to receive mobile device location information of a plurality of mobile devices or end users that are associated with one or more wireless communications networks and quality or service information pertaining to wireless access characteristics for one or more mobile devices of said plurality of mobile devices or end users, and said quality or service information comprising coverage, availability or performance information of one or more wireless communications networks or said one or more mobile devices.</p> <p>For example, the Knox Cloud Services include one or more cloud-based computers that receive mobile device location information via an interface, such as an application programming interface. <i>See</i> Samsung Knox Documentation, Fundamentals, Introduction, the Big Picture, https://docs.samsungknox.com/dev/fundamentals/ (last accessed September 2, 2025).</p>

for one or more mobile devices of said plurality of mobile devices or end users, and said quality or service information comprising coverage, availability or performance information of one or more wireless communications networks or said one or more mobile devices,



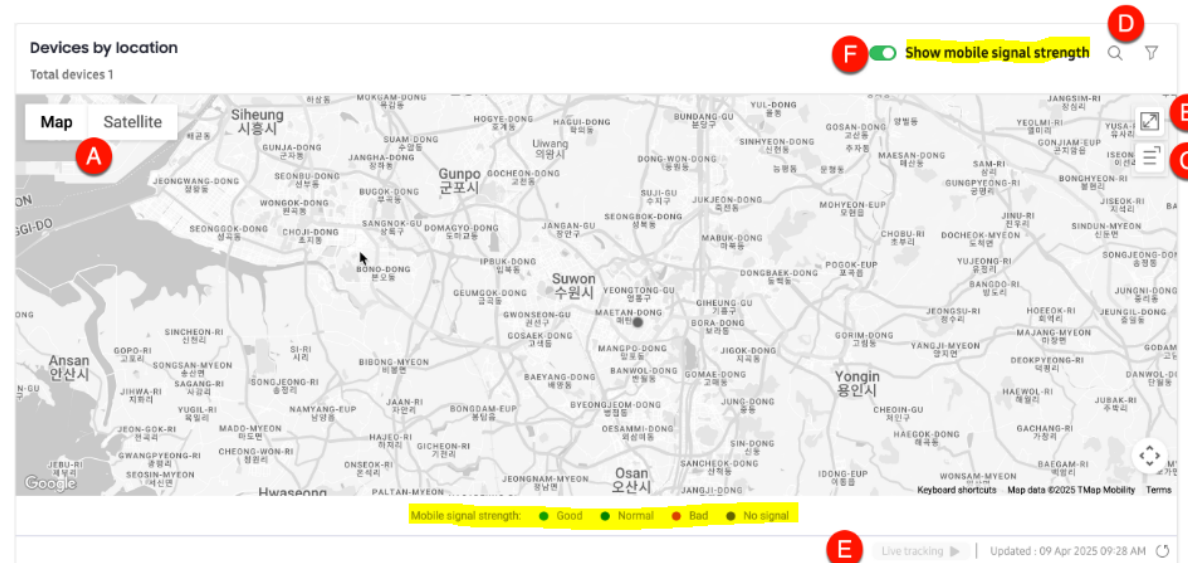
Samsung Knox Documentation, Fundamentals, Introduction, the Big Picture,
<https://docs.samsungknox.com/dev/fundamentals/> (last accessed September 2, 2025).

The received information includes location information for each mobile device, because the Accused Knox Products further allow end users, such as enterprise IT administrators, to use computers access review, catalog or sort information, such as the mobile signal strength data on maps. These maps are generated based on location information generated by the mobile devices of enterprise employees, received by one or more cloud-based computers of the Knox Cloud Services, and ultimately received by a computer of an enterprise IT administrator end user that accesses the Knox Cloud Services via the Knox Admin Portal. The received information enables customers to quickly correlate device IDs with each mobile signal strength status for each device in a fleet represented by colored dots, which are updated at the same rate as the location data collection frequency. See Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, [https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-](https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-)
[dashboard/use-the-location-](https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-)

[dashboard/#:~:text=To%20use%20this%20feature%2C%20you,next%20to%20the%20Search%20icon](#) (last accessed September 2, 2025).

Location map

The map displays your device groupings (represented by gray circles on the map) as soon as you open the **Location** dashboard. When you zoom in, the circles updates to show the device distribution across a given area.



Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-manage/introduction/features-and-key-strengths/#:~:text=Effortless%20content%20management,Storage%20of%20device%20analysis%20data> (last accessed September 2, 2025).

This received location information is also associated with one or more wireless communication networks (e.g., mobile, WiFi) and quality of service information (e.g., signal strength). As illustrated above, signal strength data can be displayed via maps, which enable IT administrators to quickly correlate device IDs with each mobile signal strength statuses. Such signal strength data represents information of each mobile device's coverage, availability or performance information at a particular location. See Samsung Knox Documentation,

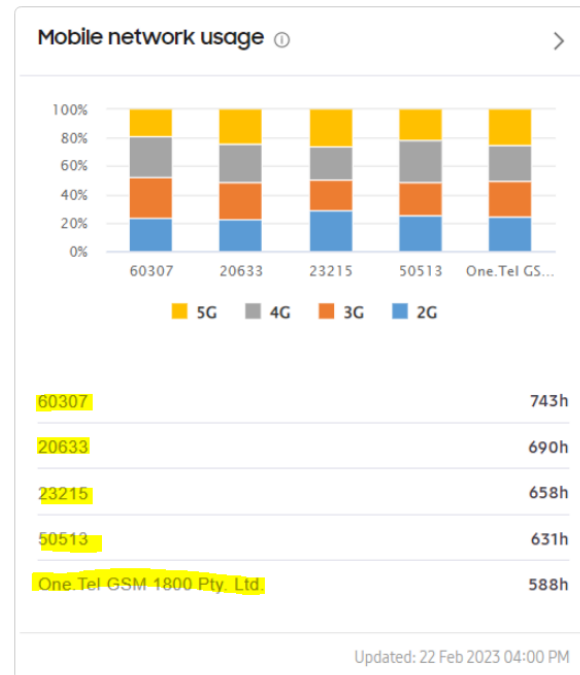
Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-dashboard/#:~:text=To%20use%20this%20feature%2C%20you,next%20to%20the%20Search%20icon> (last accessed September 2, 2025).

The Accused Knox Products further transmit, process, and receive coverage, availability or performance information for one or more wireless communications networks. For example, as illustrated above, Accused Knox Products provide performance information, such as mobile network usage, on a “per carrier” basis. This helps monitor and measure how device users are using mobile data by collecting data about mobile data usage by network generations and carrier. For example, device users might primarily be using 4G networks, meaning a 5G data plan could be unnecessary. *See* Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Network insights, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/network-insights/mobile-network-usage/> (last accessed September 2, 2025). According to Samsung, “Knox Asset Intelligence collects the MCC/MNC code and matches it to a carrier name.” *See id.*

Network	Wi-Fi disconnection events: Groups	Get in-depth visibility into device groups with the highest amount of disconnection problems, including detailed event logs.
	Wi-Fi disconnection events: BSSIDs and APs	Get in-depth visibility into Wi-Fi networks with the highest amount of disconnection problems, including detailed event logs.
	Mobile network usage	Get in-depth visibility into cellular usability information, including which network generations are used per carrier.
	Network latency	Lets you see which IP addresses or domains have the longest response time or don't respond at all to device requests.

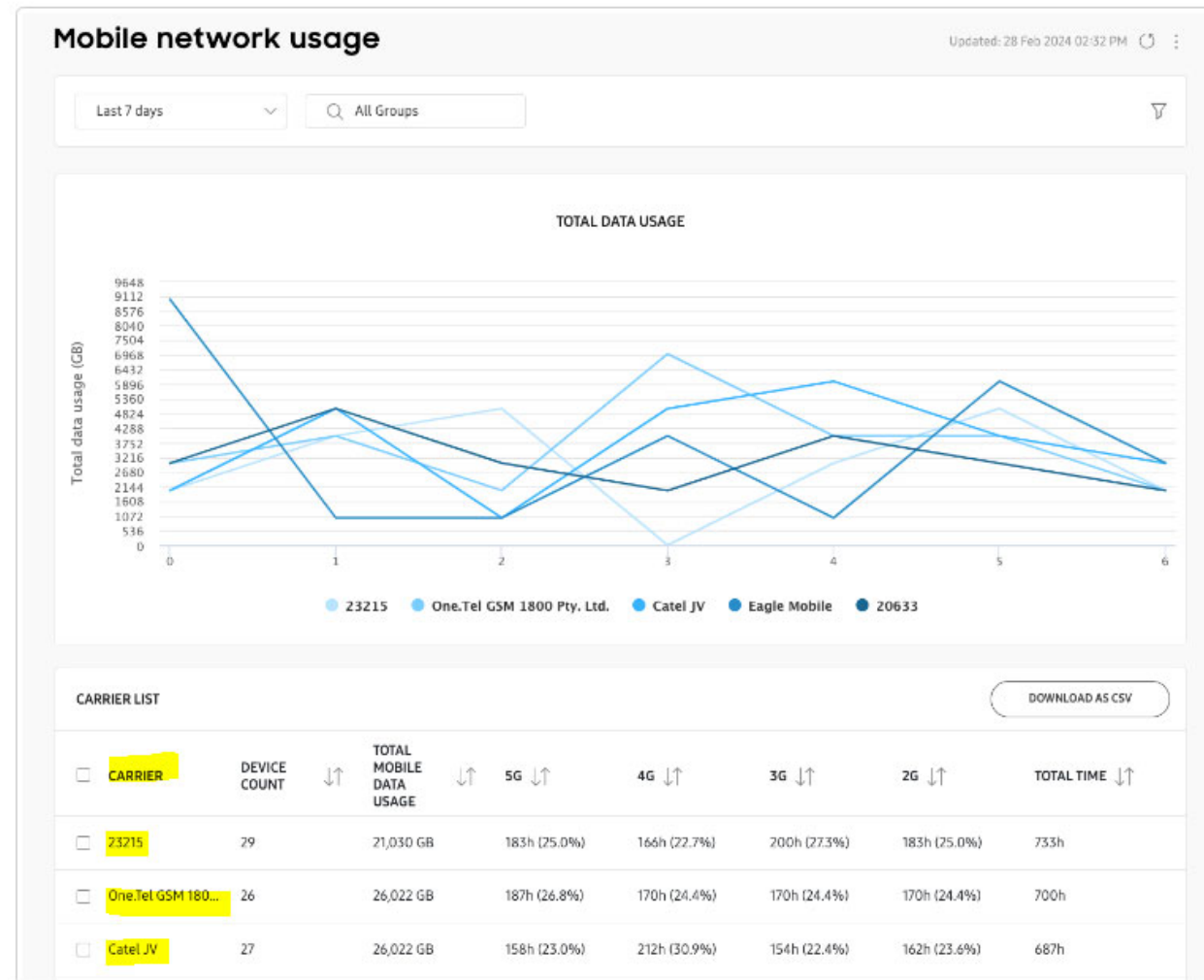
Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Overview,
<https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/overview/> (last accessed September 2, 2025)

The **Mobile network usage** dashboard chart displays **cellular signal information arranged by carrier network**, providing insight into which network generations — 2G, 3G, 4G, and 5G — are used per carrier.



The **five carriers with the longest cumulative connection durations are shown**, along with the percentage of **total carrier usage time** associated with each network generation. The information also includes the **type of cellular network**, the **connection duration** for each network generation, and the **cellular usage by carrier**.

Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Network insights,
<https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/network-insights/mobile-network-usage/> (last accessed September 2, 2025).



The **Mobile network usage** expanded view page features a chart that lists the top 5 mobile carriers with the highest network usage (in GB) over the selected reporting period. Click any carrier name in the legend to show or hide the data on the chart.

In the **CARRIER LIST** table below, you'll see usage data for every carrier that your devices connected to during the selected reporting period. For each carrier, you can view how many devices connected, view the total usage (in GB), and view the total connection time (in hours) for that carrier (with connection time data broken down by network generation (5G, 4G, and so on)).

Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Network insights, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/network-insights/mobile-network-usage/> (last accessed September 2, 2025).

The Accused Knox Products provide a network communication interface between an IT admin through the EMM console and the EMM client on the managed mobile devices. The EMM console network communication interface provides a front-end interface for an IT administrator to manage, configure, and review information associated with managed mobile devices.

The figure below shows the EMM console which provides a front-end interface for the IT administrator on a first computer device to review a database of mobile device profiles. The figure below, from Samsung's Knox E-FOTA On-Premises Admin Guide, shows a database of information corresponding to each mobile device managed by an employer. In this example, the EMM console accesses device information from a Knox database for user type, operating system version, security patch version, and firmware version for the managed mobile devices.

TYPE	OPEN DATE	OS VERSION	SECURITY PATCH	FIRMWARE VERSION	TEST
user	2020-07-30	Pie(Android 9)	2020-06-01	G950FXXU9DTF1/G950FXXM9DTF1/G950FXXU9DTF1	☒ Mark as Tested ☐ Unmark from Tested ☐ Add to Blocklist ☐ Remove from Blocklist ☐ Download Versions Scenario
user	2020-06-11	Pie(Android 9)	2020-05-01	G950FXXS9DTFA/G950FXXM9DTF1/G950FXXS9DTF1	☐
user	2020-04-15	Pie(Android 9)	2020-04-01	G950FXXS8DTCA/G950FXXM8DTF1/G950FXXS8DTF1	☐
user	2020-03-17	Pie(Android 9)	2020-03-01	G950FXXS8DTCL/G950FXXM8DTF1/G950FXXS8DTCL	☐
user	2020-01-22	Pie(Android 9)	2020-01-01	G950FXXS4DTA1/G950FXXM6DSK9/G950FXXU4DSK5	☐
user	2019-12-30	Pie(Android 9)	2019-11-01	G950FXXU4DSK9/G950FXXM6DSK9/G950FXXU4DSK5	☐
user	2019-11-27	Pie(Android 9)	2019-10-01	G950FXXS5DSJL/G950FXXM5DSHC/G950FXXU5DSH3	☐
user	2019-09-22	Pie(Android 9)	2019-09-01	G950FXXS5DSJL/G950FXXM5DSHC/G950FXXU5DSH3	☐

Knox E-FOTA On-Premises Admin Guide, p. 15

The Knox Asset Intelligence (KAI) service, within the Knox Suite, allows the EMM console to monitor network information associated with each of the managed mobile device, as described below.

Get started with Knox Asset Intelligence

Last updated September 6th, 2023

Knox Asset Intelligence is a data analytics solution that turns device usage information into actionable business insights. With Knox Asset Intelligence, IT admins can monitor the health and status of their device fleet's apps, batteries, and network connectivity through a powerful and highly-customizable dashboard.

See <https://docs.samsungknox.com/admin/knox-asset-intelligence/get-started/tutorials/get-started-with-knox-asset-intelligence/>

In a KAI promotional document, Samsung describes the KAI service as “a web portal designed to give enterprise IT a much deeper understanding of mobile device and app performance.”

See https://kp4-cdn.samsungknox.com/resource/Knox%20Asset%20Intelligence%20-%20Design%20feature_3k-O.pdf (“KAI Design Features”)

Knox Asset Intelligence brings visibility to mobile device performance

IT departments traditionally haven't had the necessary visibility across their device fleet to identify performance issues and have struggled to assess how well devices and apps are being utilized and what factors are reducing the life cycle of their mobile assets.

Through research and multiple iterations, Knox Asset Intelligence was created—a web portal designed to give enterprise IT a much deeper understanding of mobile device and app performance, helping to ensure that any problems that could impact productivity are quickly resolved.

KAI Design Features, p. 2

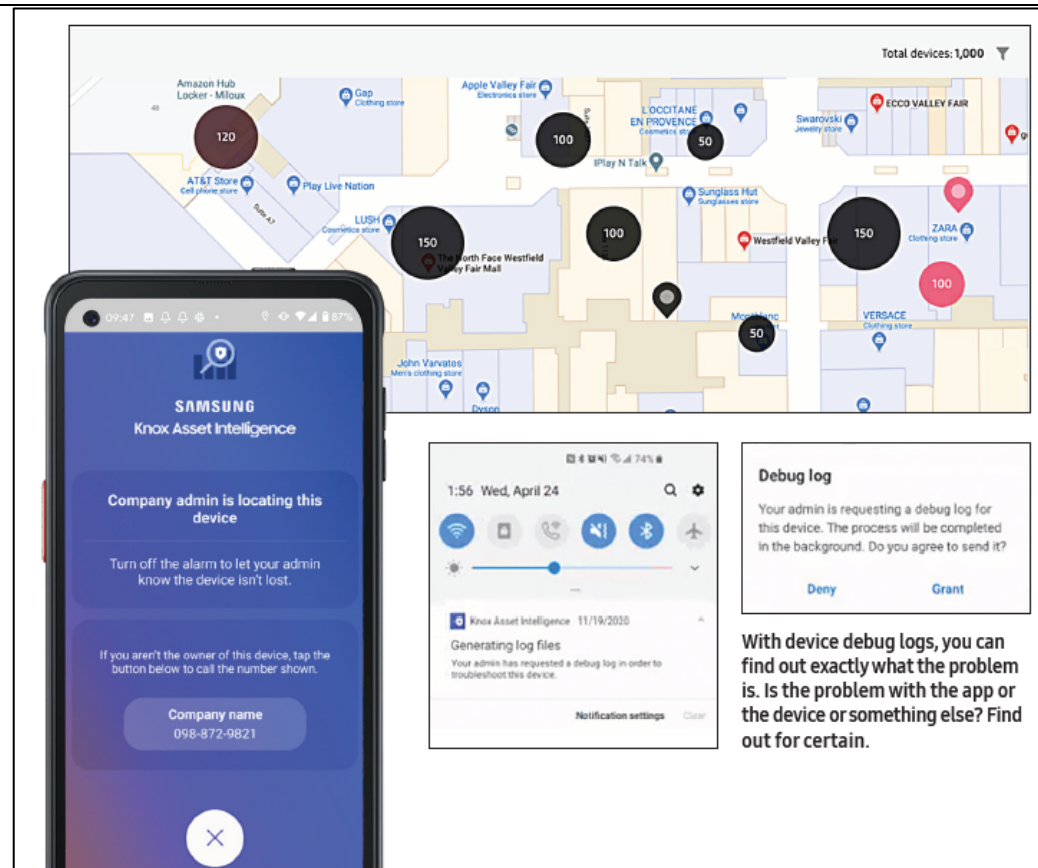
The table below describes the real-time data that is retrieved from the managed mobile devices, associated with the network performance and location of the managed mobile devices. The IT admin can view, through the EMM console, live tracking for up to 30 seconds at a time. The table below states that the mobile signal strength information, associated with managed mobile devices is “updated at the same rate as your location data collection frequency.”

E	Live tracking	<p>Click to receive continuous location updates from your devices for up to 30 seconds at a time. Live tracking stops after 30 seconds, after which you'll have to click the Live tracking button once again to receive continuous updates for another 30 seconds.</p> <p>This button can only be clicked after a certain zoom level. If you can't click the button, try zooming in on the map until you can. If your devices are active and reporting location data, you'll see a dot on the map showing the device's location. As the device moves, the dot on the map also moves.</p>
F	Mobile signal strength	<p>Let's you identify when devices are situated in areas with weak cellular coverage or potential dead zones. To use this feature, you must first enable Mobile signal strength with location.</p> <p>On the map, you'll see the mobile signal strength status of every device in your fleet represented by colored dots. These dots are updated at the same rate as your location data collection frequency.</p> <ul style="list-style-type: none"> • Good (green): -70 dBm or higher • Normal (blue): -71 dBm to -80 dBm • Bad (red): -81 dBm to -139 dBm • No signal (grey): -140 dBm or lower, no collection <p>These dots also appear in the map's Device list, letting you quickly correlate the device IDs with each mobile signal strength status. If you want to only show devices with a specific status—for example, only show Bad devices—you can select the status using the map's Filter options next to the Search icon.</p>

See <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-dashboard/>

The figure below shows another example of the interactive maps provided by the KAI service that allows the IT admin to track the location of the managed mobile devices.

See https://image-us.samsung.com/SamsungUS/samsungbusiness/solutions/services/mobility-software/Knox_Asset_Intelligence_Flyer.pdf (“Knox Asset Intelligence Flyer”)



Knox Asset Intelligence Flyer, p. 9

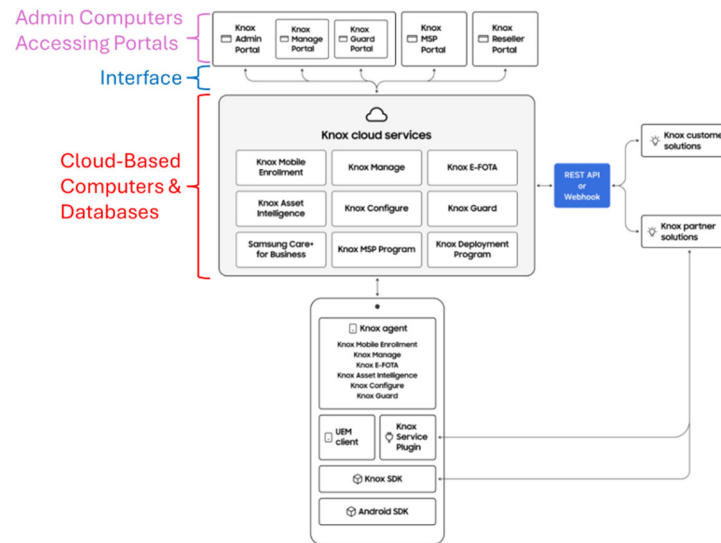
[1B] storing, by action of said computer, said mobile device location information and said quality or service information

The Accused Knox Products store, by action of said computer, said mobile device location information and said quality or service information in a memory or database.

For example, the Knox Cloud Services include one or more cloud-based databases or computers with memories that store mobile device data uploaded via the Knox Agent, for analysis and display via the Knox Admin Portal, which includes one or more web-based portals that interface with one or more cloud-based computers and databases of the Knox Cloud Services. According to Samsung, “[w]ith Knox Cloud Services,

in a memory or database;

enterprise IT administrators can access a range of device management, monitoring, security, and customization solutions for their fleet of devices.” Samsung Knox Documentation, Fundamentals, Introduction, the Big Picture, <https://docs.samsungknox.com/dev/fundamentals/> (last accessed September 2, 2025).



Samsung Knox Documentation, Fundamentals, Introduction, the Big Picture, <https://docs.samsungknox.com/dev/fundamentals/> (last accessed September 2, 2025) (annotated).

The Accused Knox Products provide “[s]torage of device analysis data,” to facilitate “[r]eal-time monitoring of devices,” “[s]upport for audits that verify system events, applied policies, tampering and compliance violations,” and “[s]upport for appropriate actions after audit.” Samsung Knox Documentation, Knox Manage, Introduction, Features and key strengths, <https://docs.samsungknox.com/admin/knox-manage/introduction/features-and-key-strengths/#:~:text=Effortless%20content%20management,Storage%20of%20device%20analysis%20data> (last accessed September 2, 2025).

Storage of device analysis data

In addition to real-time monitoring of devices, Knox Manage also provides audits. You can verify the events that occur in the system, the policies that were applied, any tampering and compliance violations, and so on, and take appropriate actions against them.

- Real-time monitoring of devices.
- Support for audits that verify system events, applied policies, tampering and compliance violations and so on.
- Support for appropriate actions after audit.

Samsung Knox Documentation, Knox Manage, Introduction, Features and key strengths, <https://docs.samsungknox.com/admin/knox-manage/introduction/features-and-key-strengths/#:~:text=Effortless%20content%20management,Storage%20of%20device%20analysis%20data> (last accessed September 2, 2025).

The stored information includes “mobile signal strength” data (a type of quality of service information for one or more specific locations), which enables the identification of “devices situated in areas with weak cellular coverage or potential dead zones.” Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-dashboard/#:~:text=To%20use%20this%20feature%2C%20you,next%20to%20the%20Search%20icon> (last accessed September 2, 2025).

F

Mobile signal strength

Let's you identify when **devices are situated in areas with weak cellular coverage or potential dead zones**. To use this feature, you must first enable **Mobile signal strength with location**.

On the map, you'll see the mobile signal strength status of every device in your fleet represented by colored dots. These dots are updated at the same rate as your location data collection frequency.

- **Good (green):** -70 dBm or higher
- **Normal (blue):** -71 dBm to -80 dBm
- **Bad (red):** -81 dBm to -139 dBm
- **No signal (grey):** -140 dBm or lower, no collection

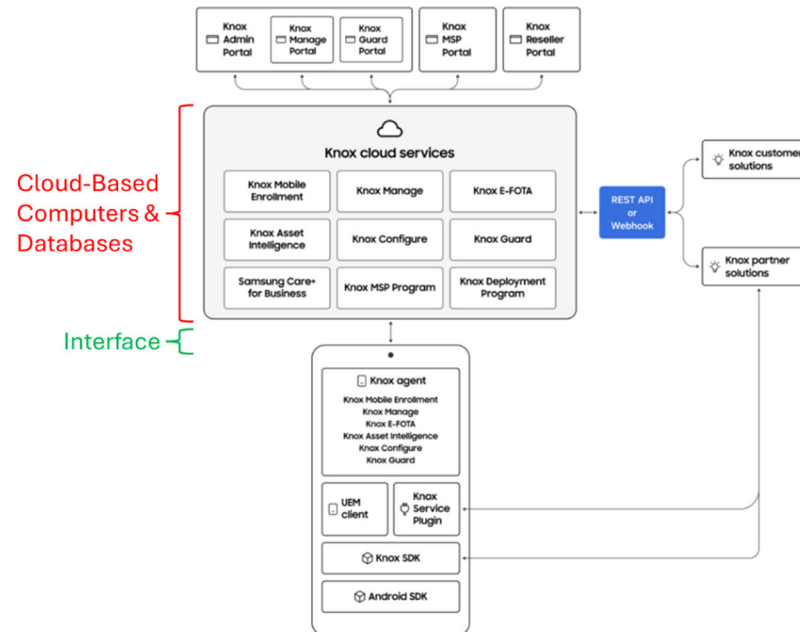
These dots also appear in the map's **Device list**, letting you quickly correlate the device IDs with each mobile signal strength status. If you want to only show devices with a specific status—for example, only show **Bad** devices—you can select the status using the map's **Filter** options next to the Search icon.

	<p>Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-dashboard/#:~:text=To%20use%20this%20feature%2C%20you,next%20to%20the%20Search%20icon (last accessed September 2, 2025).</p> <p>The Accused Knox Products store information associated with the managed mobile devices in a Knox database so that the information can be accessible to the IT admin through the EMM console.</p> <p>The data storage servers for the KAI service store data associated with the managed mobile devices in a queryable database as well as continuing to monitor, collect, and process, in automated fashion, data associated with the managed devices. The figure below shows the queryable date ranges for specific data stored in the database.</p>
--	--

	<table><tr><th>Data type</th><th>Data insight</th><th>Dashboard update rate</th><th>Available date ranges</th></tr><tr><td>Common</td><td>Device status</td><td>Real-time</td><td>Can only view data for Today</td></tr><tr><td rowspan="4">Battery</td><td>Battery status and state of health</td><td>Real-time</td><td>Can only view data for Today</td></tr><tr><td>Low battery, Battery drain, and Charge events</td><td>Previous day</td><td>Can view data for Yesterday, or Last 7, 14, 30, or 60 days.</td></tr><tr><td>Battery level at shift start</td><td>Real-time when viewing Today's issues, otherwise Previous day.</td><td>Can view data for Yesterday, or Last 7, 14, 30, or 60 days.</td></tr><tr><td>Battery level at shift end</td><td>Previous day</td><td>Can view data for Yesterday, or Last 7, 14, 30, or 60 days.</td></tr><tr><td rowspan="2">App</td><td>App usage</td><td>Previous day</td><td>Can view data for Yesterday, or Last 7, 14, 30, or 60 days.</td></tr><tr><td>App issues</td><td>Real-time sent hourly by default. Can be changed in Dashboard Settings.</td><td>Can view data for Today, Yesterday, or Last 7, 14, 30, or 60 days.</td></tr><tr><td rowspan="3">Network</td><td>Wi-Fi disconnections</td><td>Real-time</td><td>Can view data for Today, Yesterday, Last 7, or 14 days.</td></tr><tr><td>Mobile network usage</td><td>Previous day</td><td>Can view data for Yesterday, or Last 7, 14, 30, or 60 days.</td></tr><tr><td>Network latency response time</td><td>Previous day</td><td>Can view data for Last 7, 14, or 30, days.</td></tr><tr><td>System</td><td>Storage usage status</td><td>Real-time every every 3 hours.</td><td>Can only view data for Today.</td></tr><tr><td>Scan</td><td>Scanning performance</td><td>Real-time when viewing data for Today, otherwise Previous day.</td><td>Can view data for Today, Yesterday, or Last 7, 14, 30, or 60 days.</td></tr><tr><td>KSP</td><td>Knox Service Plugin</td><td>Real-time</td><td>Can only view data for Today.</td></tr><tr><td>Location</td><td>Location status</td><td>Real-time</td><td>Can only view data for Today.</td></tr><tr><td>Security</td><td>Warranty bit</td><td>Real-time</td><td>Can only view data for Today.</td></tr></table> <p>See https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/overview/</p>	Data type	Data insight	Dashboard update rate	Available date ranges	Common	Device status	Real-time	Can only view data for Today	Battery	Battery status and state of health	Real-time	Can only view data for Today	Low battery, Battery drain, and Charge events	Previous day	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.	Battery level at shift start	Real-time when viewing Today's issues , otherwise Previous day.	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.	Battery level at shift end	Previous day	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.	App	App usage	Previous day	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.	App issues	Real-time sent hourly by default. Can be changed in Dashboard Settings.	Can view data for Today, Yesterday, or Last 7, 14, 30, or 60 days.	Network	Wi-Fi disconnections	Real-time	Can view data for Today, Yesterday, Last 7, or 14 days.	Mobile network usage	Previous day	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.	Network latency response time	Previous day	Can view data for Last 7, 14, or 30, days.	System	Storage usage status	Real-time every every 3 hours.	Can only view data for Today.	Scan	Scanning performance	Real-time when viewing data for Today , otherwise Previous day.	Can view data for Today, Yesterday, or Last 7, 14, 30, or 60 days.	KSP	Knox Service Plugin	Real-time	Can only view data for Today.	Location	Location status	Real-time	Can only view data for Today.	Security	Warranty bit	Real-time	Can only view data for Today.
Data type	Data insight	Dashboard update rate	Available date ranges																																																								
Common	Device status	Real-time	Can only view data for Today																																																								
Battery	Battery status and state of health	Real-time	Can only view data for Today																																																								
	Low battery, Battery drain, and Charge events	Previous day	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.																																																								
	Battery level at shift start	Real-time when viewing Today's issues , otherwise Previous day.	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.																																																								
	Battery level at shift end	Previous day	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.																																																								
App	App usage	Previous day	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.																																																								
	App issues	Real-time sent hourly by default. Can be changed in Dashboard Settings.	Can view data for Today, Yesterday, or Last 7, 14, 30, or 60 days.																																																								
Network	Wi-Fi disconnections	Real-time	Can view data for Today, Yesterday, Last 7, or 14 days.																																																								
	Mobile network usage	Previous day	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.																																																								
	Network latency response time	Previous day	Can view data for Last 7, 14, or 30, days.																																																								
System	Storage usage status	Real-time every every 3 hours.	Can only view data for Today.																																																								
Scan	Scanning performance	Real-time when viewing data for Today , otherwise Previous day.	Can view data for Today, Yesterday, or Last 7, 14, 30, or 60 days.																																																								
KSP	Knox Service Plugin	Real-time	Can only view data for Today.																																																								
Location	Location status	Real-time	Can only view data for Today.																																																								
Security	Warranty bit	Real-time	Can only view data for Today.																																																								
[1C] updating, by action of said computer, said mobile device location information stored in said memory or database	<p>The Accused Knox Products update, by action of said computer, said mobile device location information stored in said memory or database when a mobile device of said plurality of mobile devices travels from one location to another.</p> <p>For example, Knox Manage, which is a service of the Knox Cloud Services and a component of the Knox Agent installed on mobile devices of enterprise personnel end users, as illustrated below, can periodically</p>																																																										

when a mobile device of said plurality of mobile devices travels from one location to another;

collect location data. *See* Samsung Knox Documentation, Knox Manage, Configure, Profile, Manage profiles, Collect device location information, <https://docs.samsungknox.com/admin/knox-manage/configure/profile/manage-profiles/collect-device-location-information> (last accessed September 11, 2025). Knox Manage can be configured to collect such data from the mobile devices and update the one or more cloud-based databases or memories of the one-or-more cloud-based computers every 30 minutes, 1 hour, 2 hours, 4 hours, 12 hours, and/or 24 hours, etc. *See id.*



Samsung Knox Documentation, Fundamentals, Introduction, the Big Picture, <https://docs.samsungknox.com/dev/fundamentals/> (last accessed September 2, 2025).

Configuring location data collection

You can use the **Location Settings** policy to configure how (or if) location data is collected from your devices. To do so:

1. [Create a new profile](#) or begin editing the profile applied to your target devices.
2. Open the **Location Settings** policy.
3. In the **Location Settings** field, set device or work profile controls for whether device users can enable or disable location services, and whether their consent is required. Available values are:

Value	Result
Allow user to configure	Allows the device user to toggle location services.
Allow user to configure and prompt for location accuracy	Allows the device user to toggle location services. Apps will prompt the device user for consent to collect precise location data.
Force on	Turns on location services without prompting the device user. The device user can't change any location settings. Note Not available for work profile controls.
Force off	Turns off location services without prompting the device user. The device user can't change any location settings.

4. In **Allow Collection of Location Data**, specify how location data will be collected. Available values are:

Value	Result
Automatic	Collect device location data without user consent. Note This option is only available for fully managed devices.
Upon user consent	Location data is collected after the device user consents. <ul style="list-style-type: none"> For fully managed devices, location data is collected after the device user provides consent. For devices with a work profile, location data is collected only if the device user turns on location services.

5. Specify the **Time Between Location Collection** to set the data collection interval. Available values are:

- 30 mins
- 1 hour
- 2 hours
- 4 hours
- 12 hours
- 24 hours

See Samsung Knox Documentation, Knox Manage, Configure, Profile, Manage profiles, Collect device location information, <https://docs.samsungknox.com/admin/knox-manage/configure/profile/manage-profiles/collect-device-location-information> (last accessed September 11, 2025).

The Accused Knox Products further enable the Knox Cloud Services, such as Knox Asset Intelligence, to be updated with the most recent signal strength information (e.g., performance or quality of service information) from the mobile device via the first interface. For example, the “data upload” section of the Knox Asset Intelligence settings has several data upload settings. See Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Settings, Data conditions tab, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/settings/data-conditions/> (last accessed September 2, 2025).

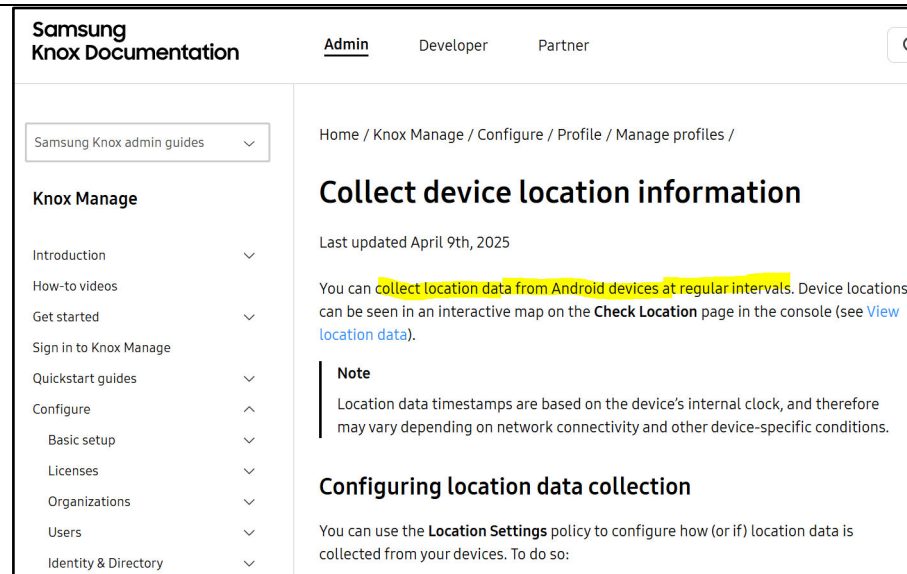
Data upload

The **Data upload** section lets you specify what type of data gets collected, and — for some insights — how often data gets collected. The following table describes the data upload options available. Select a data upload option checkbox in each category to let Knox Asset Intelligence collect that specific type of data from your devices. To disable data collection for an entire category altogether, toggle the category option off.

Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Settings, Data conditions tab, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/settings/data-conditions/> (last accessed September 2, 2025)

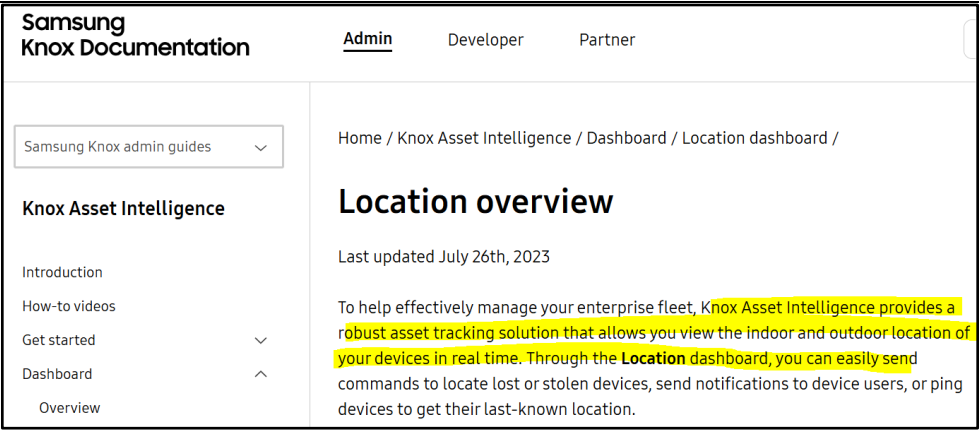
The locations dashboard is manually or automatically updated to provide automatic live tracking of managed mobile devices, for up to 30 seconds at a time. The table below states that the mobile signal strength information, associated with managed mobile devices is “updated at the same rate as your location data collection frequency.” Mobile signal strength information is quality or service information associated with at least one mobile device or end user associated with one or more wireless communications networks, mobile devices, or end users.

	<table border="1"> <tr> <td data-bbox="688 196 814 228">Live tracking</td><td data-bbox="821 196 1738 375"> <p>Click to receive continuous location updates from your devices for up to 30 seconds at a time. Live tracking stops after 30 seconds, after which you'll have to click the Live tracking button once again to receive continuous updates for another 30 seconds.</p> <p>This button can only be clicked after a certain zoom level. If you can't click the button, try zooming in on the map until you can. If your devices are active and reporting location data, you'll see a dot on the map showing the device's location. As the device moves, the dot on the map also moves.</p> </td></tr> <tr> <td data-bbox="688 391 814 448">Mobile signal strength</td><td data-bbox="821 391 1738 756"> <p>Let's you identify when devices are situated in areas with weak cellular coverage or potential dead zones. To use this feature, you must first enable Mobile signal strength with location.</p> <p>On the map, you'll see the mobile signal strength status of every device in your fleet represented by colored dots. These dots are updated at the same rate as your location data collection frequency.</p> <ul style="list-style-type: none"> • Good (green): -70 dBm or higher • Normal (blue): -71 dBm to -80 dBm • Bad (red): -81 dBm to -139 dBm • No signal (grey): -140 dBm or lower, no collection <p>These dots also appear in the map's Device list, letting you quickly correlate the device IDs with each mobile signal strength status. If you want to only show devices with a specific status—for example, only show Bad devices—you can select the status using the map's Filter options next to the Search icon.</p> </td></tr> </table> <p>See https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-dashboard/</p> <p>See also https://docs.samsungknox.com/admin/knox-manage/configure/profile/manage-profiles/collect-device-location-information/</p>	Live tracking	<p>Click to receive continuous location updates from your devices for up to 30 seconds at a time. Live tracking stops after 30 seconds, after which you'll have to click the Live tracking button once again to receive continuous updates for another 30 seconds.</p> <p>This button can only be clicked after a certain zoom level. If you can't click the button, try zooming in on the map until you can. If your devices are active and reporting location data, you'll see a dot on the map showing the device's location. As the device moves, the dot on the map also moves.</p>	Mobile signal strength	<p>Let's you identify when devices are situated in areas with weak cellular coverage or potential dead zones. To use this feature, you must first enable Mobile signal strength with location.</p> <p>On the map, you'll see the mobile signal strength status of every device in your fleet represented by colored dots. These dots are updated at the same rate as your location data collection frequency.</p> <ul style="list-style-type: none"> • Good (green): -70 dBm or higher • Normal (blue): -71 dBm to -80 dBm • Bad (red): -81 dBm to -139 dBm • No signal (grey): -140 dBm or lower, no collection <p>These dots also appear in the map's Device list, letting you quickly correlate the device IDs with each mobile signal strength status. If you want to only show devices with a specific status—for example, only show Bad devices—you can select the status using the map's Filter options next to the Search icon.</p>
Live tracking	<p>Click to receive continuous location updates from your devices for up to 30 seconds at a time. Live tracking stops after 30 seconds, after which you'll have to click the Live tracking button once again to receive continuous updates for another 30 seconds.</p> <p>This button can only be clicked after a certain zoom level. If you can't click the button, try zooming in on the map until you can. If your devices are active and reporting location data, you'll see a dot on the map showing the device's location. As the device moves, the dot on the map also moves.</p>				
Mobile signal strength	<p>Let's you identify when devices are situated in areas with weak cellular coverage or potential dead zones. To use this feature, you must first enable Mobile signal strength with location.</p> <p>On the map, you'll see the mobile signal strength status of every device in your fleet represented by colored dots. These dots are updated at the same rate as your location data collection frequency.</p> <ul style="list-style-type: none"> • Good (green): -70 dBm or higher • Normal (blue): -71 dBm to -80 dBm • Bad (red): -81 dBm to -139 dBm • No signal (grey): -140 dBm or lower, no collection <p>These dots also appear in the map's Device list, letting you quickly correlate the device IDs with each mobile signal strength status. If you want to only show devices with a specific status—for example, only show Bad devices—you can select the status using the map's Filter options next to the Search icon.</p>				



See also <https://www.macroev.com/resources/streamlining-kiosk-devices-the-power-of-samsung-knox-suite> (“Location Tracking and Remote Actions: For kiosks that are not permanently installed, Knox Asset Intelligence offers GPS-based location tracking. This helps in recovering lost or misplaced devices. Remote actions like triggering a sound or flashing the device’s light can also aid in locating a specific kiosk.”)

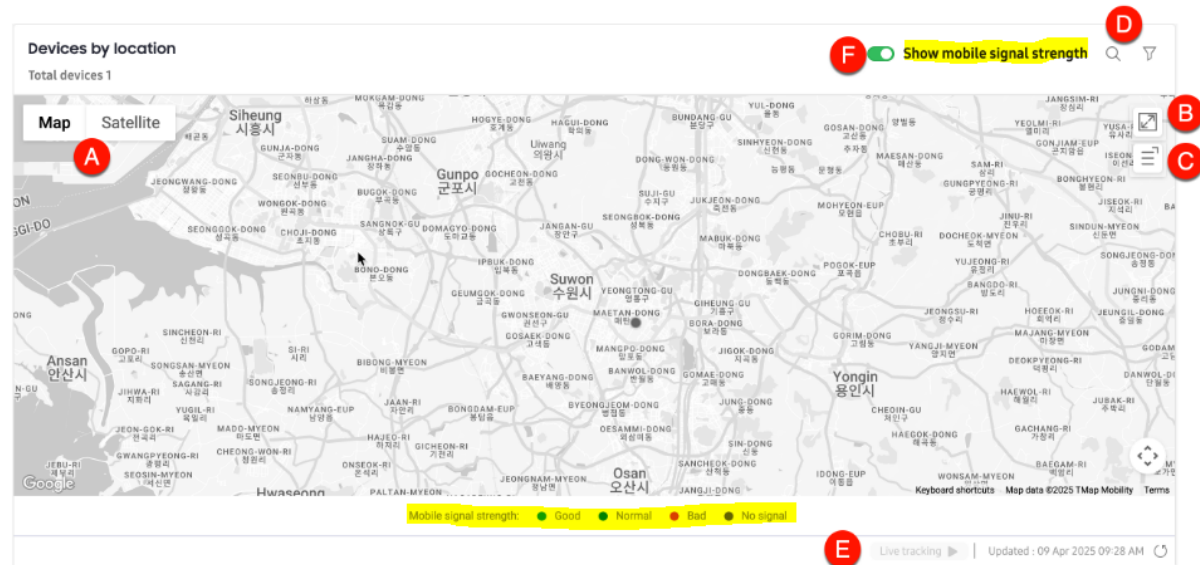
See also docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/location-overview/

	
<p>[1D] providing access to said quality or service information stored in said memory or database to one or more end users or one or more end user communication devices or one or more carriers or third parties that provide services to said one or more end users or one or more end user communication devices or one or more carriers, or to said one or more wireless</p>	<p>The Accused Knox Products provide access to said quality or service information stored in said memory or database to one or more end users or one or more end user communication devices or one or more carriers or third parties that provide services to said one or more end users or one or more end user communication devices or one or more carriers, or to said one or more wireless communications networks.</p> <p>For example, the web-based applications of the Knox Admin Portal provide IT administrator computers with access to the quality of service information stored in the one or more cloud-based databases or memories of the one or more cloud-based computers of the Knox Cloud Services. This information is associated with one or more enterprise personnel end users because it is generated by the communication devices of such end users via the Knox Agent installed on such devices. Mobile signal strength data (performance or quality of service information), for example, can be displayed on maps via the Knox the Admin Portal. <i>See</i> Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-dashboard/#:~:text=To%20use%20this%20feature%2C%20you,next%20to%20the%20Search%20icon (last accessed September 2, 2025).</p>

communications networks; and

Location map

The map displays your device groupings (represented by gray circles on the map) as soon as you open the **Location** dashboard. When you zoom in, the circles updates to show the device distribution across a given area.



Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-manage/introduction/features-and-key-strengths/#:~:text=Effortless%20content%20management,Storage%20of%20device%20analysis%20data> (last accessed September 2, 2025).

The Knox Agent, also, can be used to obtain signal strength data (performance or quality of service information for the mobile device), as such data can be viewed from the mobile device itself. *See* Samsung Knox Documentation, Knox Asset Intelligence, Knox Asset Intelligence release notes, <https://docs.samsungknox.com/admin/knox-asset-intelligence/release-notes/23-09/> (last accessed September 2, 2025).

Mobile network diagnostics in agent app

The Knox Asset Intelligence agent app now lets device users view mobile network diagnostic information like total data consumption for each SIM card in their device, and network signal strength.

Samsung Knox Documentation, Knox Asset Intelligence, Knox Asset Intelligence release notes, <https://docs.samsungknox.com/admin/knox-asset-intelligence/release-notes/23-09/> (last accessed September 2, 2025).

Additionally, applications such as the Knox Agent can be downloaded and executed by mobile devices to provide performance or quality of service information to the cloud-based computers and databases of the Knox Cloud Services via the electronic interface described in reference to claim element [20B]. Samsung Knox Documentation, Home, Knox Asset Intelligence, How-to guides, Use the agent app, <https://docs.samsungknox.com/admin/knox-asset-intelligence/how-to-guides/use-the-agent-app/> (last accessed September 2, 2025). For example, mobile signal strength data and/or Wi-Fi network signal strength (performance or quality of service information) can be captured by the mobile device and uploaded to the cloud-based computers and databases of the Knox Cloud Services in real time or, for example, every 10 seconds. *See id.*

Use the agent app

Last updated September 25th, 2024

The Knox Asset Intelligence agent is responsible for enrolling devices into the service, collecting device health and usage information, and sending this information back to the server to be converted into meaningful dashboard insights. Once the agent app is downloaded and installed, device users simply launch the app to let the agent begin collecting data.

Samsung Knox Documentation, Home, Knox Asset Intelligence, How-to guides, Use the agent app, <https://docs.samsungknox.com/admin/knox-asset-intelligence/how-to-guides/use-the-agent-app/> (last accessed September 2, 2025).

Network

The **Network** screen displays the mobile network signal strength of the device, along with information about the carrier network and mobile data usage.

On the chart, users can view their device's mobile network signal strength over the last 10 seconds, updated in real time. Users can tap the **Mobile data usage** field to view additional usage details, or tap **Error report** to send a debug log to their IT admins to help troubleshoot mobile network related issues.

Samsung Knox Documentation, Home, Knox Asset Intelligence, How-to guides, Use the agent app, <https://docs.samsungknox.com/admin/knox-asset-intelligence/how-to-guides/use-the-agent-app/> (last accessed September 2, 2025)

Wi-Fi

Status

The **Wi-Fi** screen shows the **Status** tab default. Here, device users can view the signal strength of a Wi-Fi connection, along with information about the Wi-Fi network's IP address, SSID, and MAC information. On the chart, users can view their device's Wi-Fi network signal strength over the last ten seconds, updated in real time.

If Wi-Fi roaming is detected, additional roaming information is displayed. The signal strength is shown in real-time as a graph, with three statuses indicating the network latency. The status ranges are as follows:

Status	Strength
Excellent	-67 dBm or higher
Very good	-68 dBm to -70 dBm
Okay	-71 dBm to -80 dBm
Not good	-81 dBm to -90 dBm
Unusable	-91 dBm or lower

Samsung Knox Documentation, Home, Knox Asset Intelligence, How-to guides, Use the agent app, <https://docs.samsungknox.com/admin/knox-asset-intelligence/how-to-guides/use-the-agent-app/> (last accessed September 2, 2025)

Data upload

The **Data upload** section lets you specify what type of data gets collected, and — for some insights — how often data gets collected. The following table describes the data upload options available. Select a data upload option checkbox in each category to let Knox Asset Intelligence collect that specific type of data from your devices. To disable data collection for an entire category altogether, toggle the category option off.

Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Settings, Data conditions tab, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/settings/data-conditions/> (last accessed September 2, 2025)

The Accused Knox Products also allow the IT admin to obtain network performance data through the EMM console (e.g., applications).

The EMM console can access the following network performance data from the managed devices:

Network

This section displays Wi-Fi consumption data related to your device. Information displayed is based on the last time the device connected to a Wi-Fi connection. The following information is available:

- **Network name (SSID):** Service Set Identifier, the unique name assigned to the network.
- **AP Vendor:** Name of the Wi-Fi access point manufacturer.
- **AP BSSID:** Access Point Basic Service Set Identifier, the unique MAC (Media Access Control) address that identifies the access point.
- **Wi-Fi strength (RSSI):** Received Signal Strength Indicator, the measure of the Wi-Fi signal's power level typically ranging from -30 dBm (very strong signal) to -90 dBm (very weak signal).
- **Bands:** Frequency range used by the Wi-Fi network to transmit data.
- **Link speed:** Maximum data transfer speed between the AP and the client (this device), measured in megabits per second (Mbps).
- **Last connected time:** Date and time the device last connected to a Wi-Fi network.
- **Wi-Fi calling:** Indicator of whether the device is configured for Wi-Fi calling, or if Wi-Fi calling is unsupported by the device.

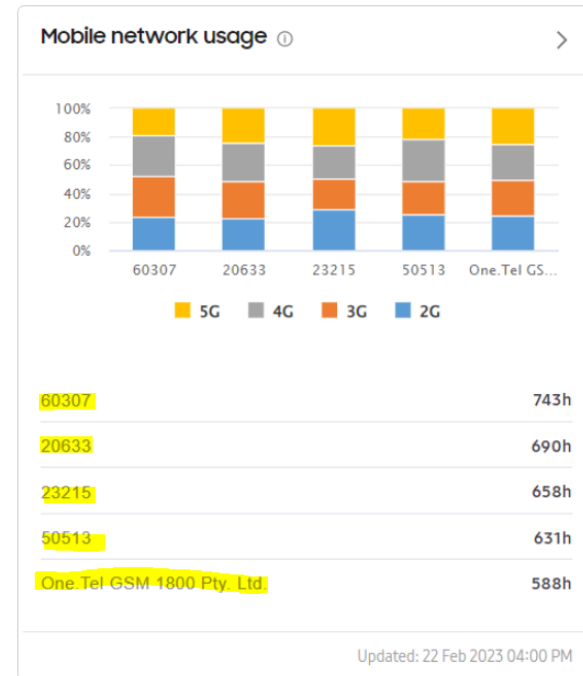
See <https://docs.samsungknox.com/admin/knox-asset-intelligence/how-to-guides/manage-devices/>

The Accused Knox Products also provide information associated with one or more carriers or one or more wireless communications networks. For example, the Accused Knox Products are capable of provide performance information, such as mobile network usage, on a “per carrier” basis. This helps monitor and measure how device users are using mobile data by collecting data about mobile data usage by network generations and carrier. For example, device users might primarily be using 4G networks, meaning a 5G data plan could be unnecessary. *See* Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Network insights, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/network-insights/mobile-network-usage/> (last accessed September 2, 2025). According to Samsung, “Knox Asset Intelligence collects the MCC/MNC code and matches it to a carrier name.” *See id.*

Network	Wi-Fi disconnection events: Groups	Get in-depth visibility into device groups with the highest amount of disconnection problems, including detailed event logs.
	Wi-Fi disconnection events: BSSIDs and APs	Get in-depth visibility into Wi-Fi networks with the highest amount of disconnection problems, including detailed event logs.
	Mobile network usage	Get in-depth visibility into cellular usability information, including which network generations are used per carrier.
	Network latency	Lets you see which IP addresses or domains have the longest response time or don't respond at all to device requests.

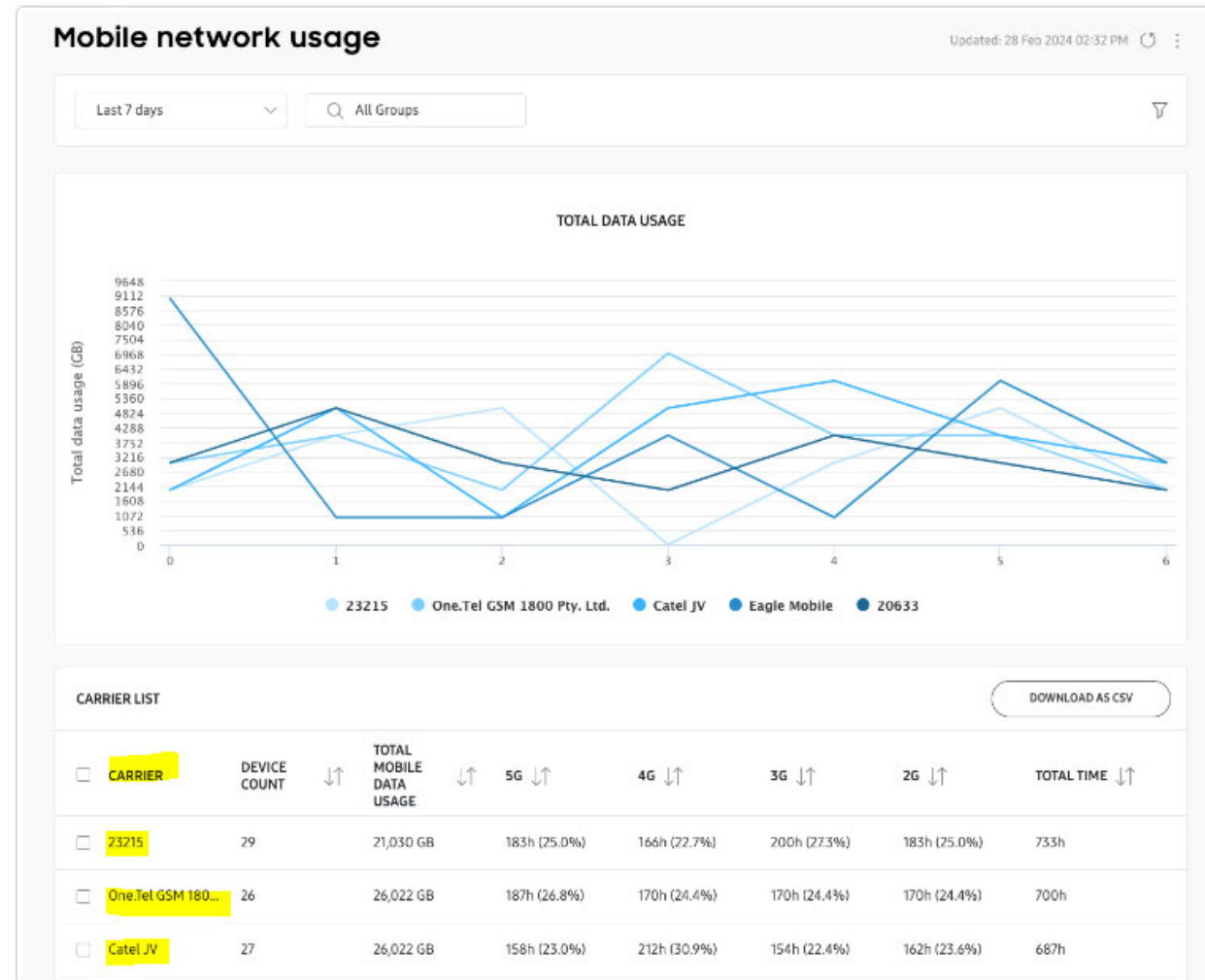
Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Overview, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/overview/> (last accessed September 2, 2025)

The **Mobile network usage** dashboard chart displays **cellular signal information arranged by carrier network**, providing insight into which network generations — 2G, 3G, 4G, and 5G — are used per carrier.



The **five carriers with the longest cumulative connection durations are shown**, along with the percentage of **total carrier usage time** associated with each network generation. The information also includes the **type of cellular network**, the **connection duration** for each network generation, and the **cellular usage by carrier**.

Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Network insights,
<https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/network-insights/mobile-network-usage/> (last accessed September 2, 2025).



The **Mobile network usage** expanded view page features a chart that lists the top 5 mobile carriers with the highest network usage (in GB) over the selected reporting period. Click any carrier name in the legend to show or hide the data on the chart.

In the **CARRIER LIST** table below, you'll see usage data for every carrier that your devices connected to during the selected reporting period. For each carrier, you can view how many devices connected, view the total usage (in GB), and view the total connection time (in hours) for that carrier (with connection time data broken down by network generation (5G, 4G, and so on)).

Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Network insights, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/network-insights/mobile-network-usage/> (last accessed September 2, 2025).

The document excerpt below further describes management features of the Knox Suite that allows the IT admin to obtain network statistics through the EMM console. See

https://images.samsung.com/is/content/samsung/p5/ch/business/enterprise-edition/Knox_Platform_for_Enterprise_Whitepaper_2019.pdf (“Knox Whitepaper”)

Advanced App Management

Enterprises need a strong Mobile Application Management (MAM) strategy to deploy apps effectively, manage app licenses, secure apps, optimize app usage, and handle app data safely. The Knox platform provides comprehensive app management capabilities that allow IT admins to control all aspects of apps installed on a device. These capabilities can also be extended inside the work profile to provide a safe haven for sensitive apps and data.

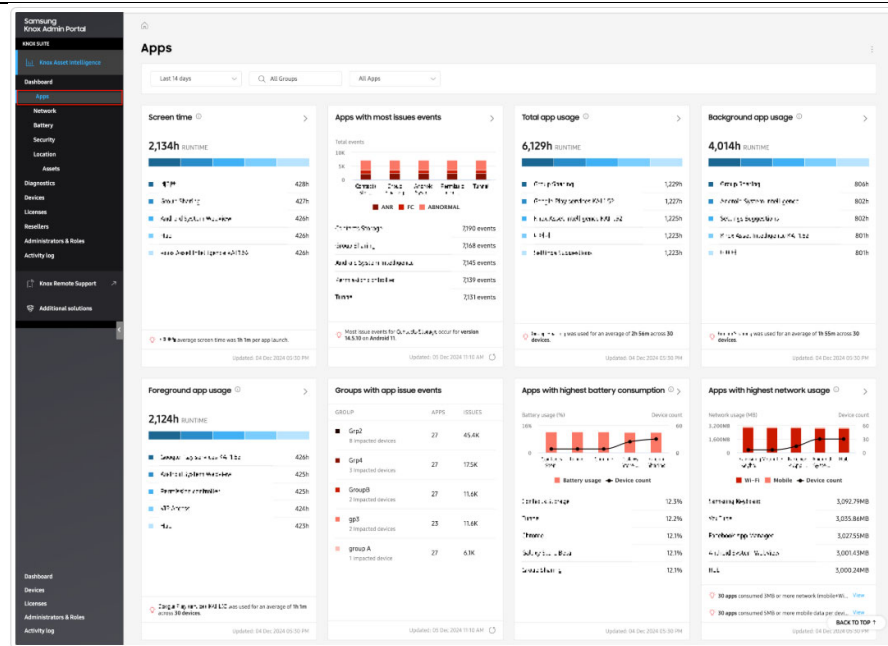
Enterprises use EMM solutions to centrally configure and remotely manage apps. Knox provides a full complement of management functions, providing IT admins with the ability to:

- Install, uninstall, update, enable, disable, start, stop, or wipe data for an app
- Allow or block the following:
 - apps that can be installed
 - apps that can auto-update
 - apps that can use the Clipboard
 - apps that can be started and stopped by users
 - apps that can access the USB port
 - app accounts, permissions, and notifications
- Disable or enable other apps like Google Play, Google Chrome, Voice Dialer, and YouTube
- Get info like the app code size, cache size, data size, total size, notification mode, and restrictions
- Get statistics like app launch count, component state, app focus state, CPU usage, data size, memory usage, and network stats

Knox Whitepaper, p. 59 (annotated).

In another example, the managed mobile device can be configured, through the EMM application, to report device location information to the EMM console.

	<div data-bbox="678 191 1751 503"><p>2.7. Device Policy Creation</p><p>Device policies are deployed when a device is enrolled in Knox Manage or can be pushed automatically to devices. Knox Manage implements a hierarchy policy set that allows policies to be deployed to all users, while other policies can then be deployed to a subset of users based on your business need. Some of the policies that can be configured include allowing users to use the camera, configure the device to report the devices location within the EMM console, and allowing users to wipe devices.</p></div> <p>Knox Service Guide v3.05, p. 7 (annotated).</p> <p>The Accused Knox Products allow the IT admin to view, use, and sort network performance data of managed mobile devices in the EMM console and the EMM client on the managed mobile devices.</p>
--	--



See <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/app-insights/app-usage/overview/>

[1E] wherein said wireless access characteristics comprise one or more of identified, perceived or measured: radio reception quality, network performance,

The Accused Knox Products receive, analyze, and display wireless access characteristics for one or more mobile devices, wherein said wireless access characteristics comprise one or more of identified, perceived or measured: radio reception quality, network performance, quality of service, data rate, spectrum availability or suitability, capacity or bandwidth, availability or quality of coverage, availability or quality of capacity, availability or quality of one or more services or carriers, availability or quality of air interfaces, average use profile, average availability profile, statistics on outage or reliability or coverage or capacity carrying capabilities for one or more service providers, frequencies, radio frequency or quality of service or coverage or service map or addresses for one or more service providers, radio frequency or end-user application performance, and cost of service.

<p>quality of service, data rate, spectrum availability or suitability, capacity or bandwidth, availability or quality of coverage, availability or quality of capacity, availability or quality of one or more services or carriers, availability or quality of air interfaces, average use profile, average availability profile, statistics on outage or reliability or coverage or capacity carrying capabilities for one or more service providers, frequencies, radio frequency or quality of service or coverage or service</p>	<p>For example, the Accused Knox Products can assess radio reception quality and, upon detecting a weak signal, will cause mobile devices to trigger a roaming scan to avoid frequent retransmissions from lost packets. When the current AP's Received Signal Strength Indicator (RSSI) value is weak (below -75dBm), the device searches for an AP with a stronger signal. <i>See</i> Samsung Knox Documentation, Knox Platform for Enterprise, Knox Platform for Enterprise knowledge base articles, Enhanced roaming algorithm, https://docs.samsungknox.com/admin/knox-platform-for-enterprise/kbas/kba-115013403768/ (last accessed September 11, 2025).</p> <p>There are 3 factors that trigger roaming on a Samsung mobile device:</p> <ol style="list-style-type: none"> 1. Weak signal — Mobile devices trigger a roaming scan to avoid frequent retransmissions from lost packets. When the current AP's Received Signal Strength Indicator (RSSI) value is weak (below -75dBm), the device searches for an AP with a stronger signal. 2. Beacon loss — When beacon packets from a connected AP isn't received after 2 seconds (6 second if the display is OFF), the mobile device considers it a lost beacon and triggers a roaming scan. 3. Channel Utilization (CU) — When multiple clients are connected to the same AP, connectivity may be hindered despite having a strong radio signal due to limited resources. In which case, the AP will notify the clients of its current traffic through the CU factor in its beacon. The mobile device will then trigger a roaming scan if the received CU value is greater than 70 percent and the current RSSI value is between -65dBm and -75dBm. <p>Samsung Knox Documentation, Knox Platform for Enterprise, Knox Platform for Enterprise knowledge base articles, Enhanced roaming algorithm, https://docs.samsungknox.com/admin/knox-platform-for-enterprise/kbas/kba-115013403768/ (last accessed September 11, 2025).</p> <p>The Accused Knox Products also “gather valuable about network performance” and track connectivity issues. Samsung Knox Documentation, Knox Asset Intelligence, Tutorial, Monitor network events, https://docs.samsungknox.com/dev/knox-asset-intelligence/tutorials/monitor-network-events/ (last accessed September 11, 2025).</p>
--	---

map or addresses for one or more service providers,

radio frequency or end-user application performance, and cost of service.

Monitor network events

Last updated May 24th, 2024

The Knox Asset Intelligence APIs enable you to monitor network behavior of devices, allowing you to gather valuable data about network performance and track connectivity issues. This tutorial shows you how to retrieve the details of Wi-Fi connection and disconnection events.

Additionally, connection or disconnection of Wi-Fi leads to an event upload by Knox Asset Intelligence. You can subscribe to corresponding Knox Webhook Notification events to receive notifications for Wi-Fi related activities.

Samsung Knox Documentation, Knox Asset Intelligence, Tutorial, Monitor network events, <https://docs.samsungknox.com/dev/knox-asset-intelligence/tutorials/monitor-network-events/> (last accessed September 11, 2025).

The Accused Knox Products also assess quality of service information, such as “signal strength” data, which enables the identification of “devices situated in areas with weak cellular coverage or potential dead zones.” Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-dashboard/#:~:text=To%20use%20this%20feature%2C%20you,next%20to%20the%20Search%20icon> (last accessed September 2, 2025).

F

Mobile signal strength

Let's you identify when devices are situated in areas with weak cellular coverage or potential dead zones. To use this feature, you must first enable Mobile signal strength with location.

On the map, you'll see the mobile signal strength status of every device in your fleet represented by colored dots. These dots are updated at the same rate as your location data collection frequency.

- **Good (green):** -70 dBm or higher
- **Normal (blue):** -71 dBm to -80 dBm
- **Bad (red):** -81 dBm to -139 dBm
- **No signal (grey):** -140 dBm or lower, no collection

These dots also appear in the map's **Device list**, letting you quickly correlate the device IDs with each mobile signal strength status. If you want to only show devices with a specific status—for example, only show **Bad** devices—you can select the status using the map's **Filter** options next to the Search icon.

Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-dashboard/#:~:text=To%20use%20this%20feature%2C%20you,next%20to%20the%20Search%20icon> (last accessed September 2, 2025).

The Accused Knox Products also assess data rates and quality of capacity in the form of network latencies, which lets IT administrators “see which IP addresses or domains have the longest response time or don’t respond at all to device requests.” Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Network Insights, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/network-insights/network-latency/> (last accessed September 2, 2025).

Network latency

Last updated December 6th, 2023

The **Network latency response times** insight lets you see which IP addresses or domains have the **longest response time** or don’t respond at all to device requests. This data can help you **troubleshoot possible issues related to the application server, for various device groups across the organization.**

Main tile view

Network latency response times

IP/DNS	Test type	Response time
128.0.0.1	TCP	1008
https://www.sam...	TCP	1001
www.knoxtest.com	TCP	990
128.0.0.1	DNS	75
www.knoxtest.com	DNS	74

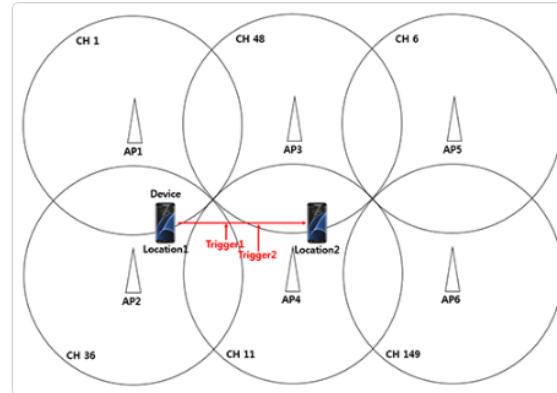
Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Network Insights, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/network-insights/network-latency/> (last accessed September 2, 2025).

The Accused Knox Products also assess spectrum availability and suitability as well as the availability or quality of air interfaces. For example, when a mobile device moves from Location1 to Location2, roaming will be triggered at point, Trigger1 due to a weak RSSI value. *See id.* While the mobile device tries to find a roaming candidate in CH 1 and CH 36 via a partial scan, it is not able to find any other access point from the list other than AP2. Only after a full-scan will the mobile device discover AP3 and AP4 where it will add CH 11 and CH 46 to its roaming channel list after it connects to AP4. *See id.* Having neighbor reports avoids full-scans from such instance from happening. *See* Samsung Knox Documentation, Knox Platform for Enterprise, Knox Platform for Enterprise knowledge base articles, <https://docs.samsungknox.com/admin/knox-platform-for-enterprise/kbas/kba-115013403768/> (last accessed September 2, 2025). Initially, mobile device will save CH 1 and CH 36 in the channel list as it connects to AP2, which is equal to previous case. *See id.* Then, in addition, it will also send a neighbor report request to AP2. AP2 will return a list of nearby AP's, which is AP1, AP2 and AP4. From this response, mobile devices will add CH 11 in its roaming channel list. *See id.*

1. Neighbor Report

As explained in partial scanning section, the mobile device maintains a roaming channel list to reduce scan time. But, there are cases where the device may trigger a full-scan in order to find a roaming AP. In the following diagram, the mobile device initially finds AP1 and AP2 and saves CH 1 and CH 36 in the roaming channel list after connecting to AP2.

When the mobile device moves from Location1 to Location2, roaming will be triggered at point, Trigger1 due to a weak RSSI value. While the mobile device tries to find a roaming candidate in CH 1 and CH 36 via a partial scan, it is not able to find any other AP from the list other than AP2. Only after a full-scan will the mobile device discover AP3 and AP4 where it will add CH 11 and CH 46 to its roaming channel list after it connects to AP4.



Having neighbor reports avoids full-scans from such instance from happening. Initially, mobile device will save CH 1 and CH 36 in the channel list as it connects to AP2, which is equal to previous case. Then, in addition, it will also send a neighbor report request to AP2. AP2 will return a list of nearby AP's, which is AP1, AP2 and AP4. From this response, mobile devices will add CH 11 in its roaming channel list.

As the mobile device moves away from Location1 to Location2, the device will run a partial roaming scan at Trigger1 for CH 1, CH 11 and CH 36. This time, the device finds AP4 from its partial scan and successfully connects to AP4. After roaming success, mobile device will repeat the steps by sending a neighbor request to AP4.

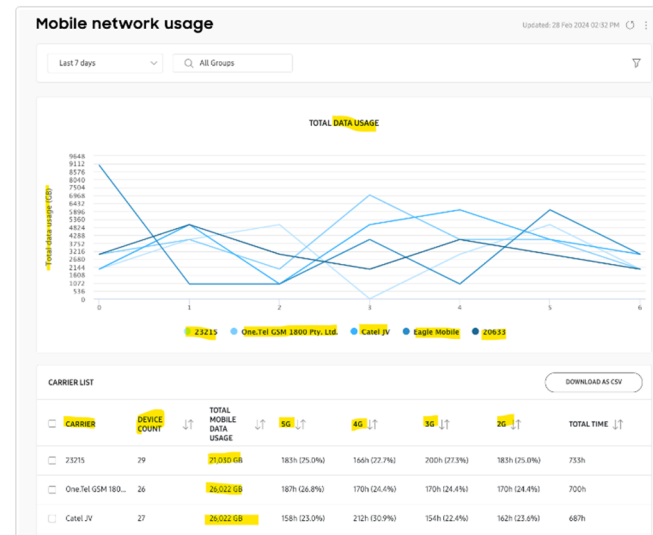
Samsung Knox Documentation, Knox Platform for Enterprise, Knox Platform for Enterprise knowledge base articles, <https://docs.samsungknox.com/admin/knox-platform-for-enterprise/kbas/kba-115013403768/> (last accessed September 2, 2025).

The Accused Knox Products also assess network capacity and bandwidth as well as the availability or quality of one or more services or carriers. For example, the Accused Knox Products monitor the percentage of total carrier usage time associated with each network generation and the cellular usage by carrier. Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Network Insights,

<https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/network-insights/mobile-network-usage/> (last accessed September 2, 2025).

The five carriers with the longest cumulative connection durations are shown, along with the percentage of total carrier usage time associated with each network generation. The information also includes the type of cellular network, the connection duration for each network generation, and the cellular usage by carrier.

Expanded view



The **Mobile network usage** expanded view page features a chart that lists the top 5 mobile carriers with the highest network usage (in GB) over the selected reporting period. Click any carrier name in the legend to show or hide the data on the chart.

In the **CARRIER LIST** table below, you'll see usage data for every carrier that your devices connected to during the selected reporting period. For each carrier, you can view how many devices connected, view the total usage (in GB), and view the total connection time (in hours) for that carrier (with connection time data broken down by network generation (5G, 4G, and so on).

Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Network Insights, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/network-insights/mobile-network-usage/> (last accessed September 2, 2025).

The Accused Knox Products also assess network availability or quality of coverage. For example, the Knox Accused Products monitor signal strength by displaying a real-time graph of a device's mobile or Wi-Fi signal strength within the agent app and on the Location dashboard. Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-dashboard/> (last accessed September 2, 2025). Users can see this data as a graphical representation over the last 10 seconds, helping them identify areas of weak cellular coverage, potential dead zones, or issues with

Wi-Fi connections. *See id.* Signal strength is also displayed as a percentage of good, very good, okay, not good, or unusable based on dBm values in the agent app's Network screen. *See id.* The Accused Knox Products, for example, include "mobile signal strength" data (a type of performance or quality of service information for one or more specific locations), which enables the identification of "devices situated in areas with weak cellular coverage or potential dead zones." *See id.*

F **Mobile signal strength** Let's you identify when **devices are situated in areas with weak cellular coverage or potential dead zones.** To use this feature, you must first enable **Mobile signal strength with location.**

On the map, you'll see the mobile signal strength status of every device in your fleet represented by colored dots. These dots are updated at the same rate as your location data collection frequency.

- **Good (green):** -70 dBm or higher
- **Normal (blue):** -71 dBm to -80 dBm
- **Bad (red):** -81 dBm to -139 dBm
- **No signal (grey):** -140 dBm or lower, no collection

These dots also appear in the map's **Device list**, letting you quickly correlate the device IDs with each mobile signal strength status. If you want to only show devices with a specific status—for example, only show **Bad** devices—you can select the status using the map's **Filter** options next to the Search icon.

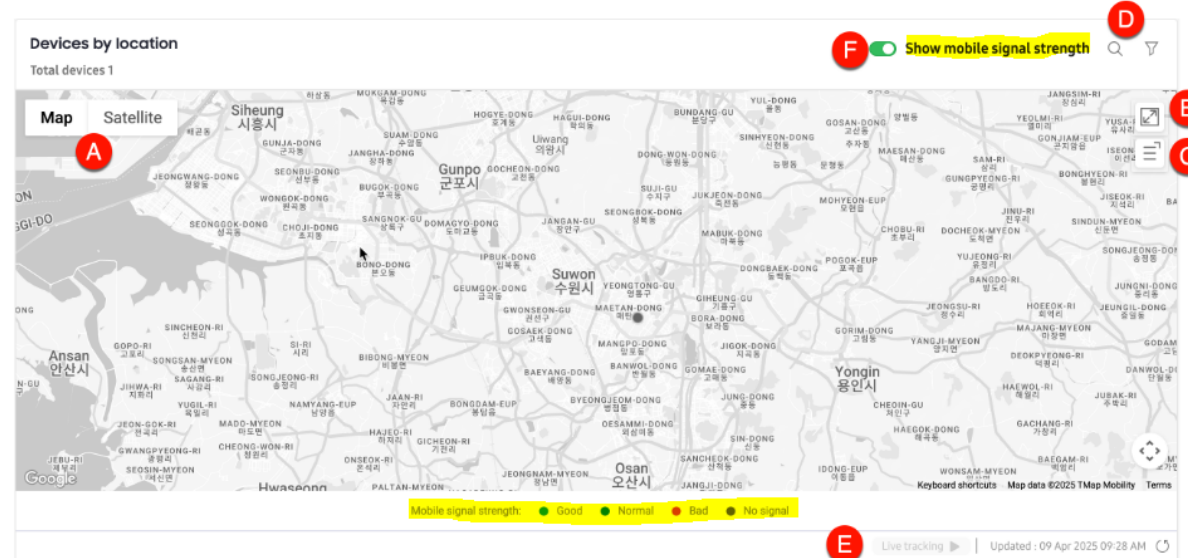
Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-dashboard/#:~:text=To%20use%20this%20feature%2C%20you,next%20to%20the%20Search%20icon> (last accessed September 2, 2025).

The Accused Knox Products further provide admin interfaces, via dashboards (e.g., location dashboards) that include maps of device distributions across a given area. Mobile signal strength data can be displayed via such maps, which enables customers to quickly correlate device IDs with each mobile signal strength statuses. This further illustrates how the Accused Knox Products utilize performance or quality of service information associated with specific locations. *See* Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location->

[dashboard/#:~:text=To%20use%20this%20feature%2C%20you,next%20to%20the%20Search%20icon](#) (last accessed September 2, 2025).

Location map

The map displays your device groupings (represented by gray circles on the map) as soon as you open the **Location** dashboard. When you zoom in, the circles updates to show the device distribution across a given area.



Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-manage/introduction/features-and-key-strengths/#:~:text=Effortless%20content%20management,Storage%20of%20device%20analysis%20data> (last accessed September 2, 2025).

The Accused Knox Products utilize the average use profile and average availability profile for enterprise mobile devices. Such profiles include “a set of policies containing device configurations and settings” that govern how IT administrators “configured [and] control device functions and data.” Samsung Knox Documentation, Home, Knox Manage, Configure / Profile, <https://docs.samsungknox.com/admin/knox-manage/configure/profile/profile/> (last accessed September 11, 2025). These policies can be implemented

based on average statistics for a particular user or group of users, including average network use and/or availability. *See id.*

Knox Manage profiles

The **KNOX MANAGE** tab of the **Profiles** page displays a complete list of Knox Manage (original console) profiles, including profiles created in customers' consoles and profile copies created in the Knox MSP Portal.

The profiles table provides information on:

- **PROFILE NAME** — The name of the profile. Click the name to open the **Profile** page in the customer's Knox Manage console that contains this specific profile.
- **CUSTOMER** — The name of the customer's company.
- **PLATFORM** — The device platform (OS) that the profile was designed for.
- **ORIGIN PROFILE** — If the profile is a copy, this field indicates the original profile it was copied from. Click the name to open the **Profile** page in the customer's Knox Manage console that contains this specific profile.
- **UPDATED** — The date the profile was last modified, including any changes made by the customer on the customer's own console.

You can also generate a CSV file report of all profile information by clicking **DOWNLOAD PROFILE(S) AS CSV**.

Samsung Knox Documentation, Home, Knox MSP Program, How-to-guides / Manage profiles, <https://docs.samsungknox.com/partner/knox-managed-service-provider/how-to-guides/manage-profiles/#knox-manage-profiles> (last accessed September 11, 2025).

Profile

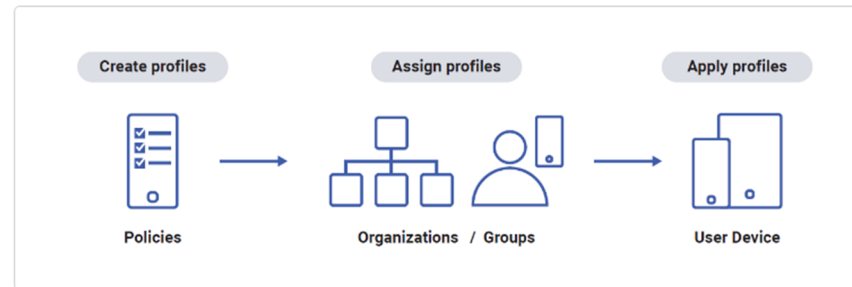
Last updated August 5th, 2025

Caution

Knox Manage supports a multi-profile structure only for Android Enterprise, AMAPI, iOS, Windows, and macOS. If you assign multiple profiles to Wear OS, or Knox Service Plugin, only the highest-priority profile gets applied.

A profile is a set of policies containing device configurations and settings. Profiles allow you to configure policies to control device functions and data — such as the camera, screen lock, Bluetooth, or firewall — quickly and efficiently.

With profiles, you can also install the Wi-Fi, VPN, and Exchange settings for your enterprise on user devices. Furthermore, profiles can be configured to run in specific situations, such as at a specific time, or when the device is running a specific application.



To add policies to a profile, see [Configure profile policies by device platform](#). To link and deploy these policies, see [Assign profiles to groups and organizations](#).

A device can only receive and apply one unique configuration for any given policy at a time. If multiple profiles with conflicting policies are assigned to the same group or organization, the policy from the group or organization with the highest priority gets applied. For instance, if a profile assigned to a group enables camera access, but a different profile assigned to the same group disables it, then the higher-priority profile's camera policy will be applied for the whole group.

Disparate policies from multiple profiles apply if they don't conflict with one other. To configure profile priority, see [Set up the profile priorities](#).

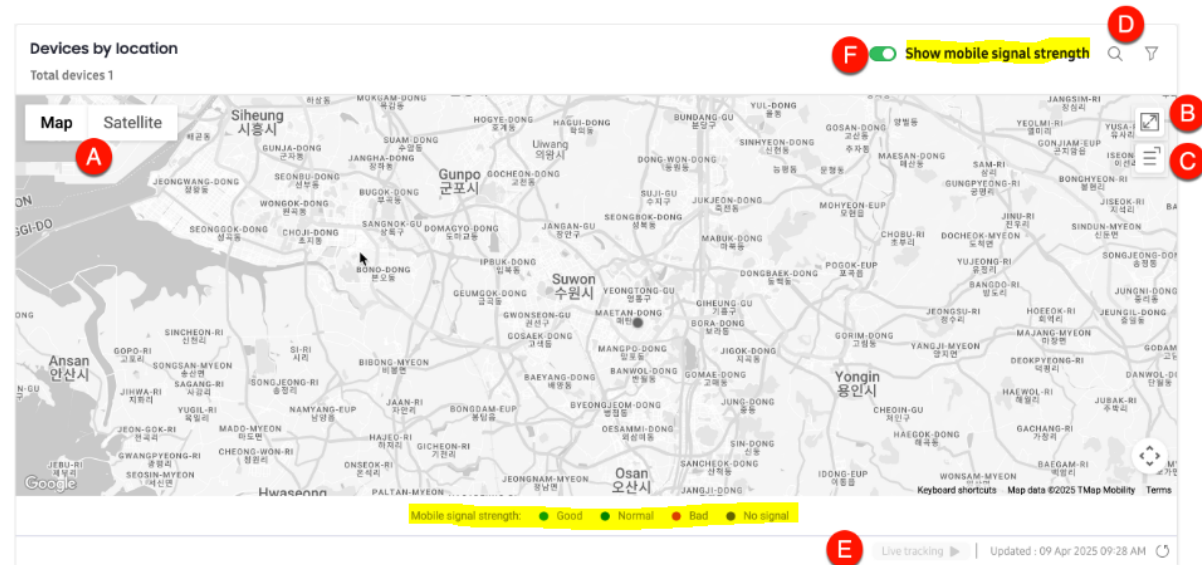
Samsung Knox Documentation, Home, Knox Manage, Configure / Profile,
<https://docs.samsungknox.com/admin/knox-manage/configure/profile/profile/> (last accessed September 11, 2025).

The Accused Knox Products also assess statistics on outage or reliability or coverage or capacity carrying capabilities for one or more service providers, including mobile signal strength data can be displayed via such maps, which enables customers to quickly correlate device IDs with each mobile signal strength statuses. This further illustrates how the Accused Knox Products utilize performance or quality of service information

	<p>associated with specific locations. <i>See</i> Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-dashboard/#:~:text=To%20use%20this%20feature%2C%20you,next%20to%20the%20Search%20icon (last accessed September 2, 2025). Regarding service provider capacity, the Accused Knox Products also perform “carrier testing” to ensure the service provider “function[s] to the highest capacity on their networks.” Samsung Knox Mobile Security White Paper, Revision 1.0, https://docs.samsungknox.com/admin/fundamentals/whitepaper/samsung-knox-mobile-security/assets/Knox-security-white-paper-r1.pdf (last accessed September 2, 2025). As illustrated below, the Accused Knox Products generate and display maps that include quality of service or coverage or service information for one or more service providers.</p>
--	---

Location map

The map displays your device groupings (represented by gray circles on the map) as soon as you open the **Location** dashboard. When you zoom in, the circles updates to show the device distribution across a given area.

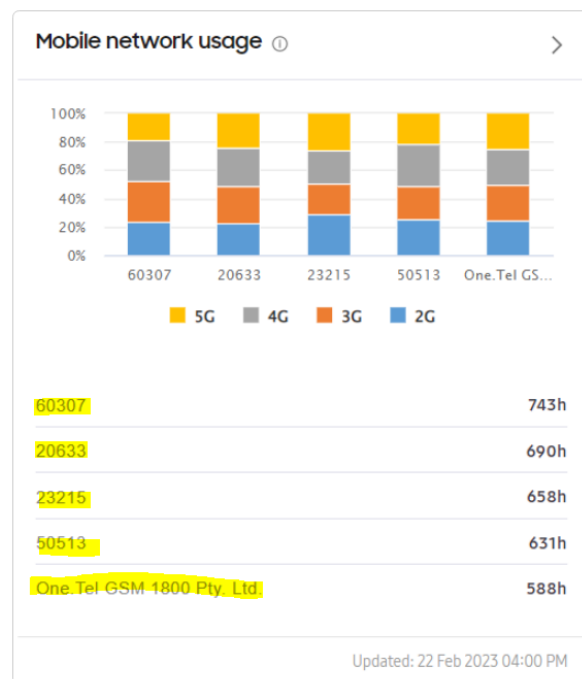


Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-manage/introduction/features-and-key-strengths/#:~:text=Effortless%20content%20management,Storage%20of%20device%20analysis%20data> (last accessed September 2, 2025).

4. **Carrier testing** — Device binaries are sent to mobile carriers to ensure they function to the highest capacity on their networks. If issues are identified, the device binary is fixed and retested.

	<p>Samsung Knox Mobile Security White Paper, Revision 1.0, https://docs.samsungknox.com/admin/fundamentals/whitepaper/samsung-knox-mobile-security/assets/Knox-security-white-paper-r1.pdf (last accessed September 2, 2025).</p> <p>The Accused Knox Products also assess different network frequencies, as well as radio frequency or end-user application performance. For example, the Accused Knox Products generate and display performance information for different networks (e.g., 2G, 3G, 4G, 5G), each of which uses a different frequency range. <i>See</i> Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Network insights, https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/network-insights/mobile-network-usage/ (last accessed September 2, 2025).</p>
--	--

The **Mobile network usage** dashboard chart displays **cellular signal information arranged by carrier network**, providing insight into which network generations — 2G, 3G, 4G, and 5G — are used per carrier.



The **five carriers with the longest cumulative connection durations are shown**, along with the percentage of **total carrier usage time** associated with each network generation. The information also includes the **type of cellular network**, the **connection duration** for each network generation, and the **cellular usage by carrier**.

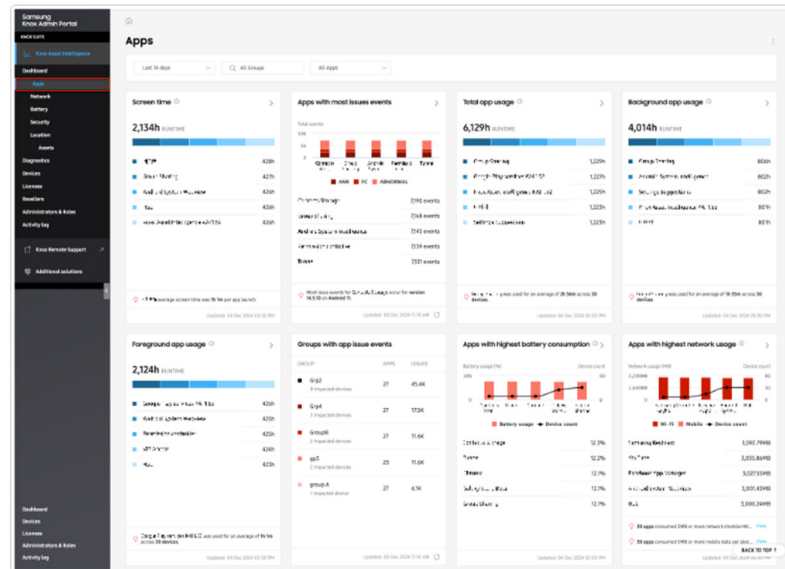
Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Network insights, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/network-insights/mobile-network-usage/> (last accessed September 2, 2025).

The Accused Knox Products also generate and display end-user application performance to help IT administrators “analyze how apps are used” by each mobile device of an enterprise personnel end user.

Home, Knox Asset Intelligence, Dashboard, App insights, App usage, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/app-insights/app-usage/overview> (last accessed September 2, 2025). The Knox Asset Intelligence, for example, provides several insights related to which apps are in use, how long they're in use, and the resources consumed by each app. *See id.*

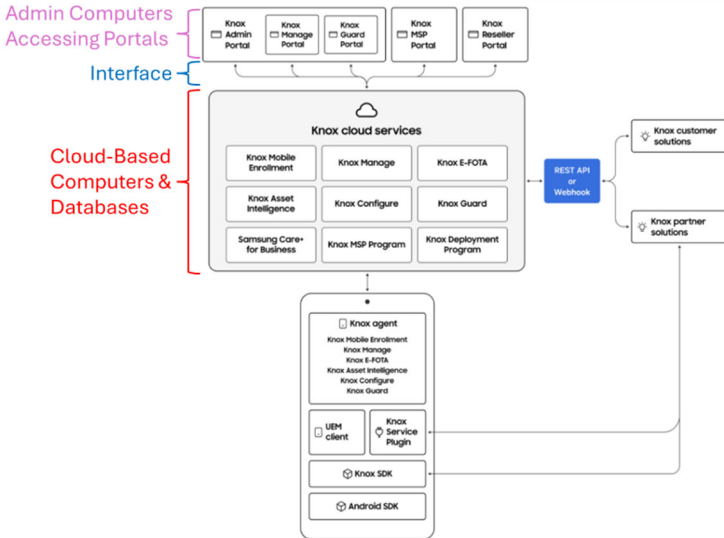
View app usage insights

There are two ways to view app usage related insights: on the main Dashboard, or on the dedicated Apps sub-dashboard.



Home, Knox Asset Intelligence, Dashboard, App insights, App usage, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/app-insights/app-usage/overview> (last accessed September 2, 2025).

See also claim elements [1A], [1C], and [1D] above.

Claim 3	Accused Knox Products
<p>[3] The method of claim 1 wherein said quality or service information is location specific.</p>	<p>The Accused Knox Products use quality of service information is location specific.</p> <p>For example, the Accused Knox Products include and/or utilize IT administrator's computers that access the Knox Admin Portal, which includes one or more web-based portals that interface with one or more cloud-based computers and databases of the Knox Cloud Services. According to Samsung, "[w]ith Knox Cloud Services, enterprise IT administrators can access a range of device management, monitoring, security, and customization solutions for their fleet of devices." Samsung Knox Documentation, Fundamentals, Introduction, the Big Picture, https://docs.samsungknox.com/dev/fundamentals/ (last accessed September 2, 2025).</p>  <p>The diagram illustrates the Knox Cloud Services architecture. At the top, 'Admin Computers Accessing Portals' (pink bracket) includes five portals: Knox Admin Portal, Knox Manage Portal, Knox Guard Portal, Knox MSP Portal, and Knox Reseller Portal. These portals interface with 'Knox cloud services' (blue bracket). The cloud services include Knox Mobile Enrollment, Knox Manage, Knox E-FOTA, Knox Asset Intelligence, Knox Configure, Knox Guard, Samsung Care+ for Business, Knox MSP Program, and Knox Deployment Program. These services are accessed via a 'REST API or Webhook' (blue box) which connects to 'Knox customer solutions' and 'Knox partner solutions'. Below the cloud services, a mobile device interface shows a 'Knox agent' (containing Knox Mobile Enrollment, Knox Manage, Knox E-FOTA, Knox Asset Intelligence, Knox Configure, and Knox Guard), a 'UEM client', a 'Knox Service Plugin', 'Knox SDK', and 'Android SDK'. Arrows indicate the flow of data and control between these components.</p> <p>Samsung Knox Documentation, Fundamentals, Introduction, the Big Picture, https://docs.samsungknox.com/dev/fundamentals/ (last accessed September 2, 2025) (annotated).</p> <p>The Accused Knox Products provide “[s]torage of device analysis data,” to facilitate “[r]eal-time monitoring of devices,” “[s]upport for audits that verify system events, applied policies, tampering and compliance violations,” and “[s]upport for appropriate actions after audit.” Samsung Knox Documentation, Knox</p>

Manage, Introduction, Features and key strengths, <https://docs.samsungknox.com/admin/knox-manage/introduction/features-and-key-strengths/#:~:text=Effortless%20content%20management,Storage%20of%20device%20analysis%20data> (last accessed September 2, 2025).

Storage of device analysis data

In addition to real-time monitoring of devices, Knox Manage also provides audits. You can verify the events that occur in the system, the policies that were applied, any tampering and compliance violations, and so on, and take appropriate actions against them.

- **Real-time monitoring of devices**
- Support for audits that verify system events, applied policies, tampering and compliance violations and so on.
- Support for appropriate actions after audit.

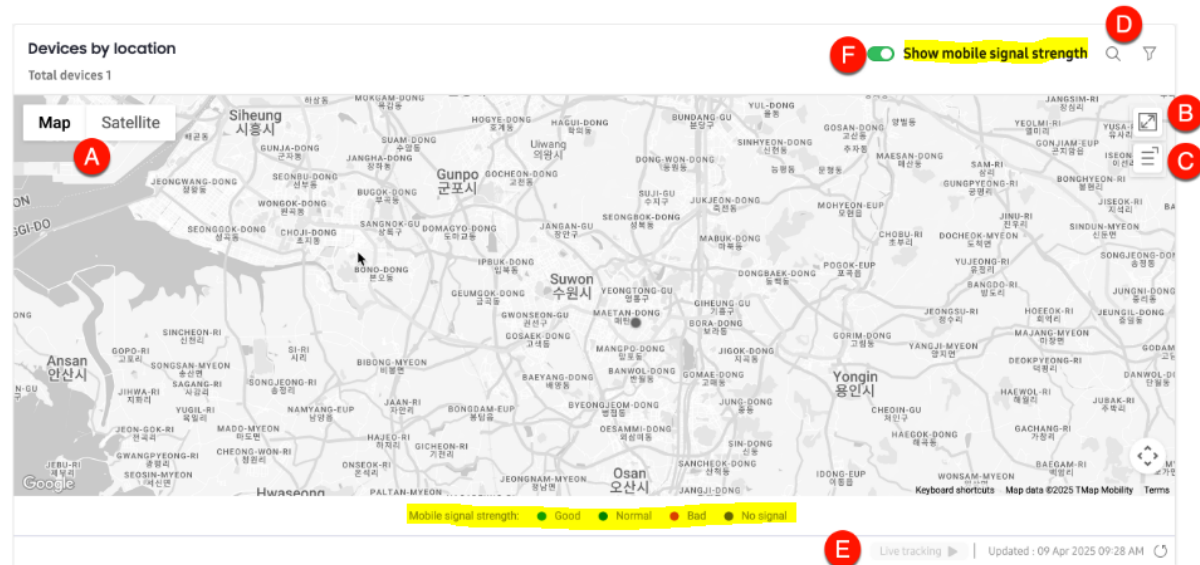
Samsung Knox Documentation, Knox Manage, Introduction, Features and key strengths, <https://docs.samsungknox.com/admin/knox-manage/introduction/features-and-key-strengths/#:~:text=Effortless%20content%20management,Storage%20of%20device%20analysis%20data> (last accessed September 2, 2025).

The Accused Knox Products, for example, capture “mobile signal strength” data (a type of performance or quality of service information for one or more specific locations), which enables the identification of “devices situated in areas with weak cellular coverage or potential dead zones.” Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-dashboard/#:~:text=To%20use%20this%20feature%2C%20you,next%20to%20the%20Search%20icon> (last accessed September 2, 2025).

	<p>F Mobile signal strength Let's you identify when devices are situated in areas with weak cellular coverage or potential dead zones. To use this feature, you must first enable Mobile signal strength with location.</p> <p>On the map, you'll see the mobile signal strength status of every device in your fleet represented by colored dots. These dots are updated at the same rate as your location data collection frequency.</p> <ul style="list-style-type: none"> • Good (green): -70 dBm or higher • Normal (blue): -71 dBm to -80 dBm • Bad (red): -81 dBm to -139 dBm • No signal (grey): -140 dBm or lower, no collection <p>These dots also appear in the map's Device list, letting you quickly correlate the device IDs with each mobile signal strength status. If you want to only show devices with a specific status—for example, only show Bad devices—you can select the status using the map's Filter options next to the Search icon.</p> <p>Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-dashboard/#:~:text=To%20use%20this%20feature%2C%20you,next%20to%20the%20Search%20icon (last accessed September 2, 2025).</p> <p>The Accused Knox Products further provide admin interfaces, via dashboards (e.g., location dashboards) that include maps of device distributions for enterprise end user devices across a given area. Mobile signal strength data can be displayed via such maps, which enables IT administrators to quickly correlate device IDs with each mobile signal strength statuses. This further illustrates how the Accused Knox Products utilize performance or quality of service information associated with specific locations. <i>See</i> Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-dashboard/#:~:text=To%20use%20this%20feature%2C%20you,next%20to%20the%20Search%20icon (last accessed September 2, 2025).</p>
--	--

Location map

The map displays your device groupings (represented by gray circles on the map) as soon as you open the **Location** dashboard. When you zoom in, the circles updates to show the device distribution across a given area.



Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-manage/introduction/features-and-key-strengths/#:~:text=Effortless%20content%20management,Storage%20of%20device%20analysis%20data> (last accessed September 2, 2025).

Claim 4	Accused Knox Products
<p>[4] The method of claim 1, further comprising serving data based on mobile device location information and quality or service information stored in said memory or database.</p>	<p>The Accused Knox Products serve data based on mobile device location information and quality or service information stored in said memory or database.</p> <p>For example, the Accused Knox Products take actions that involve the service of data (e.g., profiles, email notifications, lock/unlock commands, alerts, etc.) based on location information (e.g., geofences) and/or quality of service information (e.g., Wi-Fi disconnects). These event thresholds can be based on an internal statistical model. Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Settings, https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/settings/thresholds/ (last accessed September 2, 2025).</p> <p>Create and associate event types</p> <p>Last updated August 5th, 2025</p> <p>To add an event for a profile:</p> <ol style="list-style-type: none"> 1. On the Knox Manage console, go to Profile. 2. Click Add. The Add Profile page opens. 3. Fill the profile details: <ul style="list-style-type: none"> ◦ Name — Enter the name of the profile. ◦ Platform — Choose a device platform. ◦ Description — Enter a description for the profile. ◦ Event Profile — Click  to enable events. You can only enable events when adding a new profile. If you want to add events for a profile that already exists, you must add a new profile that includes the same options as the existing profile, and the events. ◦ Event Type — Choose one of the following event types: <ul style="list-style-type: none"> ◦ Day & Time ◦ Application ◦ Wi-Fi SSID ◦ SIM Change ◦ Roaming ◦ Geofencing

Samsung Knox Documentation, Home, Knox Manage, Configure, Profile, Set up profiles, Configure events for profiles, <https://docs.samsungknox.com/admin/knox-manage/configure/profile/set-up-profiles/configure-events-for-profiles/create-and-associate-event-types/> (last accessed September 2, 2025).

- **Conditions** — Configure the conditions that cause an event depending on the selected event type. These options show only when the profile has events enabled. For more information about the condition's details, see [Supported platforms by event type](#).
- **Lock Device When Out of Geofencing Area** — **Locks the device when the device is out of the geofencing area.** This option is only available when the **Geofencing** event type is selected. The device automatically unlocks upon reentering the geofencing area.
- **Allow Run Offline** — Allow the profile to be applied to the device even when it is offline. This option appears only if events are enabled. This option only supports the Day & Time, Application, and Geofencing types.
- **Lock Device when changing SIM** — Locks the device when the SIM is changed. This option appears only when the SIM Change type event has been selected.
- **Notification** — Sends a notification to device users when the profile starts or stops being applied. IT admins can now set up the profile to **receive an email notification when devices travel outside or returns to the geofencing area.**

Samsung Knox Documentation, Home, Knox Manage, Configure, Profile, Set up profiles, Configure events for profiles, <https://docs.samsungknox.com/admin/knox-manage/configure/profile/set-up-profiles/configure-events-for-profiles/create-and-associate-event-types/> (last accessed September 2, 2025).

Geofencing	<ol style="list-style-type: none"> 1. For Event Type, select Geofencing. 2. Select Conditions > Add. 3. In the Set Geofencing Condition dialog, choose the center point of the location and the distance around it in meters. 	<p>Applies the profile when the device is located near a specific geographic area.</p> <p>Enter an address to search for, and then Google Maps shows the location, and latitude and longitude automatically.</p> <p>You can also enter a size to view the radius set by the location.</p>	Supported
------------	--	--	-----------

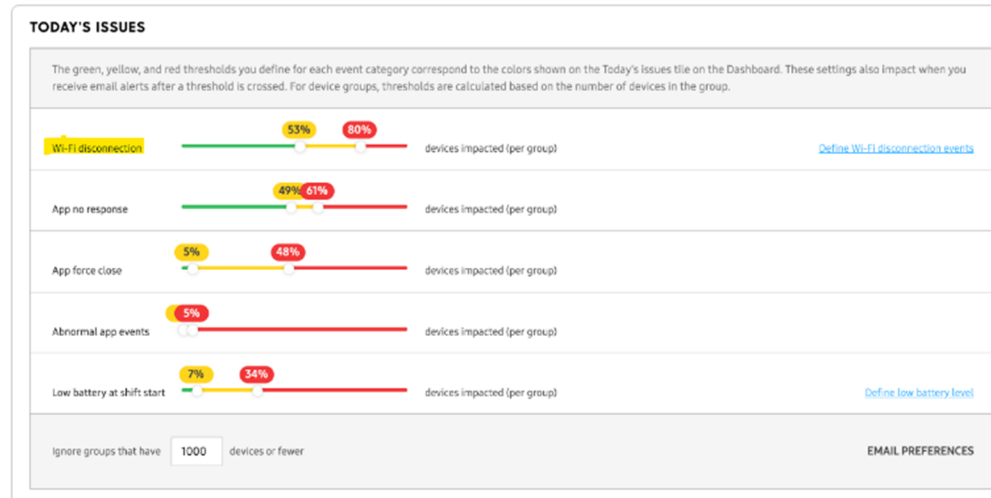
Samsung Knox Documentation, Home, Knox Manage, Configure, Profile, Set up profiles, Configure events for profiles, <https://docs.samsungknox.com/admin/knox-manage/configure/profile/set-up-profiles/configure-events-for-profiles/types-of-events/> (last accessed September 2, 2025).

Thresholds tab

Last updated December 19th, 2024

On the **THRESHOLDS** tab, you can set the conditions for when certain dashboard insights **trigger alerts**.

Today's issues



Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Settings,
<https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/settings/thresholds/> (last accessed September 2, 2025).

Wi-Fi Disconnections

You may want to track whether a certain number of **Wi-Fi disconnection events** are occurring, based on the following conditions:

- BSSIDs (basic service set identifiers) with a certain number of disconnection events, per day
- Devices with a certain number of disconnection events, per day
- Groups that contain devices with a certain number of disconnection events, per day

Enter a number of events as a threshold for each category. This number must exceed 1. **Once the detected number of disconnection events exceeds the threshold, an email alert is triggered.**

In the top-right corner of the **NETWORK** section, enable **Recommended Wi-Fi disconnection thresholds** to have the service **intelligently define Wi-Fi disconnection event thresholds based on an internal statistical model**. This option is only available once Knox Asset Intelligence has collected enough network data from your devices. If you enable the recommended values and save your changes, the existing threshold values are overridden for all admins in your tenant.

Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Settings,
<https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/settings/thresholds/> (last accessed September 2, 2025).

Claim 5	Accused Knox Products
<p>[5] The method of claim 4 wherein said data comprises one or more of a recommended operating band, operating mode, communications network and/or carrier for end users or end user communications devices.</p>	<p>The Accused Knox Products serve data that comprises one or more of a recommended operating band, operating mode, communications network and/or carrier for end users or end user communications devices.</p> <p>For example, the Accused Knox Products serve profiles based on location information (e.g., geofences) and quality or service information (e.g., network availability.) and such profiles control communication settings for enterprise personnel end user mobile devices, such operating bands (e.g., activating Bluetooth, which operates at a different band than Wi-Fi, while disabling Wi-Fi), operating modes (e.g., activating or disabling Bluetooth, Mobile Data, or Wi-Fi) as communications networks (e.g., Bluetooth, Mobile Data, or Wi-Fi, etc.). <i>See</i> Samsung Knox Documentation, Home, Knox Manage, Configure, Profile, Set up profiles, Configure events for profiles, https://docs.samsungknox.com/admin/knox-configure/how-to-guides/profiles/configure-profile-settings/ (last accessed September 2, 2025).</p> <p>With Samsung Knox Configure, IT has granular control over device settings and startup, including an option to disable Android's factory reset option. Knox Configure can set devices to automatically re-enroll after factory reset in the custom configuration created by the IT admin. You can also create a customized startup configuration using predefined profiles and policies for Wi-Fi access, near-field communications (NFC) and Bluetooth. This streamlined process removes many of the common pain points for both employees and administrators.</p> <p>Samsung, Insights, Home, Mobile Security, Device Management, https://insights.samsung.com/2021/03/12/customizing-mobile-devices-with-knox-configure/ (last accessed September 2, 2025).</p>

Wi-Fi

Under **WI-FI**, configure the following settings:

- **Disable WiFi** — Prevents device users and third-party apps to turn on Wi-Fi.
- **Default Wi-Fi settings** — Set the current device Wi-Fi configuration as the default or leave the Wi-Fi **On** or **Off**. Select **Prevent users from changing the Wi-Fi on/off settings** to prohibit users from turning Wi-Fi on or off.
- **Network (optional)** — Enter the **SSID name** and **Password** for the default Wi-Fi network.
- **Advanced Wi-Fi settings** (Dynamic edition only) — Enter an **SSID Name** and select the **Security** setting for this network. If applicable, enter a **Password**. If necessary, a device can connect to a specified network with **Proxy (optional)** credentials delivered by Knox Configure using a proxy to communicate externally. Click **ADD ANOTHER** to set up multiple Wi-Fi profiles.
 - **MAC address type** — Select whether you want to have a **Randomized MAC** address or **Phone MAC** address for connectivity. Phone MAC address makes devices ready to use when company WLAN uses MAC filtering. Default setting is **Keep current settings**. This feature is available on devices with Android-10 or higher.
 - **Disable Wi-Fi network blocking** — Select this option to disable Wi-Fi network blocking for the defined SSID configuration. Samsung devices have Wi-Fi network blocking enabled by default, and disabling Wi-Fi network blocking may reduce AP connection and battery consumption issues for the specified SSID Wi-Fi configuration. This setting is available on Knox 3.5 and above supported devices, and XCover Pro devices running Knox version 3.4.1 and above.

Select **ADVANCED WI-FI** to configure the following settings:

- **Switch to mobile data** allows the device to use mobile data whenever the current Wi-Fi network is identified as slow or unstable.
- **Allow individual apps to switch** allows the device to switch apps to mobile data when a Wi-Fi connection cannot be established.
- **Turn on Wi-Fi automatically** allows the device to enable Wi-Fi in locations where Wi-Fi has been used frequently.
- **Detect suspicious networks** allows the device to receive notifications when suspicious activity is detected on the Wi-Fi network.
- **Wi-Fi power saving mode** reduces battery consumption by analyzing Wi-Fi traffic patterns.
- **Hotspot 2.0** allows the device to connect to Hotspot 2.0-supported access points without requiring a password.
- **Disable proxy settings**
- **Hide QR code**

Each **Advanced Wi-Fi** setting has an **Allow user to change setting** option to either **Allow** device user changes, **Do not allow** user changes or **Do not allow and hide setting from user**. These options can be set independently of each other and are persistent across subsequent logins.

Samsung Knox Documentation, Home, Knox Manage, Configure, Profile, Set up profiles, Configure events for profiles, <https://docs.samsungknox.com/admin/knox-configure/how-to-guides/profiles/configure-profile-settings/> (last accessed September 2, 2025).

Bluetooth

Set the current Bluetooth setting as the default or **turn Bluetooth On or Off** by default.

You can also disable Bluetooth on the device entirely as well as disable the **device's capability to search, connect and share data with other Bluetooth-enabled devices**.

You can also **Disable Bluetooth discoverable mode**.

Mobile data

Configure the following mobile data settings:

- **Turn on mobile data** — **Turn mobile data ON, OFF**, or keep the current setting on the device.
- **Default Data roaming settings** — This setting **permits admins to enable/disable device users from accessing and using carrier data when roaming**. Turn default data roaming either **On, Off**, or **Keep current settings** (default setting). Selecting **On** and using mobile data when roaming could result in additional charges.

Samsung Knox Documentation, Home, Knox Manage, Configure, Profile, Set up profiles, Configure events for profiles, <https://docs.samsungknox.com/admin/knox-configure/how-to-guides/profiles/configure-profile-settings/> (last accessed September 2, 2025).

Roaming

1. For **Event Type**, select **Roaming**.

Applies the profile when the device roams.

2. After you set the policy, depending upon whether you turned on **Notification**, the policy's conditions apply to the device the next time it roams.

If the device cannot communicate with the server temporarily due to roaming, **the profile applies when the communication network becomes available again**, such as when airplane mode is turned off or the device is rebooted.

Samsung Knox Documentation, Home, Knox Manage, Configure, Profile, Set up profiles, Configure events for profiles, Types of events <https://docs.samsungknox.com/admin/knox-manage/configure/profile/set-up-profiles/configure-events-for-profiles/types-of-events/> (last accessed September 2, 2025).

take actions that involve the service of data (e.g., profiles, alerts, etc.) based on location information (e.g., geofences) and/or quality of service information (e.g., Wi-Fi disconnects). These event thresholds can be

based on an internal statistical model. Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Settings, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/settings/thresholds/> (last accessed September 2, 2025).

- **Conditions** — Configure the conditions that cause an event depending on the selected event type. These options show only when the profile has events enabled. For more information about the condition's details, see [Supported platforms by event type](#).
- **Lock Device When Out of Geofencing Area** — **Locks the device when the device is out of the geofencing area.** This option is only available when the **Geofencing** event type is selected. The device automatically unlocks upon reentering the geofencing area.
- **Allow Run Offline** — Allow the profile to be applied to the device even when it is offline. This option appears only if events are enabled. This option only supports the Day & Time, Application, and Geofencing types.
- **Lock Device when changing SIM** — Locks the device when the SIM is changed. This option appears only when the SIM Change type event has been selected.
- **Notification** — Sends a notification to device users when the profile starts or stops being applied. IT admins can now set up the profile to **receive an email notification when devices travel outside or returns to the geofencing area.**

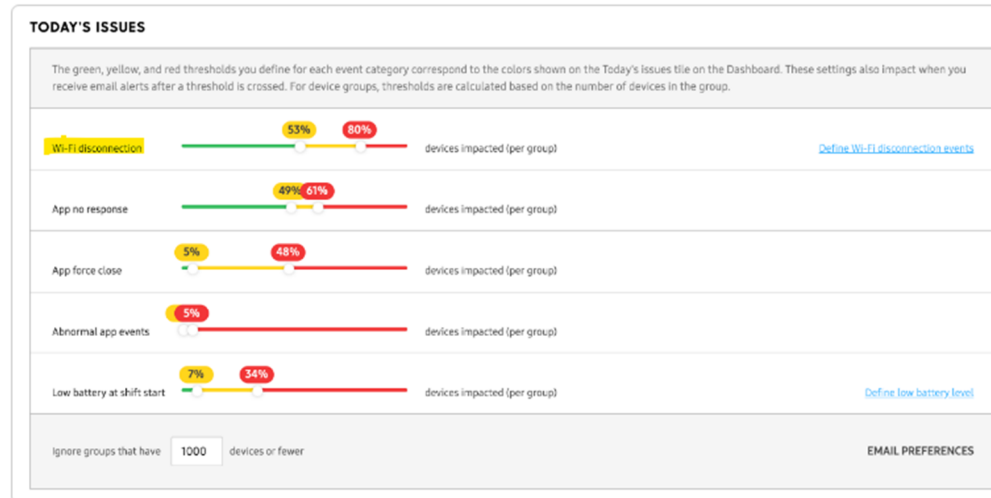
Samsung Knox Documentation, Home, Knox Manage, Configure, Profile, Set up profiles, Configure events for profiles, <https://docs.samsungknox.com/admin/knox-manage/configure/profile/set-up-profiles/configure-events-for-profiles/create-and-associate-event-types/> (last accessed September 2, 2025).

Thresholds tab

Last updated December 19th, 2024

On the **THRESHOLDS** tab, you can set the conditions for when certain dashboard insights **trigger alerts**.

Today's issues



Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Settings,
<https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/settings/thresholds/> (last accessed September 2, 2025).

Wi-Fi Disconnections

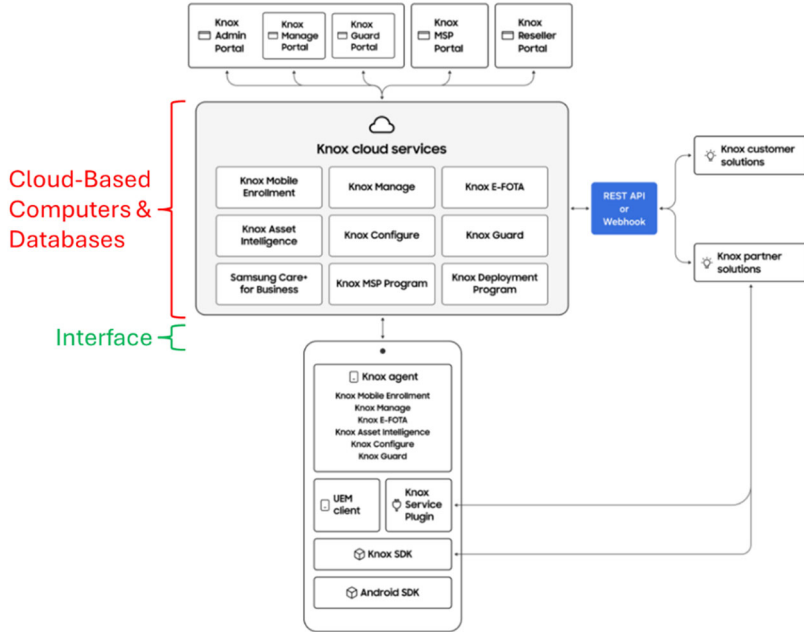
You may want to track whether a certain number of **Wi-Fi disconnection events** are occurring, based on the following conditions:

- BSSIDs (basic service set identifiers) with a certain number of disconnection events, per day
- Devices with a certain number of disconnection events, per day
- Groups that contain devices with a certain number of disconnection events, per day

Enter a number of events as a threshold for each category. This number must exceed 1. **Once the detected number of disconnection events exceeds the threshold, an email alert is triggered.**

In the top-right corner of the **NETWORK** section, enable **Recommended Wi-Fi disconnection thresholds** to have the service **intelligently define Wi-Fi disconnection event thresholds based on an internal statistical model**. This option is only available once Knox Asset Intelligence has collected enough network data from your devices. If you enable the recommended values and save your changes, the existing threshold values are overridden for all admins in your tenant.

Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Settings,
<https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/settings/thresholds/> (last accessed September 2, 2025).

Claim 10	Accused Knox Products
<p>[10PRE] A system for collecting and providing access to quality or service information associated with one or more wireless communications networks, mobile devices, or end users, comprising:</p>	<p>The Accused Knox Products constitute a system for collecting and providing access to quality or service information associated with one or more wireless communications networks, mobile devices, or end users.</p> <p>For example, the Accused Knox Products include an application, the Knox Agent, that can be downloaded and executed on a mobile device and can interface with one or more of the cloud-based computers of the Knox Cloud Services via an application programming interface. As described below, the Knox Agent collects quality or service information from a wireless communication device and the Knox Cloud Services and Knox Admin Portal provide that information to end users, such as an enterprise IT administrator.</p>  <p>Samsung Knox Documentation, Fundamentals, Introduction, the Big Picture, https://docs.samsungknox.com/dev/fundamentals/ (last accessed September 2, 2025).</p>

The Knox Asset Intelligence agent is responsible for collecting device health and usage information, and sending this information back to the server to be converted into meaningful dashboard insights. *See* Samsung Knox Documentation, Home, Knox Asset Intelligence, How-to guides, Use the agent app, <https://docs.samsungknox.com/admin/knox-asset-intelligence/how-to-guides/use-the-agent-app/> (last accessed September 2, 2025). Once the agent app is downloaded and installed, device users simply launch the app to let the agent begin collecting data. *See id.* For example, performance or quality of service information for the mobile device, such as network signal strength, can be updated in real time, for example, every 10 seconds. *See id.* Furthermore, users can view their device's Wi-Fi network signal strength over the last ten seconds, updated in real time. *See id.*

Use the agent app

Last updated September 25th, 2024

The Knox Asset Intelligence agent is responsible for enrolling devices into the service, collecting device health and usage information, and sending this information back to the server to be converted into meaningful dashboard insights. Once the agent app is downloaded and installed, device users simply launch the app to let the agent begin collecting data.

Samsung Knox Documentation, Home, Knox Asset Intelligence, How-to guides, Use the agent app, <https://docs.samsungknox.com/admin/knox-asset-intelligence/how-to-guides/use-the-agent-app/> (last accessed September 2, 2025).

Network

The **Network** screen displays the mobile network signal strength of the device, along with information about the carrier network and mobile data usage.

On the chart, users can view their device's mobile network signal strength over the last 10 seconds, updated in real time. Users can tap the **Mobile data usage** field to view additional usage details, or tap **Error report** to send a debug log to their IT admins to help troubleshoot mobile network related issues.

Samsung Knox Documentation, Home, Knox Asset Intelligence, How-to guides, Use the agent app, <https://docs.samsungknox.com/admin/knox-asset-intelligence/how-to-guides/use-the-agent-app/> (last accessed September 2, 2025)

Wi-Fi

Status

The **Wi-Fi** screen shows the **Status** tab default. Here, device users can view the signal strength of a Wi-Fi connection, along with information about the Wi-Fi network's IP address, SSID, and MAC information. On the chart, users can view their device's Wi-Fi network signal strength over the last ten seconds, updated in real time.

If Wi-Fi roaming is detected, additional roaming information is displayed. The signal strength is shown in real-time as a graph, with three statuses indicating the network latency. The status ranges are as follows:

Status	Strength
Excellent	-67 dBm or higher
Very good	-68 dBm to -70 dBm
Okay	-71 dBm to -80 dBm
Not good	-81 dBm to -90 dBm
Unusable	-91 dBm or lower

Samsung Knox Documentation, Home, Knox Asset Intelligence, How-to guides, Use the agent app, <https://docs.samsungknox.com/admin/knox-asset-intelligence/how-to-guides/use-the-agent-app/> (last accessed September 2, 2025)

The Accused Knox Products further enable the Knox Cloud Services, such as Knox Asset Intelligence, to be updated with the most recent signal strength information (e.g., performance or quality of service information) from the mobile device via the first interface. For example, the “data upload” section of the Knox Asset Intelligence settings has several data upload settings. See Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Settings, Data conditions tab, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/settings/data-conditions/> (last accessed September 2, 2025).

Data upload

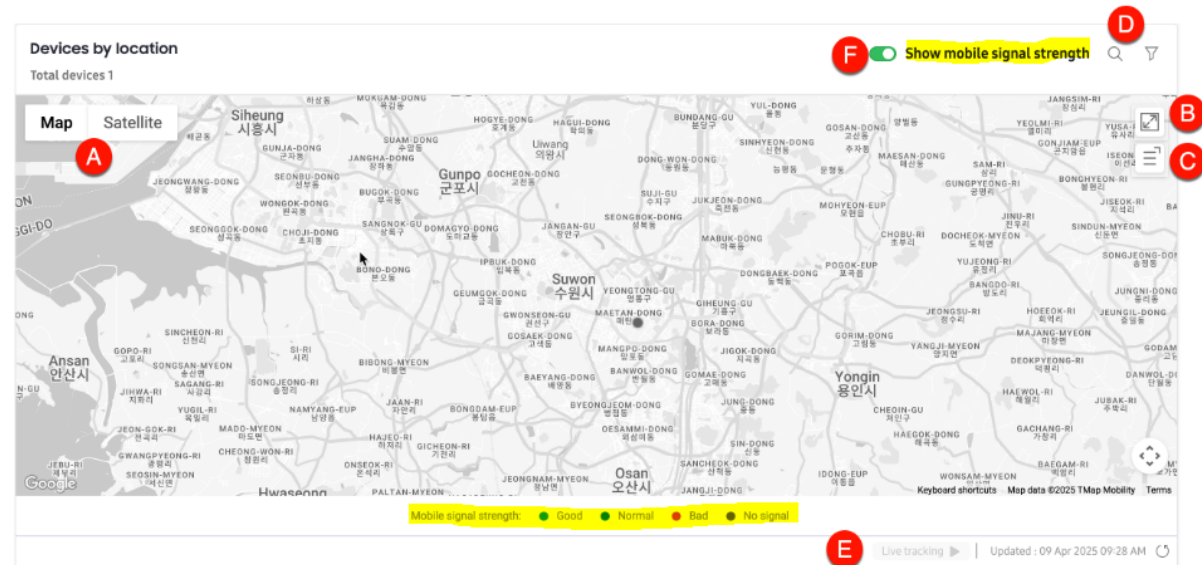
The **Data upload** section lets you specify what type of data gets collected, and — for some insights — how often data gets collected. The following table describes the data upload options available. Select a data upload option checkbox in each category to let Knox Asset Intelligence collect that specific type of data from your devices. To disable data collection for an entire category altogether, toggle the category option off.

Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Settings, Data conditions tab, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/settings/data-conditions/> (last accessed September 2, 2025)

The Accused Knox Products further allow end users, such as enterprise IT administrators, to review, catalog or sort information, such as the mobile signal strength data. Specifically, the mobile signal strength data can be displayed via maps, which enable customers to quickly correlate device IDs with each mobile signal strength statuses. On the map, users can see the mobile signal strength status of every device in a fleet represented by colored dots, which are updated at the same rate as the location data collection frequency. *See* Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-dashboard/#:~:text=To%20use%20this%20feature%2C%20you,next%20to%20the%20Search%20icon> (last accessed September 2, 2025).

Location map

The map displays your device groupings (represented by gray circles on the map) as soon as you open the **Location** dashboard. When you zoom in, the circles updates to show the device distribution across a given area.



Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-manage/introduction/features-and-key-strengths/#:~:text=Effortless%20content%20management,Storage%20of%20device%20analysis%20data> (last accessed September 2, 2025).

The Accused Knox Products provide a network management platform through a network communication interface for managing mobile devices that interact with an enterprise network. The Accused Knox Products include Knox Platform for Enterprise (KPE), Knox Mobile Enrollment (KME), Knox Manage, Knox E-FOTA, Knox Asset Intelligence (KAI), Knox Remote Support, Knox Capture, Knox Authentication Manager, Knox Configure, and Knox Guard.

The Knox Service Guide v3.05 describes Knox Manage as an enterprise mobility management (EMM) platform that includes an EMM console that allows IT administrators to manage mobile devices enrolled with Knox Manage. Knox Service Guide v3.05, p. 7. The Knox Manage Client (e.g., application) is deployed to managed mobile devices when they are enrolled with Knox Manage. Knox Service Guide v3.05, p. 5. In one example, the managed mobile device can be configured, through the EMM application, to report device location information to the EMM console.

See <https://image-us.samsung.com/SamsungUS/samsungbusiness/pdfs/Samsung-KNOX-QuickStarts-3v05.pdf> (“Knox Service Guide v3.05”)

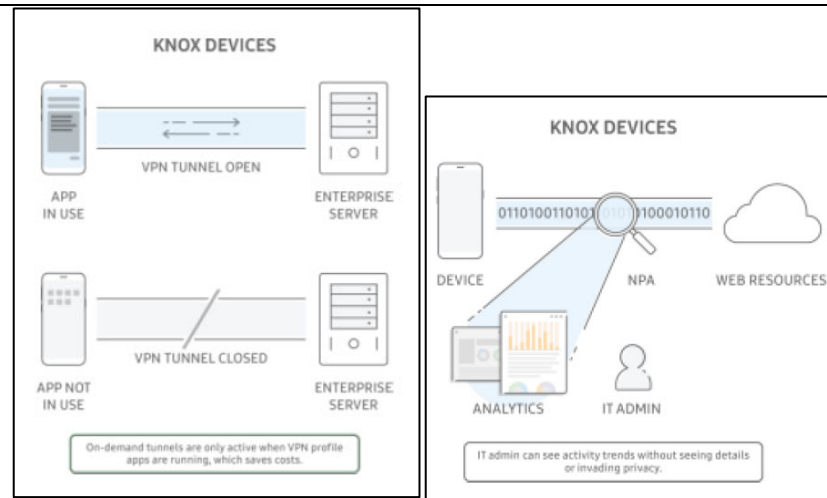
2.7. Device Policy Creation

Device policies are deployed when a device is enrolled in Knox Manage or can be pushed automatically to devices. Knox Manage implements a hierarchy policy set that allows policies to be deployed to all users, while other policies can then be deployed to a subset of users based on your business need. Some of the policies that can be configured include allowing users to use the camera, **configure the device to report the devices location within the EMM console**, and allowing users to wipe devices.

Knox Service Guide v3.05, p. 7 (annotated).

Samsung published several documents outlining the functionality of Knox Suite, including user guides, promotional documents, and white papers. The figures below, from Samsung Knox White Paper v1.5, show the network communication interface that allows for the secure transfer of information between the managed mobile devices and enterprise servers on the enterprise network.

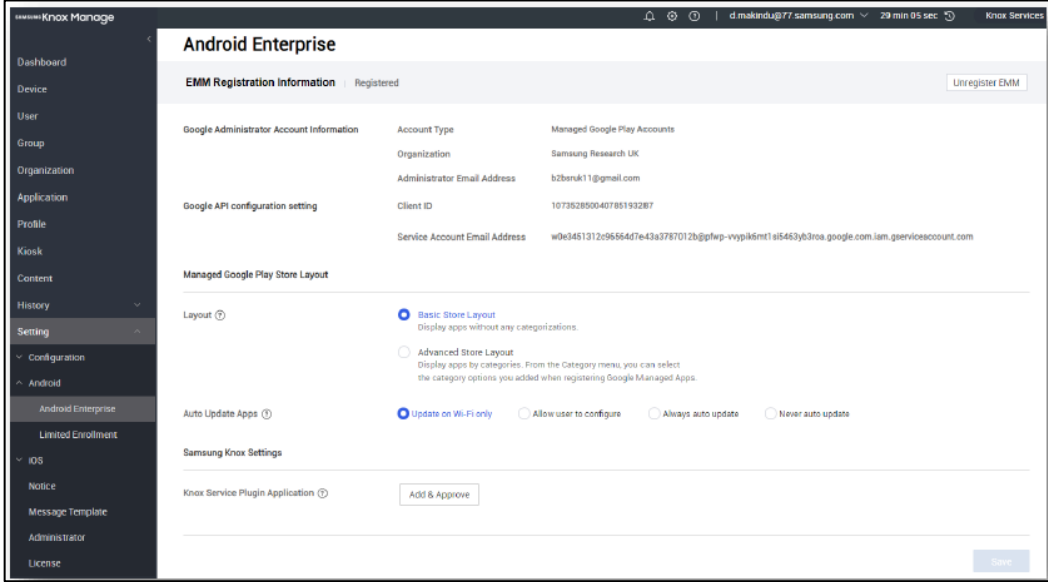
See <https://image-us.samsung.com/SamsungUS/samsungbusiness/solutions/topics/iot/071421/Knox-Whitepaper-v1.5-20210709.pdf> (“Knox White Paper v1.5”)



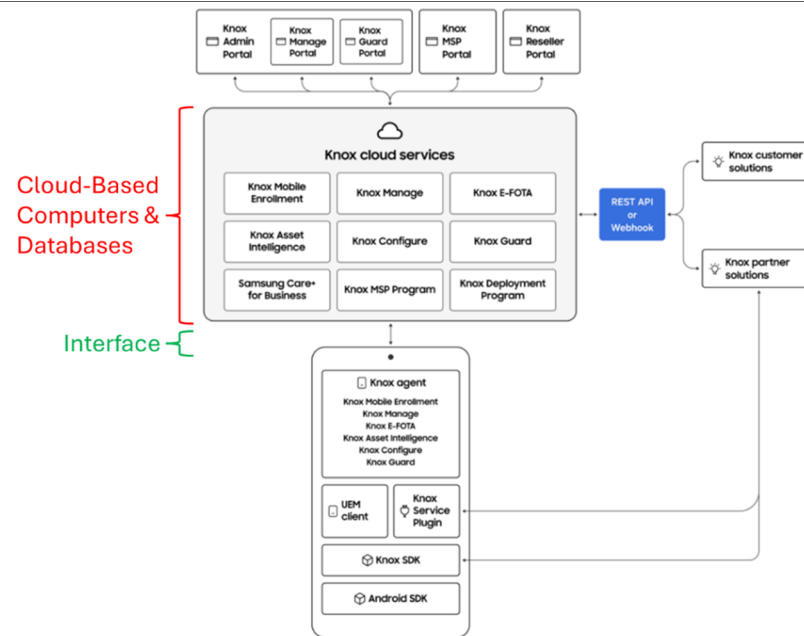
Knox White Paper v1.5, pp. 35 (left), 37 (Right).

The image below shows the EMM console of Knox Manage that allows the IT admin to enroll, configure, manage, or review information associated with the managed mobile devices.

See <https://docs.samsungknox.com/admin/knox-platform-for-enterprise/assets/knox-manage-knox-platform-for-enterprise-guide-v3.0.pdf> (“Samsung Knox Manage 22.5”)

	 <p>Samsung Knox Manage 22.5, p. 8</p>
<p>[10A] a computer configured to receive mobile device location information of a plurality of mobile devices or end users that are associated with one or more wireless communications networks and quality or service information pertaining to wireless access characteristics</p>	<p>The Accused Knox Products include a computer configured to receive mobile device location information of a plurality of mobile devices or end users that are associated with one or more wireless communications networks and quality or service information pertaining to wireless access characteristics for one or more mobile devices of said plurality of mobile devices or end users, and said quality or service information comprising coverage, availability or performance information of one or more wireless communications networks or said one or more mobile devices.</p> <p>For example, the Knox Cloud Services include one or more cloud-based computers that receive mobile device location information via an interface, such as an application programming interface. <i>See</i> Samsung Knox Documentation, Fundamentals, Introduction, the Big Picture, https://docs.samsungknox.com/dev/fundamentals/ (last accessed September 2, 2025).</p>

for one or more mobile devices of said plurality of mobile devices or end users, and said quality or service information comprising coverage, availability or performance information of one or more wireless communications networks or said one or more mobile devices;



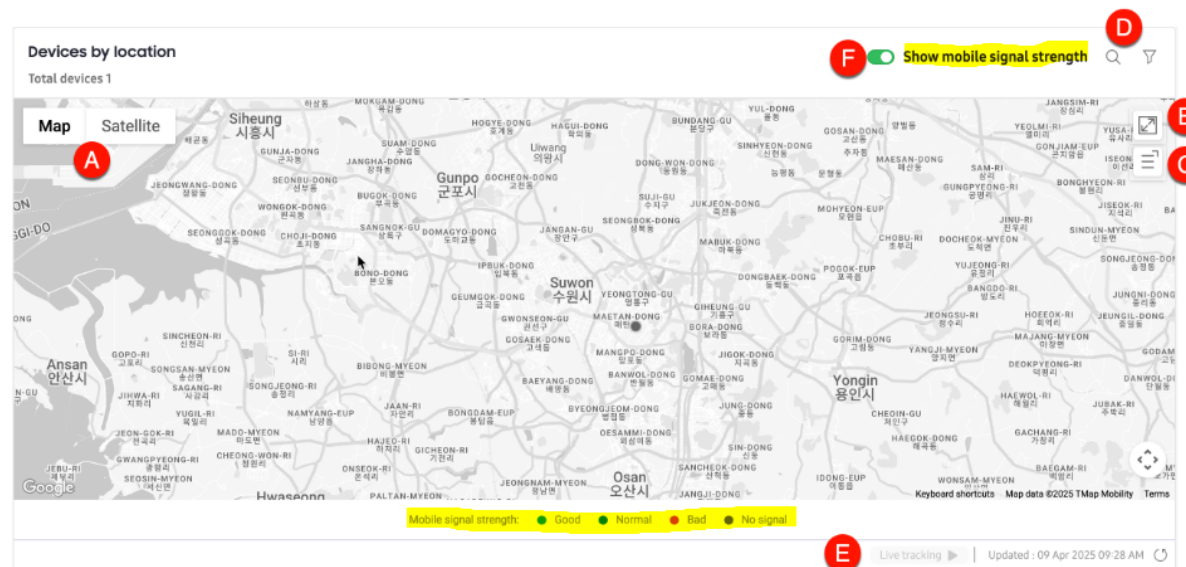
Samsung Knox Documentation, Fundamentals, Introduction, the Big Picture,
<https://docs.samsungknox.com/dev/fundamentals/> (last accessed September 2, 2025).

The received information includes location information for each mobile device, because the Accused Knox Products further allow end users, such as enterprise IT administrators, to use computers access review, catalog or sort information, such as the mobile signal strength data on maps. These maps are generated based on location information generated by the mobile devices of enterprise employees, received by one or more cloud-based computers of the Knox Cloud Services, and ultimately received by a computer of an enterprise IT administrator end user that accesses the Knox Cloud Services via the Knox Admin Portal. The received information enables customers to quickly correlate device IDs with each mobile signal strength status for each device in a fleet represented by colored dots, which are updated at the same rate as the location data collection frequency. *See* Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, [https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-](https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-)
[dashboard/use-the-location-](https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-)

[dashboard/#:~:text=To%20use%20this%20feature%2C%20you,next%20to%20the%20Search%20icon](#) (last accessed September 2, 2025).

Location map

The map displays your device groupings (represented by gray circles on the map) as soon as you open the **Location** dashboard. When you zoom in, the circles updates to show the device distribution across a given area.



Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-manage/introduction/features-and-key-strengths/#:~:text=Effortless%20content%20management,Storage%20of%20device%20analysis%20data> (last accessed September 2, 2025).

This received location information is also associated with one or more wireless communication networks (e.g., mobile, WiFi) and quality of service information (e.g., signal strength). As illustrated above, signal strength data can be displayed via maps, which enable IT administrators to quickly correlate device IDs with each mobile signal strength statuses. Such signal strength data represents information of each mobile device's coverage, availability or performance information at a particular location. See Samsung Knox Documentation,

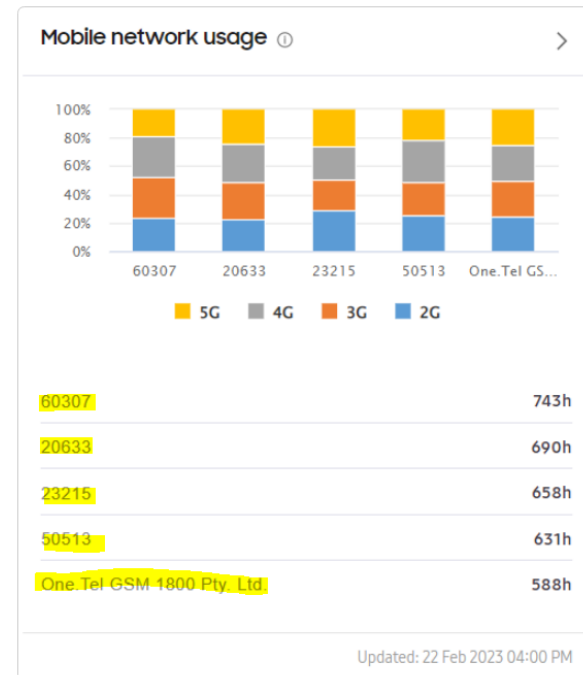
Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-dashboard/#:~:text=To%20use%20this%20feature%2C%20you,next%20to%20the%20Search%20icon> (last accessed September 2, 2025).

The Accused Knox Products further transmit, process, and receive coverage, availability or performance information for one or more wireless communications networks. For example, as illustrated above, Accused Knox Products provide performance information, such as mobile network usage, on a “per carrier” basis. This helps monitor and measure how device users are using mobile data by collecting data about mobile data usage by network generations and carrier. For example, device users might primarily be using 4G networks, meaning a 5G data plan could be unnecessary. *See* Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Network insights, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/network-insights/mobile-network-usage/> (last accessed September 2, 2025). According to Samsung, “Knox Asset Intelligence collects the MCC/MNC code and matches it to a carrier name.” *See id.*

Network	Wi-Fi disconnection events: Groups	Get in-depth visibility into device groups with the highest amount of disconnection problems, including detailed event logs.
	Wi-Fi disconnection events: BSSIDs and APs	Get in-depth visibility into Wi-Fi networks with the highest amount of disconnection problems, including detailed event logs.
	Mobile network usage	Get in-depth visibility into cellular usability information, including which network generations are used per carrier.
	Network latency	Lets you see which IP addresses or domains have the longest response time or don't respond at all to device requests.

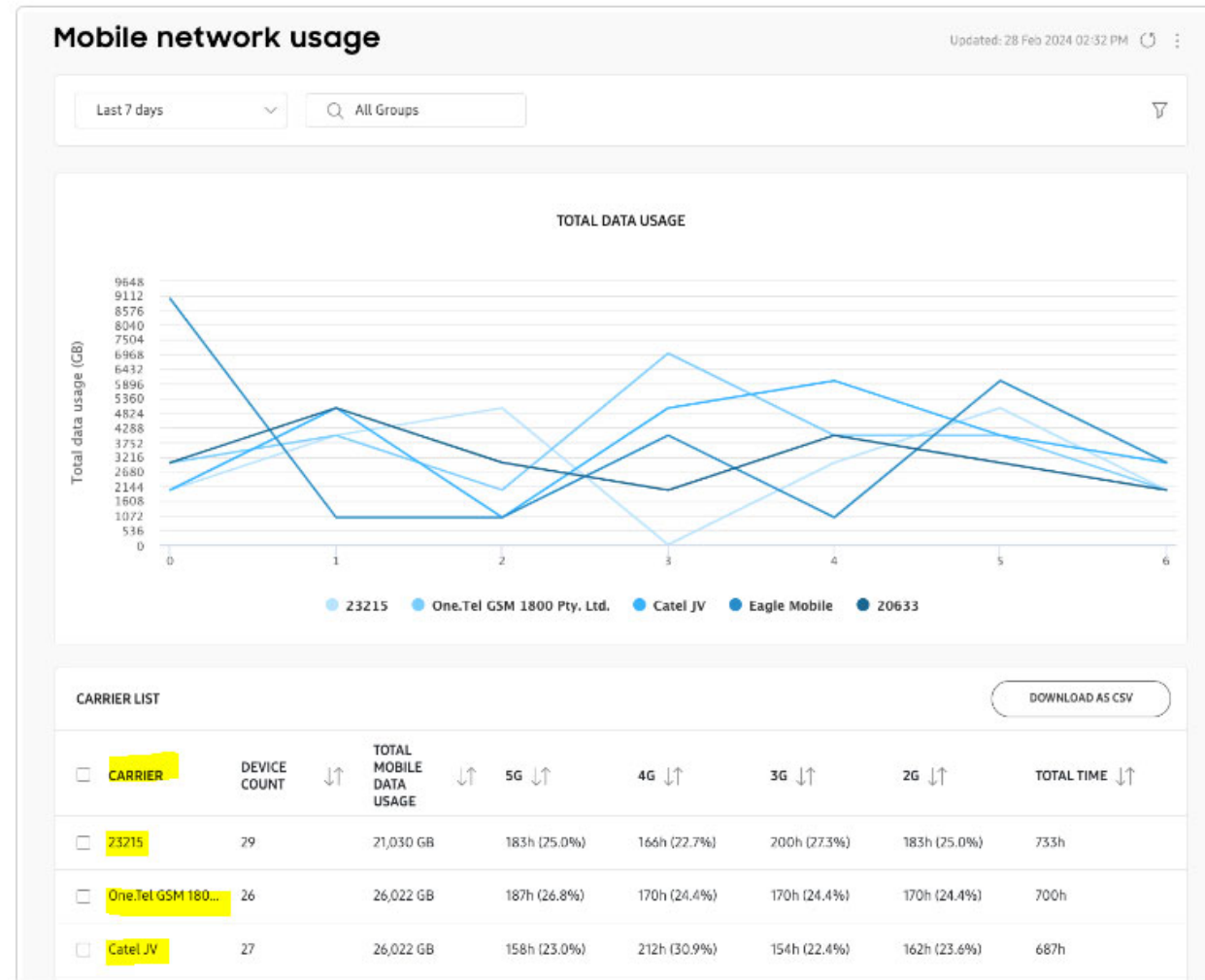
Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Overview,
<https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/overview/> (last accessed September 2, 2025)

The **Mobile network usage** dashboard chart displays **cellular signal information arranged by carrier network**, providing insight into which network generations — 2G, 3G, 4G, and 5G — are used per carrier.



The **five carriers with the longest cumulative connection durations are shown**, along with the percentage of **total carrier usage time** associated with each network generation. The information also includes the **type of cellular network**, the **connection duration** for each network generation, and the **cellular usage by carrier**.

Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Network insights,
<https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/network-insights/mobile-network-usage/> (last accessed September 2, 2025).



The **Mobile network usage** expanded view page features a chart that lists the top 5 mobile carriers with the highest network usage (in GB) over the selected reporting period. Click any carrier name in the legend to show or hide the data on the chart.

In the **CARRIER LIST** table below, you'll see usage data for every carrier that your devices connected to during the selected reporting period. For each carrier, you can view how many devices connected, view the total usage (in GB), and view the total connection time (in hours) for that carrier (with connection time data broken down by network generation (5G, 4G, and so on)).

	<p>Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Network insights, https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/network-insights/mobile-network-usage/ (last accessed September 2, 2025).</p>
<p>[10B] a memory or database configured to store the received mobile device location information and quality or service information;</p>	<p>The Accused Knox Products include a memory or database configured to store the received mobile device location information and said quality or service information.</p> <p>For example, the Knox Cloud Services include one or more cloud-based databases or computers with memories that store mobile device data uploaded via the Knox Agent, for analysis and display via the Knox Admin Portal, which includes one or more web-based portals that interface with one or more cloud-based computers and databases of the Knox Cloud Services. According to Samsung, “[w]ith Knox Cloud Services, enterprise IT administrators can access a range of device management, monitoring, security, and customization solutions for their fleet of devices.” Samsung Knox Documentation, Fundamentals, Introduction, the Big Picture, https://docs.samsungknox.com/dev/fundamentals/ (last accessed September 2, 2025).</p>

Samsung Knox Documentation, Fundamentals, Introduction, the Big Picture, <https://docs.samsungknox.com/dev/fundamentals/> (last accessed September 2, 2025) (annotated).

The Accused Knox Products provide “[s]torage of device analysis data,” to facilitate “[r]eal-time monitoring of devices,” “[s]upport for audits that verify system events, applied policies, tampering and compliance violations,” and “[s]upport for appropriate actions after audit.” Samsung Knox Documentation, Knox Manage, Introduction, Features and key strengths, <https://docs.samsungknox.com/admin/knox-manage/introduction/features-and-key-strengths/#:~:text=Effortless%20content%20management,Storage%20of%20device%20analysis%20data> (last accessed September 2, 2025).

Storage of device analysis data

In addition to real-time monitoring of devices, Knox Manage also provides audits. You can verify the events that occur in the system, the policies that were applied, any tampering and compliance violations, and so on, and take appropriate actions against them.

- Real-time monitoring of devices.
- Support for audits that verify system events, applied policies, tampering and compliance violations and so on.
- Support for appropriate actions after audit.

Samsung Knox Documentation, Knox Manage, Introduction, Features and key strengths, <https://docs.samsungknox.com/admin/knox-manage/introduction/features-and-key-strengths/#:~:text=Effortless%20content%20management,Storage%20of%20device%20analysis%20data> (last accessed September 2, 2025).

The stored information includes “mobile signal strength” data (a type of quality of service information for one or more specific locations), which enables the identification of “devices situated in areas with weak cellular coverage or potential dead zones.” Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-dashboard/#:~:text=To%20use%20this%20feature%2C%20you,next%20to%20the%20Search%20icon> (last accessed September 2, 2025).

	<p>F Mobile signal strength Let's you identify when devices are situated in areas with weak cellular coverage or potential dead zones. To use this feature, you must first enable Mobile signal strength with location.</p> <p>On the map, you'll see the mobile signal strength status of every device in your fleet represented by colored dots. These dots are updated at the same rate as your location data collection frequency.</p> <ul style="list-style-type: none"> • Good (green): -70 dBm or higher • Normal (blue): -71 dBm to -80 dBm • Bad (red): -81 dBm to -139 dBm • No signal (grey): -140 dBm or lower, no collection <p>These dots also appear in the map's Device list, letting you quickly correlate the device IDs with each mobile signal strength status. If you want to only show devices with a specific status—for example, only show Bad devices—you can select the status using the map's Filter options next to the Search icon.</p> <p>Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-dashboard/#:~:text=To%20use%20this%20feature%2C%20you,next%20to%20the%20Search%20icon (last accessed September 2, 2025).</p> <p>The Accused Knox Products store information associated with the managed mobile devices in a Knox database so that the information can be accessible to the IT admin through the EMM console.</p> <p>The data storage servers for the KAI service store data associated with the managed mobile devices in a queryable database as well as continuing to monitor, collect, and process, in automated fashion, data associated with the managed devices. The figure below shows the queryable date ranges for specific data stored in the database.</p>
--	--

	<table><tr><th>Data type</th><th>Data insight</th><th>Dashboard update rate</th><th>Available date ranges</th></tr><tr><td>Common</td><td>Device status</td><td>Real-time</td><td>Can only view data for Today</td></tr><tr><td rowspan="4">Battery</td><td>Battery status and state of health</td><td>Real-time</td><td>Can only view data for Today</td></tr><tr><td>Low battery, Battery drain, and Charge events</td><td>Previous day</td><td>Can view data for Yesterday, or Last 7, 14, 30, or 60 days.</td></tr><tr><td>Battery level at shift start</td><td>Real-time when viewing Today's issues, otherwise Previous day.</td><td>Can view data for Yesterday, or Last 7, 14, 30, or 60 days.</td></tr><tr><td>Battery level at shift end</td><td>Previous day</td><td>Can view data for Yesterday, or Last 7, 14, 30, or 60 days.</td></tr><tr><td rowspan="2">App</td><td>App usage</td><td>Previous day</td><td>Can view data for Yesterday, or Last 7, 14, 30, or 60 days.</td></tr><tr><td>App issues</td><td>Real-time sent hourly by default. Can be changed in Dashboard Settings.</td><td>Can view data for Today, Yesterday, or Last 7, 14, 30, or 60 days.</td></tr><tr><td rowspan="3">Network</td><td>Wi-Fi disconnections</td><td>Real-time</td><td>Can view data for Today, Yesterday, Last 7, or 14 days.</td></tr><tr><td>Mobile network usage</td><td>Previous day</td><td>Can view data for Yesterday, or Last 7, 14, 30, or 60 days.</td></tr><tr><td>Network latency response time</td><td>Previous day</td><td>Can view data for Last 7, 14, or 30, days.</td></tr><tr><td>System</td><td>Storage usage status</td><td>Real-time every every 3 hours.</td><td>Can only view data for Today.</td></tr><tr><td>Scan</td><td>Scanning performance</td><td>Real-time when viewing data for Today, otherwise Previous day.</td><td>Can view data for Today, Yesterday, or Last 7, 14, 30, or 60 days.</td></tr><tr><td>KSP</td><td>Knox Service Plugin</td><td>Real-time</td><td>Can only view data for Today.</td></tr><tr><td>Location</td><td>Location status</td><td>Real-time</td><td>Can only view data for Today.</td></tr><tr><td>Security</td><td>Warranty bit</td><td>Real-time</td><td>Can only view data for Today.</td></tr></table> <p>See https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/overview/</p>	Data type	Data insight	Dashboard update rate	Available date ranges	Common	Device status	Real-time	Can only view data for Today	Battery	Battery status and state of health	Real-time	Can only view data for Today	Low battery, Battery drain, and Charge events	Previous day	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.	Battery level at shift start	Real-time when viewing Today's issues , otherwise Previous day.	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.	Battery level at shift end	Previous day	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.	App	App usage	Previous day	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.	App issues	Real-time sent hourly by default. Can be changed in Dashboard Settings.	Can view data for Today, Yesterday, or Last 7, 14, 30, or 60 days.	Network	Wi-Fi disconnections	Real-time	Can view data for Today, Yesterday, Last 7, or 14 days.	Mobile network usage	Previous day	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.	Network latency response time	Previous day	Can view data for Last 7, 14, or 30, days.	System	Storage usage status	Real-time every every 3 hours.	Can only view data for Today.	Scan	Scanning performance	Real-time when viewing data for Today , otherwise Previous day.	Can view data for Today, Yesterday, or Last 7, 14, 30, or 60 days.	KSP	Knox Service Plugin	Real-time	Can only view data for Today.	Location	Location status	Real-time	Can only view data for Today.	Security	Warranty bit	Real-time	Can only view data for Today.
Data type	Data insight	Dashboard update rate	Available date ranges																																																								
Common	Device status	Real-time	Can only view data for Today																																																								
Battery	Battery status and state of health	Real-time	Can only view data for Today																																																								
	Low battery, Battery drain, and Charge events	Previous day	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.																																																								
	Battery level at shift start	Real-time when viewing Today's issues , otherwise Previous day.	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.																																																								
	Battery level at shift end	Previous day	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.																																																								
App	App usage	Previous day	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.																																																								
	App issues	Real-time sent hourly by default. Can be changed in Dashboard Settings.	Can view data for Today, Yesterday, or Last 7, 14, 30, or 60 days.																																																								
Network	Wi-Fi disconnections	Real-time	Can view data for Today, Yesterday, Last 7, or 14 days.																																																								
	Mobile network usage	Previous day	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.																																																								
	Network latency response time	Previous day	Can view data for Last 7, 14, or 30, days.																																																								
System	Storage usage status	Real-time every every 3 hours.	Can only view data for Today.																																																								
Scan	Scanning performance	Real-time when viewing data for Today , otherwise Previous day.	Can view data for Today, Yesterday, or Last 7, 14, 30, or 60 days.																																																								
KSP	Knox Service Plugin	Real-time	Can only view data for Today.																																																								
Location	Location status	Real-time	Can only view data for Today.																																																								
Security	Warranty bit	Real-time	Can only view data for Today.																																																								
[10C] an interface through which one or more end users or one or more end user communication devices, or one or more carriers, or one	<p>The Accused Knox Products include an interface through which one or more end users or one or more end user communication devices, or one or more carriers, or one or more third parties that provide services to said one or more end users or one or more end user communication devices or said one or more carriers, or one or more wireless communications networks may access said quality or service information or mobile device location information stored in said memory or database.</p> <p>For example, the Knox Cloud Services include the Knox Admin Portal, which is an interface to one or more cloud-based databases or computers with memories of the Knox Cloud Services, through which one or more</p>																																																										

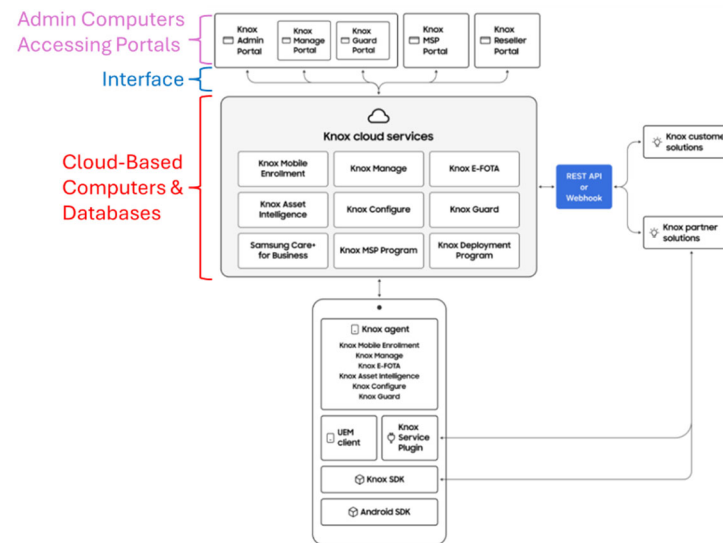
or more third parties that provide services to

said one or more end users or one or more end user communication devices or

said one or more carriers, or

one or more wireless communications networks may access said quality or service information or mobile device location information stored in said memory or database; and

IT administrator end users access signal strength data (e.g., quality or service information) and mobile device location information (e.g., via maps displayed via web portals). This information is collected by the Knox Agent on a mobile communication device and stored in the memories of one or more cloud-based computers and/or cloud-based databases of the Knox Cloud Services. According to Samsung, “[w]ith Knox Cloud Services, enterprise IT administrators can access a range of device management, monitoring, security, and customization solutions for their fleet of devices.” Samsung Knox Documentation, Fundamentals, Introduction, the Big Picture, <https://docs.samsungknox.com/dev/fundamentals/> (last accessed September 2, 2025).



Samsung Knox Documentation, Fundamentals, Introduction, the Big Picture, <https://docs.samsungknox.com/dev/fundamentals/> (last accessed September 2, 2025) (annotated).

The Accused Knox Products provide “[s]torage of device analysis data,” to facilitate “[r]eal-time monitoring of devices,” “[s]upport for audits that verify system events, applied policies, tampering and compliance violations,” and “[s]upport for appropriate actions after audit.” Samsung Knox Documentation, Knox Manage, Introduction, Features and key strengths, <https://docs.samsungknox.com/admin/knox->

[manage/introduction/features-and-key-strengths/#:~:text=Effortless%20content%20management,Storage%20of%20device%20analysis%20data](https://docs.samsungknox.com/admin/knox-manage/introduction/features-and-key-strengths/#:~:text=Effortless%20content%20management,Storage%20of%20device%20analysis%20data) (last accessed September 2, 2025).

Storage of device analysis data

In addition to real-time monitoring of devices, Knox Manage also provides audits. You can verify the events that occur in the system, the policies that were applied, any tampering and compliance violations, and so on, and take appropriate actions against them.

- Real-time monitoring of devices.
- Support for audits that verify system events, applied policies, tampering and compliance violations and so on.
- Support for appropriate actions after audit.

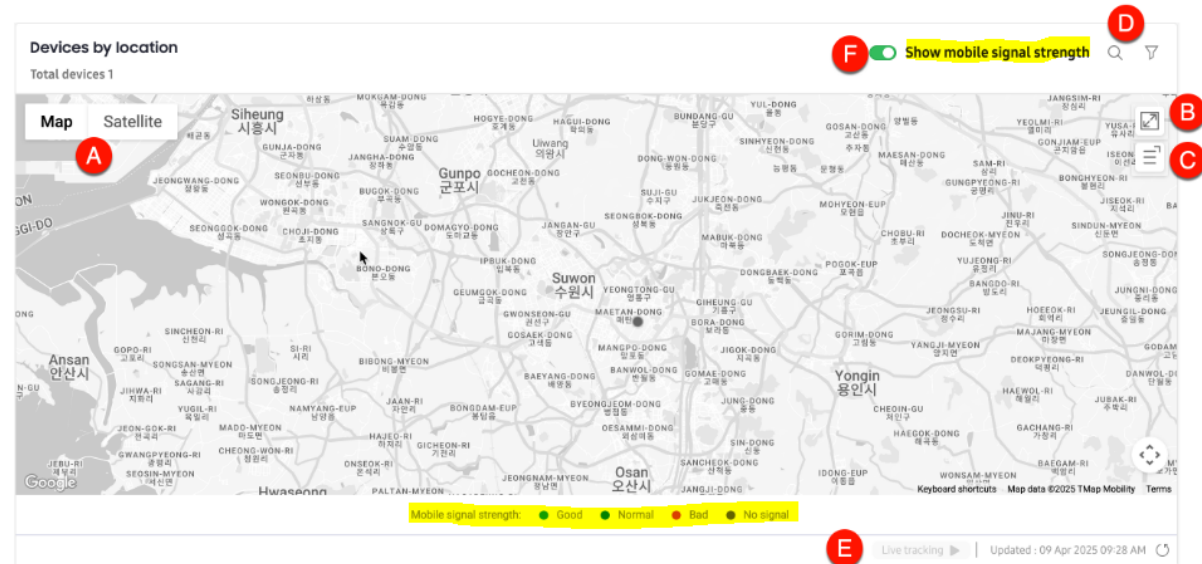
Samsung Knox Documentation, Knox Manage, Introduction, Features and key strengths, <https://docs.samsungknox.com/admin/knox-manage/introduction/features-and-key-strengths/#:~:text=Effortless%20content%20management,Storage%20of%20device%20analysis%20data> (last accessed September 2, 2025).

The stored information includes “mobile signal strength” data (a type of quality of service information for one or more specific locations), which enables the identification of “devices situated in areas with weak cellular coverage or potential dead zones.” Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-dashboard/#:~:text=To%20use%20this%20feature%2C%20you,next%20to%20the%20Search%20icon> (last accessed September 2, 2025).

	<p>F Mobile signal strength Let's you identify when devices are situated in areas with weak cellular coverage or potential dead zones. To use this feature, you must first enable Mobile signal strength with location.</p> <p>On the map, you'll see the mobile signal strength status of every device in your fleet represented by colored dots. These dots are updated at the same rate as your location data collection frequency.</p> <ul style="list-style-type: none"> • Good (green): -70 dBm or higher • Normal (blue): -71 dBm to -80 dBm • Bad (red): -81 dBm to -139 dBm • No signal (grey): -140 dBm or lower, no collection <p>These dots also appear in the map's Device list, letting you quickly correlate the device IDs with each mobile signal strength status. If you want to only show devices with a specific status—for example, only show Bad devices—you can select the status using the map's Filter options next to the Search icon.</p> <p>Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-dashboard/#:~:text=To%20use%20this%20feature%2C%20you,next%20to%20the%20Search%20icon (last accessed September 2, 2025).</p> <p>The Accused Knox Products store information associated with the managed mobile devices in a Knox database so that the information can be accessible to the IT admin through the EMM console.</p> <p>The data storage servers for the KAI service store data associated with the managed mobile devices in a queryable database as well as continuing to monitor, collect, and process, in automated fashion, data associated with the managed devices. The figure below shows the queryable date ranges for specific data stored in the database.</p>
--	--

Location map

The map displays your device groupings (represented by gray circles on the map) as soon as you open the **Location** dashboard. When you zoom in, the circles updates to show the device distribution across a given area.



Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-manage/introduction/features-and-key-strengths/#:~:text=Effortless%20content%20management,Storage%20of%20device%20analysis%20data> (last accessed September 2, 2025).

	<table><tr><th>Data type</th><th>Data insight</th><th>Dashboard update rate</th><th>Available date ranges</th></tr><tr><td>Common</td><td>Device status</td><td>Real-time</td><td>Can only view data for Today</td></tr><tr><td rowspan="4">Battery</td><td>Battery status and state of health</td><td>Real-time</td><td>Can only view data for Today</td></tr><tr><td>Low battery, Battery drain, and Charge events</td><td>Previous day</td><td>Can view data for Yesterday, or Last 7, 14, 30, or 60 days.</td></tr><tr><td>Battery level at shift start</td><td>Real-time when viewing Today's issues, otherwise Previous day.</td><td>Can view data for Yesterday, or Last 7, 14, 30, or 60 days.</td></tr><tr><td>Battery level at shift end</td><td>Previous day</td><td>Can view data for Yesterday, or Last 7, 14, 30, or 60 days.</td></tr><tr><td rowspan="2">App</td><td>App usage</td><td>Previous day</td><td>Can view data for Yesterday, or Last 7, 14, 30, or 60 days.</td></tr><tr><td>App issues</td><td>Real-time sent hourly by default. Can be changed in Dashboard Settings.</td><td>Can view data for Today, Yesterday, or Last 7, 14, 30, or 60 days.</td></tr><tr><td rowspan="3">Network</td><td>Wi-Fi disconnections</td><td>Real-time</td><td>Can view data for Today, Yesterday, Last 7, or 14 days.</td></tr><tr><td>Mobile network usage</td><td>Previous day</td><td>Can view data for Yesterday, or Last 7, 14, 30, or 60 days.</td></tr><tr><td>Network latency response time</td><td>Previous day</td><td>Can view data for Last 7, 14, or 30, days.</td></tr><tr><td>System</td><td>Storage usage status</td><td>Real-time every every 3 hours.</td><td>Can only view data for Today.</td></tr><tr><td>Scan</td><td>Scanning performance</td><td>Real-time when viewing data for Today, otherwise Previous day.</td><td>Can view data for Today, Yesterday, or Last 7, 14, 30, or 60 days.</td></tr><tr><td>KSP</td><td>Knox Service Plugin</td><td>Real-time</td><td>Can only view data for Today.</td></tr><tr><td>Location</td><td>Location status</td><td>Real-time</td><td>Can only view data for Today.</td></tr><tr><td>Security</td><td>Warranty bit</td><td>Real-time</td><td>Can only view data for Today.</td></tr></table> <p>See https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/overview/</p>	Data type	Data insight	Dashboard update rate	Available date ranges	Common	Device status	Real-time	Can only view data for Today	Battery	Battery status and state of health	Real-time	Can only view data for Today	Low battery, Battery drain, and Charge events	Previous day	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.	Battery level at shift start	Real-time when viewing Today's issues , otherwise Previous day.	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.	Battery level at shift end	Previous day	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.	App	App usage	Previous day	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.	App issues	Real-time sent hourly by default. Can be changed in Dashboard Settings.	Can view data for Today, Yesterday, or Last 7, 14, 30, or 60 days.	Network	Wi-Fi disconnections	Real-time	Can view data for Today, Yesterday, Last 7, or 14 days.	Mobile network usage	Previous day	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.	Network latency response time	Previous day	Can view data for Last 7, 14, or 30, days.	System	Storage usage status	Real-time every every 3 hours.	Can only view data for Today.	Scan	Scanning performance	Real-time when viewing data for Today , otherwise Previous day.	Can view data for Today, Yesterday, or Last 7, 14, 30, or 60 days.	KSP	Knox Service Plugin	Real-time	Can only view data for Today.	Location	Location status	Real-time	Can only view data for Today.	Security	Warranty bit	Real-time	Can only view data for Today.
Data type	Data insight	Dashboard update rate	Available date ranges																																																								
Common	Device status	Real-time	Can only view data for Today																																																								
Battery	Battery status and state of health	Real-time	Can only view data for Today																																																								
	Low battery, Battery drain, and Charge events	Previous day	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.																																																								
	Battery level at shift start	Real-time when viewing Today's issues , otherwise Previous day.	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.																																																								
	Battery level at shift end	Previous day	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.																																																								
App	App usage	Previous day	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.																																																								
	App issues	Real-time sent hourly by default. Can be changed in Dashboard Settings.	Can view data for Today, Yesterday, or Last 7, 14, 30, or 60 days.																																																								
Network	Wi-Fi disconnections	Real-time	Can view data for Today, Yesterday, Last 7, or 14 days.																																																								
	Mobile network usage	Previous day	Can view data for Yesterday, or Last 7, 14, 30, or 60 days.																																																								
	Network latency response time	Previous day	Can view data for Last 7, 14, or 30, days.																																																								
System	Storage usage status	Real-time every every 3 hours.	Can only view data for Today.																																																								
Scan	Scanning performance	Real-time when viewing data for Today , otherwise Previous day.	Can view data for Today, Yesterday, or Last 7, 14, 30, or 60 days.																																																								
KSP	Knox Service Plugin	Real-time	Can only view data for Today.																																																								
Location	Location status	Real-time	Can only view data for Today.																																																								
Security	Warranty bit	Real-time	Can only view data for Today.																																																								
[10D] wherein said wireless access characteristics comprise one or more of identified perceived or measured:	The Accused Knox Products receive, analyze, and display wireless access characteristics for one or more mobile devices, wherein said wireless access characteristics comprise one or more of identified, perceived or measured: radio reception quality, network performance, quality of service, data rate, spectrum availability or suitability, capacity or bandwidth, availability or quality of coverage, availability or quality of capacity, availability or quality of one or more services or carriers, availability or quality of air interfaces, average use profile, average availability profile, statistics on outage or reliability or coverage or capacity carrying capabilities for one or more service providers, frequencies, radio frequency or quality of service or coverage																																																										

<p>radio reception quality,</p> <p>network performance,</p> <p>quality of service,</p> <p>data rate,</p> <p>spectrum availability or suitability,</p> <p>capacity or bandwidth,</p> <p>availability or quality of coverage,</p> <p>availability or quality of capacity,</p> <p>availability or quality of one or more services or carriers,</p> <p>availability or quality of air interfaces,</p> <p>average use profile,</p> <p>average availability profile,</p> <p>statistics on outage or reliability or coverage or capacity carrying capabilities for one or more service providers,</p>	<p>or service map or addresses for one or more service providers, radio frequency or end-user application performance, and cost of service.</p> <p>For example, the Accused Knox Products can assess radio reception quality and, upon detecting a weak signal, will cause mobile devices to trigger a roaming scan to avoid frequent retransmissions from lost packets. When the current AP's Received Signal Strength Indicator (RSSI) value is weak (below -75dBm), the device searches for an AP with a stronger signal. <i>See</i> Samsung Knox Documentation, Knox Platform for Enterprise, Knox Platform for Enterprise knowledge base articles, Enhanced roaming algorithm, https://docs.samsungknox.com/admin/knox-platform-for-enterprise/kbas/kba-115013403768/ (last accessed September 11, 2025).</p> <p>There are 3 factors that trigger roaming on a Samsung mobile device:</p> <ol style="list-style-type: none"> 1. Weak signal — Mobile devices trigger a roaming scan to avoid frequent retransmissions from lost packets. When the current AP's Received Signal Strength Indicator (RSSI) value is weak (below -75dBm), the device searches for an AP with a stronger signal. 2. Beacon loss — When beacon packets from a connected AP isn't received after 2 seconds (6 second if the display is OFF), the mobile device considers it a lost beacon and triggers a roaming scan. 3. Channel Utilization (CU) — When multiple clients are connected to the same AP, connectivity may be hindered despite having a strong radio signal due to limited resources. In which case, the AP will notify the clients of its current traffic through the CU factor in its beacon. The mobile device will then trigger a roaming scan if the received CU value is greater than 70 percent and the current RSSI value is between -65dBm and -75dBm. <p>Samsung Knox Documentation, Knox Platform for Enterprise, Knox Platform for Enterprise knowledge base articles, Enhanced roaming algorithm, https://docs.samsungknox.com/admin/knox-platform-for-enterprise/kbas/kba-115013403768/ (last accessed September 11, 2025).</p> <p>The Accused Knox Products also “gather valuable about network performance” and track connectivity issues. Samsung Knox Documentation, Knox Asset Intelligence, Tutorial, Monitor network events, https://docs.samsungknox.com/dev/knox-asset-intelligence/tutorials/monitor-network-events/ (last accessed September 11, 2025).</p>
--	---

frequencies,
radio frequency or
quality of service or
coverage or service
map or addresses for
one or more service
providers,
radio frequency or
end-user application
performance, and
cost of service.

Monitor network events

Last updated May 24th, 2024

The Knox Asset Intelligence APIs enable you to monitor network behavior of devices, allowing you to gather valuable data about network performance and track connectivity issues. This tutorial shows you how to retrieve the details of Wi-Fi connection and disconnection events.

Additionally, connection or disconnection of Wi-Fi leads to an event upload by Knox Asset Intelligence. You can subscribe to corresponding Knox Webhook Notification events to receive notifications for Wi-Fi related activities.

Samsung Knox Documentation, Knox Asset Intelligence, Tutorial, Monitor network events, <https://docs.samsungknox.com/dev/knox-asset-intelligence/tutorials/monitor-network-events/> (last accessed September 11, 2025).

The Accused Knox Products also assess quality of service information, such as “signal strength” data, which enables the identification of “devices situated in areas with weak cellular coverage or potential dead zones.” Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-dashboard/#:~:text=To%20use%20this%20feature%2C%20you,next%20to%20the%20Search%20icon> (last accessed September 2, 2025).

F **Mobile signal strength** Let's you identify when devices are situated in areas with weak cellular coverage or potential dead zones. To use this feature, you must first enable [Mobile signal strength with location](#).

On the map, you'll see the mobile signal strength status of every device in your fleet represented by colored dots. These dots are updated at the same rate as your location data collection frequency.

- **Good (green):** -70 dBm or higher
- **Normal (blue):** -71 dBm to -80 dBm
- **Bad (red):** -81 dBm to -139 dBm
- **No signal (grey):** -140 dBm or lower, no collection

These dots also appear in the map's **Device list**, letting you quickly correlate the device IDs with each mobile signal strength status. If you want to only show devices with a specific status—for example, only show **Bad** devices—you can select the status using the map's **Filter** options next to the Search icon.

Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-dashboard/#:~:text=To%20use%20this%20feature%2C%20you,next%20to%20the%20Search%20icon> (last accessed September 2, 2025).

The Accused Knox Products also assess data rates and quality of capacity in the form of network latencies, which lets IT administrators “see which IP addresses or domains have the longest response time or don’t respond at all to device requests.” Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Network Insights, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/network-insights/network-latency/> (last accessed September 2, 2025).

Network latency

Last updated December 6th, 2023

The **Network latency response times** insight lets you see which IP addresses or domains have the **longest response time** or don’t respond at all to device requests. This data can help you **troubleshoot possible issues related to the application server, for various device groups across the organization**.

Main tile view

Network latency response times

IP/DNS	Test type	Response time
128.0.0.1	TCP	1008
https://www.sam...	TCP	1001
www.knoxtest.com	TCP	990
128.0.0.1	DNS	75
www.knoxtest.com	DNS	74

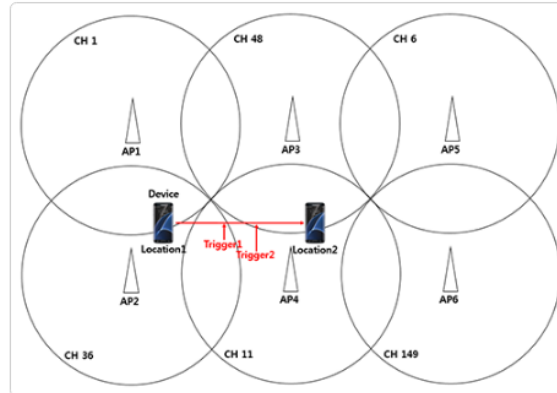
	<p>Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Network Insights, https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/network-insights/network-latency/ (last accessed September 2, 2025).</p>
--	---

The Accused Knox Products also assess spectrum availability and suitability as well as the availability or quality of air interfaces. For example, when a mobile device moves from Location1 to Location2, roaming will be triggered at point, Trigger1 due to a weak RSSI value. *See id.* While the mobile device tries to find a roaming candidate in CH 1 and CH 36 via a partial scan, it is not able to find any other access point from the list other than AP2. Only after a full-scan will the mobile device discover AP3 and AP4 where it will add CH 11 and CH 46 to its roaming channel list after it connects to AP4. *See id.* Having neighbor reports avoids full-scans from such instance from happening. *See* Samsung Knox Documentation, Knox Platform for Enterprise, Knox Platform for Enterprise knowledge base articles, <https://docs.samsungknox.com/admin/knox-platform-for-enterprise/kbas/kba-115013403768/> (last accessed September 2, 2025). Initially, mobile device will save CH 1 and CH 36 in the channel list as it connects to AP2, which is equal to previous case. *See id.* Then, in addition, it will also send a neighbor report request to AP2. AP2 will return a list of nearby AP's, which is AP1, AP2 and AP4. From this response, mobile devices will add CH 11 in its roaming channel list. *See id.*

1. Neighbor Report

As explained in partial scanning section, the mobile device maintains a roaming channel list to reduce scan time. But, there are cases where the device may trigger a full-scan in order to find a roaming AP. In the following diagram, the mobile device initially finds AP1 and AP2 and saves CH 1 and CH 36 in the roaming channel list after connecting to AP2.

When the mobile device moves from Location1 to Location2, roaming will be triggered at point, Trigger1 due to a weak RSSI value. While the mobile device tries to find a roaming candidate in CH 1 and CH 36 via a partial scan, it is not able to find any other AP from the list other than AP2. Only after a full-scan will the mobile device discover AP3 and AP4 where it will add CH 11 and CH 46 to its roaming channel list after it connects to AP4.



Having neighbor reports avoids full-scans from such instance from happening. Initially, mobile device will save CH 1 and CH 36 in the channel list as it connects to AP2, which is equal to previous case. Then, in addition, it will also send a neighbor report request to AP2. AP2 will return a list of nearby AP's, which is AP1, AP2 and AP4. From this response, mobile devices will add CH 11 in its roaming channel list.

As the mobile device moves away from Location1 to Location2, the device will run a partial roaming scan at Trigger1 for CH 1, CH 11 and CH 36. This time, the device finds AP4 from its partial scan and successfully connects to AP4. After roaming success, mobile device will repeat the steps by sending a neighbor request to AP4.

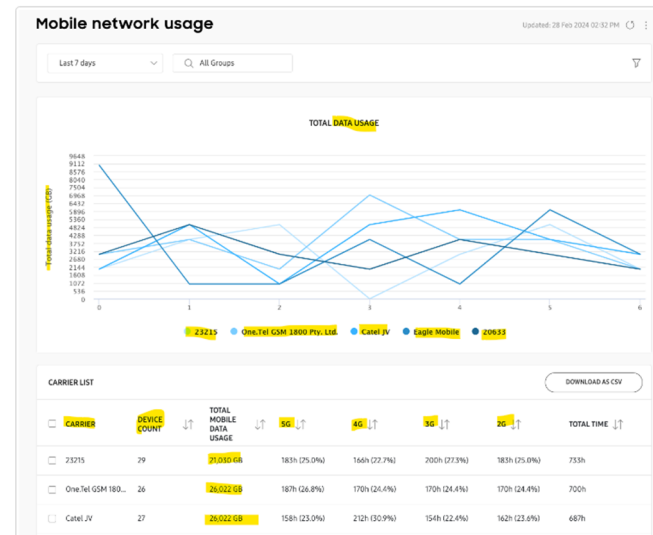
Samsung Knox Documentation, Knox Platform for Enterprise, Knox Platform for Enterprise knowledge base articles, <https://docs.samsungknox.com/admin/knox-platform-for-enterprise/kbas/kba-115013403768/> (last accessed September 2, 2025).

The Accused Knox Products also assess network capacity and bandwidth as well as the availability or quality of one or more services or carriers. For example, the Accused Knox Products monitor the percentage of total carrier usage time associated with each network generation and the cellular usage by carrier. Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Network Insights,

<https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/network-insights/mobile-network-usage/> (last accessed September 2, 2025).

The five carriers with the longest cumulative connection durations are shown, along with the percentage of total carrier usage time associated with each network generation. The information also includes the type of cellular network, the connection duration for each network generation, and the cellular usage by carrier.

Expanded view



The **Mobile network usage** expanded view page features a chart that lists the top 5 mobile carriers with the highest network usage (in GB) over the selected reporting period. Click any carrier name in the legend to show or hide the data on the chart.

In the **CARRIER LIST** table below, you'll see usage data for every carrier that your devices connected to during the selected reporting period. For each carrier, you can view how many devices connected, view the total usage (in GB), and view the total connection time (in hours) for that carrier (with connection time data broken down by network generation (5G, 4G, and so on).

Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Network Insights, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/network-insights/mobile-network-usage/> (last accessed September 2, 2025).

The Accused Knox Products also assess network availability or quality of coverage. For example, the Knox Accused Products monitor signal strength by displaying a real-time graph of a device's mobile or Wi-Fi signal strength within the agent app and on the Location dashboard. Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-dashboard/> (last accessed September 2, 2025). Users can see this data as a graphical representation over the last 10 seconds, helping them identify areas of weak cellular coverage, potential dead zones, or issues with

Wi-Fi connections. *See id.* Signal strength is also displayed as a percentage of good, very good, okay, not good, or unusable based on dBm values in the agent app's Network screen. *See id.* The Accused Knox Products, for example, include "mobile signal strength" data (a type of performance or quality of service information for one or more specific locations), which enables the identification of "devices situated in areas with weak cellular coverage or potential dead zones." *See id.*

F **Mobile signal strength** Let's you identify when **devices are situated in areas with weak cellular coverage or potential dead zones.** To use this feature, you must first enable **Mobile signal strength with location.**

On the map, you'll see the mobile signal strength status of every device in your fleet represented by colored dots. These dots are updated at the same rate as your location data collection frequency.

- **Good (green):** -70 dBm or higher
- **Normal (blue):** -71 dBm to -80 dBm
- **Bad (red):** -81 dBm to -139 dBm
- **No signal (grey):** -140 dBm or lower, no collection

These dots also appear in the map's **Device list**, letting you quickly correlate the device IDs with each mobile signal strength status. If you want to only show devices with a specific status—for example, only show **Bad** devices—you can select the status using the map's **Filter** options next to the Search icon.

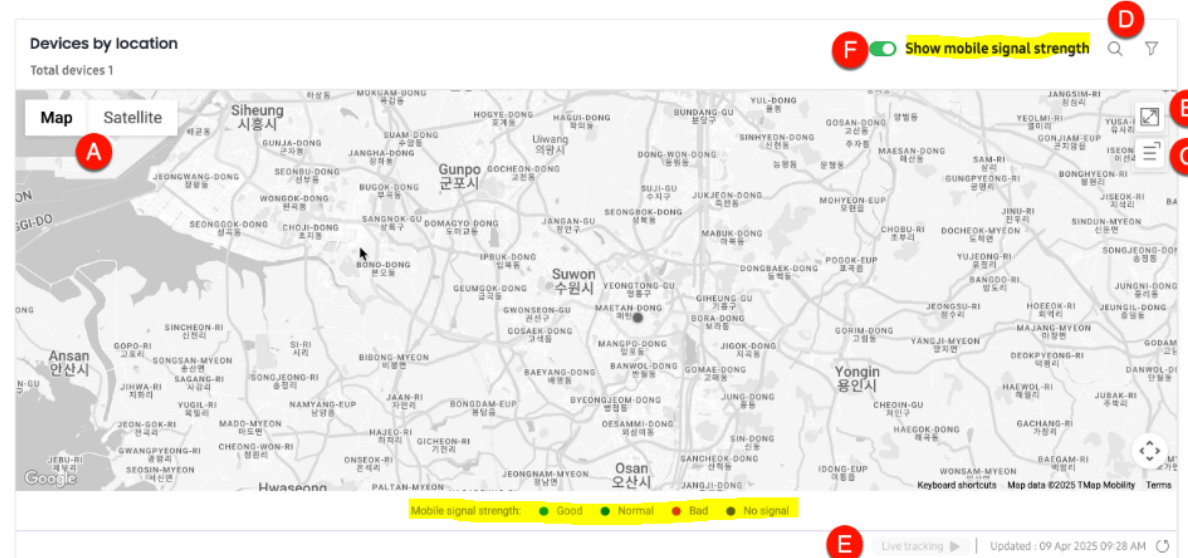
Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-dashboard/#:~:text=To%20use%20this%20feature%2C%20you,next%20to%20the%20Search%20icon> (last accessed September 2, 2025).

The Accused Knox Products further provide admin interfaces, via dashboards (e.g., location dashboards) that include maps of device distributions across a given area. Mobile signal strength data can be displayed via such maps, which enables customers to quickly correlate device IDs with each mobile signal strength statuses. This further illustrates how the Accused Knox Products utilize performance or quality of service information associated with specific locations. *See* Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location->

[dashboard/#:~:text=To%20use%20this%20feature%2C%20you,next%20to%20the%20Search%20icon](#) (last accessed September 2, 2025).

Location map

The map displays your device groupings (represented by gray circles on the map) as soon as you open the **Location** dashboard. When you zoom in, the circles updates to show the device distribution across a given area.



Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-manage/introduction/features-and-key-strengths/#:~:text=Effortless%20content%20management,Storage%20of%20device%20analysis%20data> (last accessed September 2, 2025).

The Accused Knox Products utilize the average use profile and average availability profile for enterprise mobile devices. Such profiles include “a set of policies containing device configurations and settings” that govern how IT administrators “configured [and] control device functions and data.” Samsung Knox Documentation, Home, Knox Manage, Configure / Profile, <https://docs.samsungknox.com/admin/knox-manage/configure/profile/profile/> (last accessed September 11, 2025). These policies can be implemented

based on average statistics for a particular user or group of users, including average network use and/or availability. *See id.*

Knox Manage profiles

The **KNOX MANAGE** tab of the **Profiles** page displays a complete list of Knox Manage (original console) profiles, including profiles created in customers' consoles and profile copies created in the Knox MSP Portal.

The profiles table provides information on:

- **PROFILE NAME** — The name of the profile. Click the name to open the **Profile** page in the customer's Knox Manage console that contains this specific profile.
- **CUSTOMER** — The name of the customer's company.
- **PLATFORM** — The device platform (OS) that the profile was designed for.
- **ORIGIN PROFILE** — If the profile is a copy, this field indicates the original profile it was copied from. Click the name to open the **Profile** page in the customer's Knox Manage console that contains this specific profile.
- **UPDATED** — The date the profile was last modified, including any changes made by the customer on the customer's own console.

You can also generate a CSV file report of all profile information by clicking **DOWNLOAD PROFILE(S) AS CSV**.

Samsung Knox Documentation, Home, Knox MSP Program, How-to-guides / Manage profiles, <https://docs.samsungknox.com/partner/knox-managed-service-provider/how-to-guides/manage-profiles/#knox-manage-profiles> (last accessed September 11, 2025).

Profile

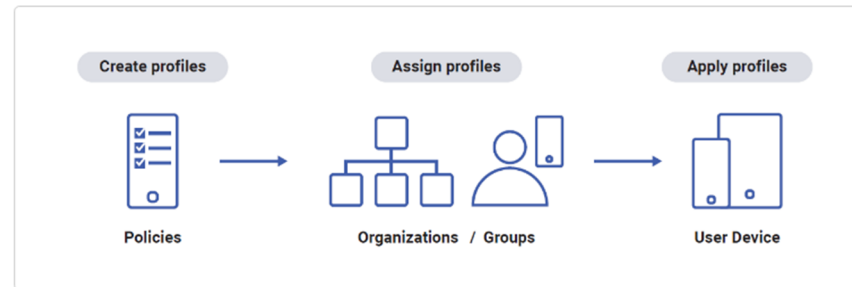
Last updated August 5th, 2025

Caution

Knox Manage supports a multi-profile structure only for Android Enterprise, AMAPI, iOS, Windows, and macOS. If you assign multiple profiles to Wear OS, or Knox Service Plugin, only the highest-priority profile gets applied.

A profile is a set of policies containing device configurations and settings. Profiles allow you to configure policies to control device functions and data — such as the camera, screen lock, Bluetooth, or firewall — quickly and efficiently.

With profiles, you can also install the Wi-Fi, VPN, and Exchange settings for your enterprise on user devices. Furthermore, profiles can be configured to run in specific situations, such as at a specific time, or when the device is running a specific application.



To add policies to a profile, see [Configure profile policies by device platform](#). To link and deploy these policies, see [Assign profiles to groups and organizations](#).

A device can only receive and apply one unique configuration for any given policy at a time. If multiple profiles with conflicting policies are assigned to the same group or organization, the policy from the group or organization with the highest priority gets applied. For instance, if a profile assigned to a group enables camera access, but a different profile assigned to the same group disables it, then the higher-priority profile's camera policy will be applied for the whole group.

Disparate policies from multiple profiles apply if they don't conflict with one other. To configure profile priority, see [Set up the profile priorities](#).

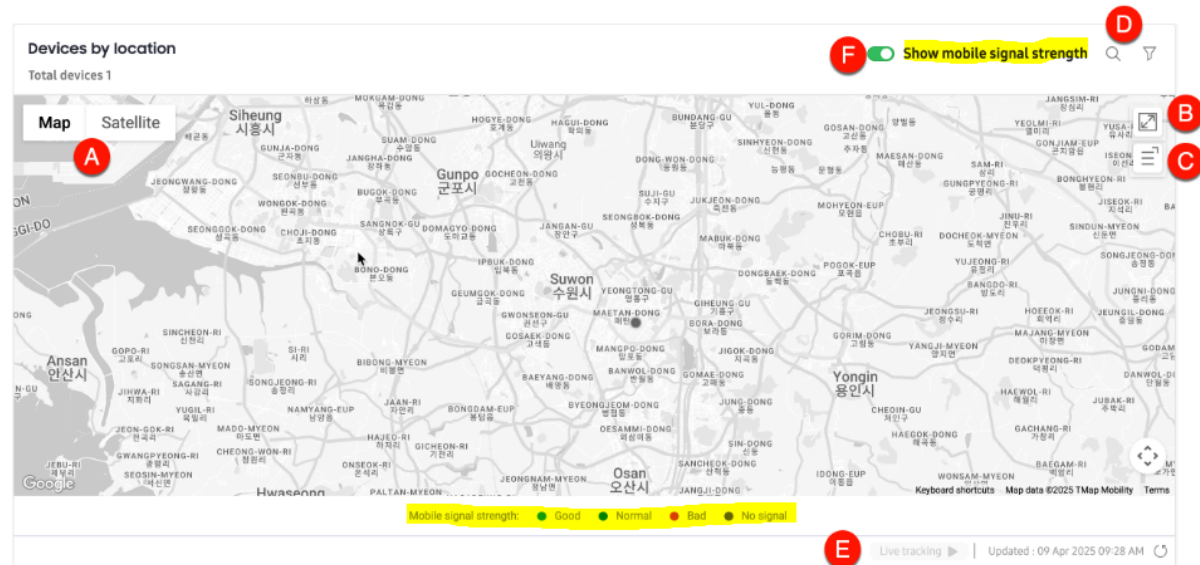
Samsung Knox Documentation, Home, Knox Manage, Configure / Profile,
<https://docs.samsungknox.com/admin/knox-manage/configure/profile/profile/> (last accessed September 11, 2025).

The Accused Knox Products also assess statistics on outage or reliability or coverage or capacity carrying capabilities for one or more service providers, including mobile signal strength data can be displayed via such maps, which enables customers to quickly correlate device IDs with each mobile signal strength statuses. This further illustrates how the Accused Knox Products utilize performance or quality of service information

	<p>associated with specific locations. <i>See</i> Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/location-dashboard/use-the-location-dashboard/#:~:text=To%20use%20this%20feature%2C%20you,next%20to%20the%20Search%20icon (last accessed September 2, 2025). Regarding service provider capacity, the Accused Knox Products also perform “carrier testing” to ensure the service provider “function[s] to the highest capacity on their networks.” Samsung Knox Mobile Security White Paper, Revision 1.0, https://docs.samsungknox.com/admin/fundamentals/whitepaper/samsung-knox-mobile-security/assets/Knox-security-white-paper-r1.pdf (last accessed September 2, 2025). As illustrated below, the Accused Knox Products generate and display maps that include quality of service or coverage or service information for one or more service providers.</p>
--	---

Location map

The map displays your device groupings (represented by gray circles on the map) as soon as you open the **Location** dashboard. When you zoom in, the circles updates to show the device distribution across a given area.

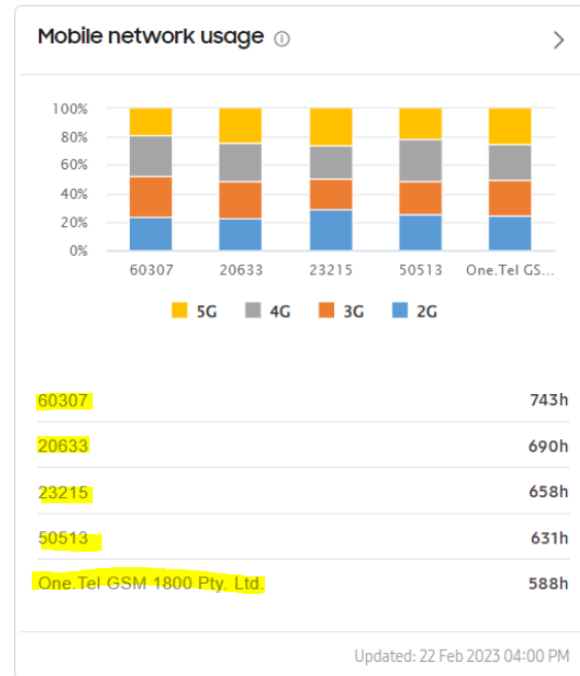


Samsung Knox Documentation, Knox Asset Intelligence, Dashboard, Location dashboard, Use location dashboard, <https://docs.samsungknox.com/admin/knox-manage/introduction/features-and-key-strengths/#:~:text=Effortless%20content%20management,Storage%20of%20device%20analysis%20data> (last accessed September 2, 2025).

4. **Carrier testing** — Device binaries are sent to mobile carriers to ensure they function to the highest capacity on their networks. If issues are identified, the device binary is fixed and retested.

	<p>Samsung Knox Mobile Security White Paper, Revision 1.0, https://docs.samsungknox.com/admin/fundamentals/whitepaper/samsung-knox-mobile-security/assets/Knox-security-white-paper-r1.pdf (last accessed September 2, 2025).</p> <p>The Accused Knox Products also assess different network frequencies, as well as radio frequency or end-user application performance. For example, the Accused Knox Products generate and display performance information for different networks (e.g., 2G, 3G, 4G, 5G), each of which uses a different frequency range. <i>See</i> Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Network insights, https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/network-insights/mobile-network-usage/ (last accessed September 2, 2025).</p>
--	--

The **Mobile network usage** dashboard chart displays **cellular signal information arranged by carrier network**, providing insight into which network generations — 2G, 3G, 4G, and 5G — are used per carrier.



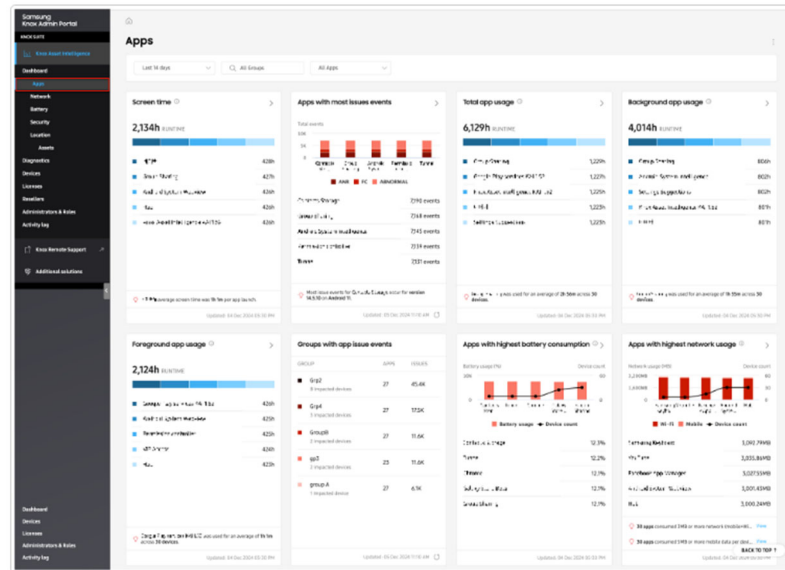
The **five carriers with the longest cumulative connection durations are shown**, along with the percentage of **total carrier usage time** associated with each network generation. The information also includes the **type of cellular network**, the **connection duration** for each network generation, and the **cellular usage by carrier**.

Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Network insights, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/network-insights/mobile-network-usage/> (last accessed September 2, 2025).

The Accused Knox Products also generate and display end-user application performance to help IT administrators “analyze how apps are used” by each mobile device of an enterprise personnel end user. Home, Knox Asset Intelligence, Dashboard, App insights, App usage, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/app-insights/app-usage/overview> (last accessed September 2, 2025). The Knox Asset Intelligence, for example, provides several insights related to which apps are in use, how long they’re in use, and the resources consumed by each app. *See id.*

View app usage insights

There are two ways to view app usage related insights: on the main **Dashboard**, or on the dedicated **Apps** sub-dashboard.



Home, Knox Asset Intelligence, Dashboard, App insights, App usage,
<https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/app-insights/app-usage/overview>
 (last accessed September 2, 2025).

Claim 12	Accused Knox Products
<p>[12] The system of claim 10, further comprising a server configured to generate and serve data based on mobile device location information and quality or service information stored in said memory or database to one or more end users or one or more end user communications devices.</p>	<p>The Accused Knox Products include a server configured to generate and serve data based on mobile device location information and quality or service information stored in said memory or database to one or more end users or one or more end user communications devices.</p> <p>For example, the Accused Knox Products include the one or more cloud-based servers in the Knox Cloud Services configured to take actions that involve the service of data (e.g., profiles, email notifications, lock/unlock commands, alerts, etc.) based on location information (e.g., geofences) and/or quality of service information (e.g., Wi-Fi disconnects). These event thresholds can be based on an internal statistical model. Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Settings, https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/settings/thresholds/ (last accessed September 2, 2025).</p>

Create and associate event types

Last updated August 5th, 2025

To **add an event for a profile**:

1. On the Knox Manage console, go to **Profile**.
2. Click **Add**. The **Add Profile** page opens.
3. Fill the profile details:
 - **Name** — Enter the name of the profile.
 - **Platform** — Choose a device platform.
 - **Description** — Enter a description for the profile.
 - **Event Profile** — Click  to enable events. You can only enable events when adding a new profile. If you want to add events for a profile that already exists, you must add a new profile that includes the same options as the existing profile, and the events.
 - **Event Type** — Choose one of the following event types:
 - **Day & Time**
 - **Application**
 - **Wi-Fi SSID**
 - **SIM Change**
 - **Roaming**
 - **Geofencing**

Samsung Knox Documentation, Home, Knox Manage, Configure, Profile, Set up profiles, Configure events for profiles, <https://docs.samsungknox.com/admin/knox-manage/configure/profile/set-up-profiles/configure-events-for-profiles/create-and-associate-event-types/> (last accessed September 2, 2025).

- **Conditions** — Configure the conditions that cause an event depending on the selected event type. These options show only when the profile has events enabled. For more information about the condition's details, see [Supported platforms by event type](#).
- **Lock Device When Out of Geofencing Area** — **Locks the device when the device is out of the geofencing area.** This option is only available when the **Geofencing** event type is selected. The device automatically unlocks upon reentering the geofencing area.
- **Allow Run Offline** — Allow the profile to be applied to the device even when it is offline. This option appears only if events are enabled. This option only supports the Day & Time, Application, and Geofencing types.
- **Lock Device when changing SIM** — Locks the device when the SIM is changed. This option appears only when the SIM Change type event has been selected.
- **Notification** — Sends a notification to device users when the profile starts or stops being applied. IT admins can now set up the profile to **receive an email notification when devices travel outside or returns to the geofencing area.**

Samsung Knox Documentation, Home, Knox Manage, Configure, Profile, Set up profiles, Configure events for profiles, <https://docs.samsungknox.com/admin/knox-manage/configure/profile/set-up-profiles/configure-events-for-profiles/create-and-associate-event-types/> (last accessed September 2, 2025).

Geofencing	<ol style="list-style-type: none"> 1. For Event Type, select Geofencing. 2. Select Conditions > Add. 3. In the Set Geofencing Condition dialog, choose the center point of the location and the distance around it in meters. 	<p>Applies the profile when the device is located near a specific geographic area.</p> <p>Enter an address to search for, and then Google Maps shows the location, and latitude and longitude automatically.</p> <p>You can also enter a size to view the radius set by the location.</p>	Supported
------------	--	--	-----------

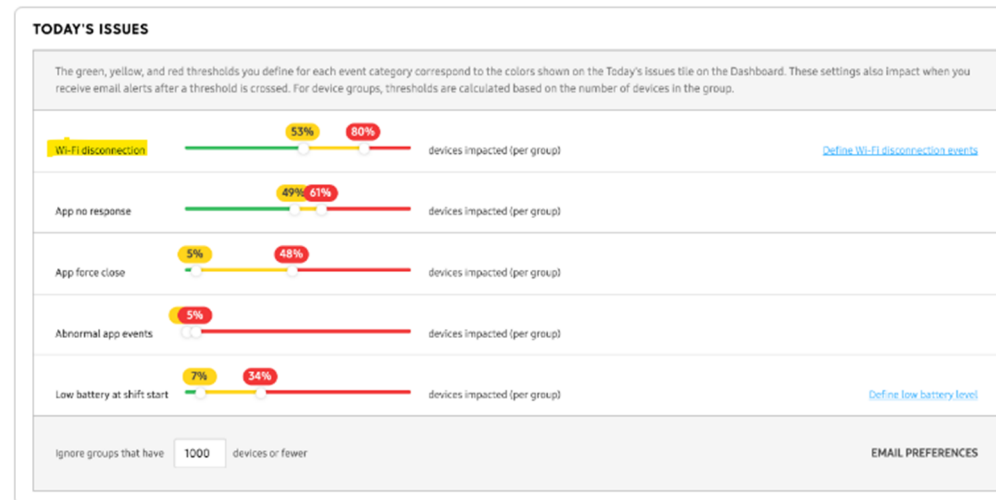
Samsung Knox Documentation, Home, Knox Manage, Configure, Profile, Set up profiles, Configure events for profiles, <https://docs.samsungknox.com/admin/knox-manage/configure/profile/set-up-profiles/configure-events-for-profiles/types-of-events/> (last accessed September 2, 2025).

Thresholds tab

Last updated December 19th, 2024

On the **THRESHOLDS** tab, you can set the conditions for when certain dashboard insights **trigger alerts**.

Today's issues



Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Settings,
<https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/settings/thresholds/> (last accessed September 2, 2025).

Wi-Fi Disconnections

You may want to track whether a certain number of **Wi-Fi disconnection events** are occurring, based on the following conditions:

- BSSIDs (basic service set identifiers) with a certain number of disconnection events, per day
- Devices with a certain number of disconnection events, per day
- Groups that contain devices with a certain number of disconnection events, per day

Enter a number of events as a threshold for each category. This number must exceed 1. **Once the detected number of disconnection events exceeds the threshold, an email alert is triggered.**

In the top-right corner of the **NETWORK** section, enable **Recommended Wi-Fi disconnection thresholds** to have the service **intelligently define Wi-Fi disconnection event thresholds based on an internal statistical model**. This option is only available once Knox Asset Intelligence has collected enough network data from your devices. If you enable the recommended values and save your changes, the existing threshold values are overridden for all admins in your tenant.

Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Settings,
<https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/settings/thresholds/> (last accessed September 2, 2025).

Claim 13	Accused Knox Products
<p>[13] The system of claim 12 wherein said data comprises one or more of a recommended operating band, operating mode, communications network and/or carrier for said one or more end users or one or more of said end user communications devices.</p>	<p>The Accused Knox Products serve data that comprises one or more of a recommended operating band, operating mode, communications network and/or carrier for end users or end user communications devices.</p> <p>For example, the Accused Knox Products serve profiles based on location information (e.g., geofences) and quality or service information (e.g., network availability.) and such profiles control communication settings for enterprise personnel end user mobile devices, such operating bands (e.g., activating Bluetooth, which operates at a different band than Wi-Fi, while disabling Wi-Fi), operating modes (e.g., activating or disabling Bluetooth, Mobile Data, or Wi-Fi) as communications networks (e.g., Bluetooth, Mobile Data, or Wi-Fi, etc.). <i>See</i> Samsung Knox Documentation, Home, Knox Manage, Configure, Profile, Set up profiles, Configure events for profiles, https://docs.samsungknox.com/admin/knox-configure/how-to-guides/profiles/configure-profile-settings/ (last accessed September 2, 2025).</p> <p>With Samsung Knox Configure, IT has granular control over device settings and startup, including an option to disable Android's factory reset option. Knox Configure can set devices to automatically re-enroll after factory reset in the custom configuration created by the IT admin. You can also create a customized startup configuration using predefined profiles and policies for Wi-Fi access, near-field communications (NFC) and Bluetooth. This streamlined process removes many of the common pain points for both employees and administrators.</p> <p>Samsung, Insights, Home, Mobile Security, Device Management, https://insights.samsung.com/2021/03/12/customizing-mobile-devices-with-knox-configure/ (last accessed September 2, 2025).</p>

Wi-Fi

Under **WI-FI**, configure the following settings:

- **Disable Wi-Fi** — Prevents device users and third-party apps to turn on Wi-Fi.
- **Default Wi-Fi settings** — Set the current device Wi-Fi configuration as the default or leave the Wi-Fi **On** or **Off**. Select **Prevent users from changing the Wi-Fi on/off settings** to prohibit users from turning Wi-Fi on or off.
- **Network (optional)** — Enter the **SSID name** and **Password** for the default Wi-Fi network.
- **Advanced Wi-Fi settings** (Dynamic edition only) — Enter an **SSID Name** and select the **Security** setting for this network. If applicable, enter a **Password**. If necessary, a device can connect to a specified network with **Proxy (optional)** credentials delivered by Knox Configure using a proxy to communicate externally. Click **ADD ANOTHER** to set up multiple Wi-Fi profiles.
 - **MAC address type** — Select whether you want to have a **Randomized MAC** address or **Phone MAC** address for connectivity. Phone MAC address makes devices ready to use when company WLAN uses MAC filtering. Default setting is **Keep current settings**. This feature is available on devices with Android-10 or higher.
 - **Disable Wi-Fi network blocking** — Select this option to disable Wi-Fi network blocking for the defined SSID configuration. Samsung devices have Wi-Fi network blocking enabled by default, and disabling Wi-Fi network blocking may reduce AP connection and battery consumption issues for the specified SSID Wi-Fi configuration. This setting is available on Knox 3.5 and above supported devices, and XCover Pro devices running Knox version 3.4.1 and above.

Select **ADVANCED WI-FI** to configure the following settings:

- **Switch to mobile data** allows the device to use mobile data whenever the current Wi-Fi network is identified as slow or unstable.
- **Allow individual apps to switch** allows the device to switch apps to mobile data when a Wi-Fi connection cannot be established.
- **Turn on Wi-Fi automatically** allows the device to enable Wi-Fi in locations where Wi-Fi has been used frequently.
- **Detect suspicious networks** allows the device to receive notifications when suspicious activity is detected on the Wi-Fi network.
- **Wi-Fi power saving mode** reduces battery consumption by analyzing Wi-Fi traffic patterns.
- **Hotspot 2.0** allows the device to connect to Hotspot 2.0-supported access points without requiring a password.
- **Disable proxy settings**
- **Hide QR code**

Each **Advanced Wi-Fi** setting has an **Allow user to change setting** option to either **Allow** device user changes, **Do not allow** user changes or **Do not allow and hide setting from user**. These options can be set independently of each other and are persistent across subsequent logins.

Samsung Knox Documentation, Home, Knox Manage, Configure, Profile, Set up profiles, Configure events for profiles, <https://docs.samsungknox.com/admin/knox-configure/how-to-guides/profiles/configure-profile-settings/> (last accessed September 2, 2025).

Bluetooth

Set the current Bluetooth setting as the default or **turn Bluetooth On or Off** by default.

You can also disable Bluetooth on the device entirely as well as disable the **device's capability to search, connect and share data with other Bluetooth-enabled devices**.

You can also **Disable Bluetooth discoverable mode**.

Mobile data

Configure the following mobile data settings:

- **Turn on mobile data** — **Turn mobile data ON, OFF**, or keep the current setting on the device.
- **Default Data roaming settings** — This setting **permits admins to enable/disable device users from accessing and using carrier data when roaming**. Turn default data roaming either **On, Off**, or **Keep current settings** (default setting). Selecting **On** and using mobile data when roaming could result in additional charges.

Samsung Knox Documentation, Home, Knox Manage, Configure, Profile, Set up profiles, Configure events for profiles, <https://docs.samsungknox.com/admin/knox-configure/how-to-guides/profiles/configure-profile-settings/> (last accessed September 2, 2025).

Roaming

1. For **Event Type**, select **Roaming**.

Applies the profile when the device roams.

2. After you set the policy, depending upon whether you turned on **Notification**, the policy's conditions apply to the device the next time it roams.

If the device cannot communicate with the server temporarily due to roaming, **the profile applies when the communication network becomes available again**, such as when airplane mode is turned off or the device is rebooted.

Samsung Knox Documentation, Home, Knox Manage, Configure, Profile, Set up profiles, Configure events for profiles, Types of events <https://docs.samsungknox.com/admin/knox-manage/configure/profile/set-up-profiles/configure-events-for-profiles/types-of-events/> (last accessed September 2, 2025).

take actions that involve the service of data (e.g., profiles, alerts, etc.) based on location information (e.g., geofences) and/or quality of service information (e.g., Wi-Fi disconnects). These event thresholds can be based on an internal statistical model. Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Settings, <https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/settings/thresholds/> (last accessed September 2, 2025).

- **Conditions** — Configure the conditions that cause an event depending on the selected event type. These options show only when the profile has events enabled. For more information about the condition's details, see [Supported platforms by event type](#).
- **Lock Device When Out of Geofencing Area** — Locks the device when the device is out of the geofencing area. This option is only available when the **Geofencing** event type is selected. The device automatically unlocks upon reentering the geofencing area.
- **Allow Run Offline** — Allow the profile to be applied to the device even when it is offline. This option appears only if events are enabled. This option only supports the Day & Time, Application, and Geofencing types.
- **Lock Device when changing SIM** — Locks the device when the SIM is changed. This option appears only when the SIM Change type event has been selected.
- **Notification** — Sends a notification to device users when the profile starts or stops being applied. IT admins can now set up the profile to receive an email notification when devices travel outside or returns to the geofencing area.

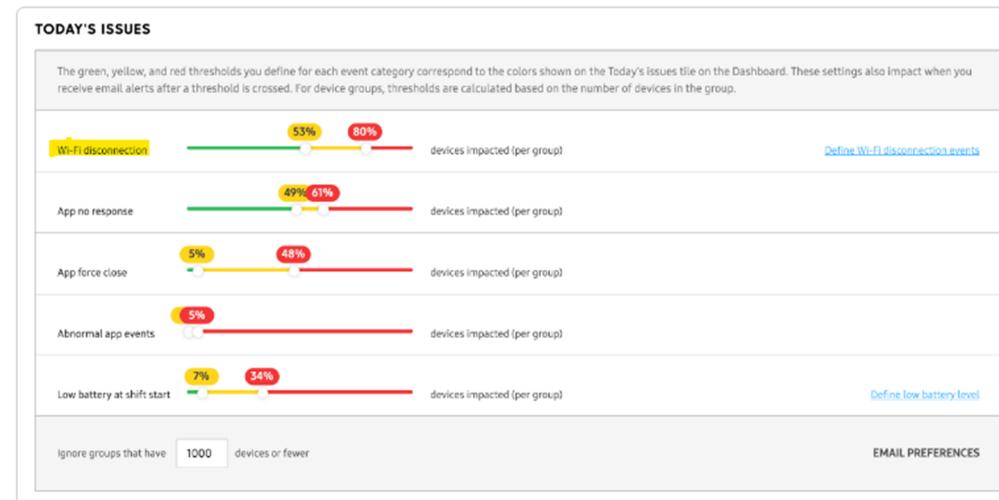
Samsung Knox Documentation, Home, Knox Manage, Configure, Profile, Set up profiles, Configure events for profiles, <https://docs.samsungknox.com/admin/knox-manage/configure/profile/set-up-profiles/configure-events-for-profiles/create-and-associate-event-types/> (last accessed September 2, 2025).

Thresholds tab

Last updated December 19th, 2024

On the **THRESHOLDS** tab, you can set the conditions for when certain dashboard insights **trigger alerts**.

Today's issues



Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Settings,
<https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/settings/thresholds/> (last accessed September 2, 2025).

	<p>Wi-Fi Disconnections</p> <p>You may want to track whether a certain number of Wi-Fi disconnection events are occurring, based on the following conditions:</p> <ul style="list-style-type: none">• BSSIDs (basic service set identifiers) with a certain number of disconnection events, per day• Devices with a certain number of disconnection events, per day• Groups that contain devices with a certain number of disconnection events, per day <p>Enter a number of events as a threshold for each category. This number must exceed 1. Once the detected number of disconnection events exceeds the threshold, an email alert is triggered.</p> <p>In the top-right corner of the NETWORK section, enable Recommended Wi-Fi disconnection thresholds to have the service intelligently define Wi-Fi disconnection event thresholds based on an internal statistical model. This option is only available once Knox Asset Intelligence has collected enough network data from your devices. If you enable the recommended values and save your changes, the existing threshold values are overridden for all admins in your tenant.</p> <p>Samsung Knox Documentation, Home, Knox Asset Intelligence, Dashboard, Settings, https://docs.samsungknox.com/admin/knox-asset-intelligence/dashboard/settings/thresholds/ (last accessed September 2, 2025).</p>
--	--