Network map

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Network map allows to visually determine the hosts connectivity and to get necessary information about hosts and links status and their active events.

There are two possible logical (topology) and geographical (map) views that can be represented with the button on the right top corner.

Topology	Мар				
Figure - View selection					

The logical view is based on logical connections between hosts, the geographical on the actual hosts coordinates



Figure - Logical and geographical views

Notification with the list of hosts that are not indicated on the geographical map displays when you open the map view. In order to view them you need to enter hosts coordinates via web-interface in the section "Settings" \rightarrow "SNMP" (InfiLINK XG), "Basic Settings" \rightarrow "SNMP" (InfiNet Wireless R5000).

⚠	NOTE					
	Geographical view works with Google Maps API. In order to get the correct geographical map operation go to the section "Settings" \rightarrow "System" and enter the key in the field " <i>API key</i> ". The key can be obtained on the website https://console.developers.google.com \rightarrow "Google Maps JavaScript API".					
	Instruction - Obtaining Google API Key.					
		Google maps API:				
		API key :	AlzaSyChWnnnx57bdc63wIT_KOE0			
			Apply			
		Figure - "API key" field				

Represented information

Each network host is represented as a separate point on the map with the name. The point has the following structure:

- external circle color depends on the current host status;
- internal circle color depends on the maximum severity among the unresolved events of the host;
- in the center of the point there is the total number of unresolved events.

Host and link statuses information is updated in real-time.

Hosts clustering

For more convenient monitoring of a large number of hosts, the map performs their automatic joining into the cluster. The cluster is simply a visual object, it does not determine the logical hosts grouping. The more you are zoom out the map view the more number of hosts comes into one cluster, and on the contrary, the more you are zoom in the more number of hosts will be shown as a separate point. Clicking on a cluster will display a list of including hosts.

Title



Figure - Examples with clustering

Monitoring

For detailed information on each host click on it to get properties panel. In this case the host point on the map will be highlighted with a blue circle.



Figure - Host properties

Links are represented as lines, the color of which depends on the connectivity between hosts. For detailed information on required link click on it to get properties panel.

For more convenient work links and hosts can be highlighted and centered on the map with the special button.

		✓ Link Properties: TestDevice-920001 TestDevice-920003		
	MINT, PRF V	Parameter	Value	
		Link Current level, dB	0/0	
		Link Error rate	0/0	
		Link Monitor level, dB	0/0	
		Link Retries, %	0 / 0	
		Link Rx load, kbps	0/0	
		Link Rx packets load, pps	0/0	
		Link Tx bitrate, Mbps	130 / 115	
TestDevice-920002		Link Tx power, dBm	0 / 0	
		Link distance, km	0	
	TestDavice 920005	➤ Host Properties: TestDevice	920001 🔶	
	TestDevice-520005	Parameter	Value	
TestDevice-920001		Board temperature, °C	0	
		CPU Load, %	5	
TestDevice-9	20003 TestDevice-92	00(Description	Simulated R5000 device * 2017-0	
		GPS coordinates	N56.843002 E60.554151	
· · · · · · · · · · · · · · · · · · ·		Hardware model		
		Host name	TestDevice-920001	
		Host status	Up	
		Reboot reason		
		Serial number	920001	
		✓ Host Properties: TestDevice-920003 .		
		Parameter	Value	
		Board temperature, °C	120	
		CPU Load, %	5	
		Description	Simulated R5000 device * 2017-0	
		GPS coordinates	N56.838683 E60.556211	
		Hardware model	special	
		Host name	TestDevice-920003	
		Host status	Up	
		Reboot reason		
		Serial number	920003	
		✓ Last 10 unresolved link even	ts. <u>See all</u>	
		Status Severity	Description	

Figure - Centering button

A list of last 10 unresolved host/link events displays in the properties panel, to view all click on the link "See all". The subsection "Events" with all generated for this host/link events will open.

In order to hide properties panel and to clear highlight from the host or link use the button in the field "Search".

Zoom button allows to zoom in and zoom out the hosts image on the map.



Figure - Zoom setting

The optimum map scale with all visible hosts can be set automatically with the special button in the top left corner.



In this subsection you can also select the link type that should be represented on the map.

By default the information about links "*MINT*", "*PRF*" and "*XG*" is displayed on the map. In order to hide or to display the particular link type use the drop-down list near the "Search" field - "**All links**".



Host search

In order to find the appropriate network host and to point on it use "Search" option.



Figure - Host search

The search can be performed over the following parameters:

- host name;
- host IP address.