

Ethernet Port Power Over Ethernet (POE) PSE settings

If the WaveTunnel device is powered by AC power. The four ethernet ports can be configured to support the POE out. The max. Watt of the total power is limited to 120W. The default PSE is disabled. If you need to power the external device via the WaveTunnel, please configure the proper PSE settings.

[WEB GUI] Configuration-> Network -> Ethernet -> PSE POE

P settings	Link Aggregation settings	VLAN settings	PSE settings		
Port 1					
30 W					
Port 2					
30 W		~			
Port 3					
30 W		~			
Port 4					
30 W					
_					

[Mobile App]

Settings -> POE PSE

POE Out Setting	gs
47210011 - end	Switch
Port 1 Power Disable	÷
Port 2 Power Disable	÷
Port 3 Power Disable	
Port 4 Power Disable	



[CLI] config -> ethernet -> pse

AVS(config-ether	rnet-pse)# ll		
PSE settings			
Description	Attribute Name	Current Value	
Port 1 Power	portl	Disable	
Port 2 Power	port2	Disable	
Port 3 Power	port3	Disable	
Port 4 Power	port4	Disable	
AVS(config-ether Set port1 to 15 PSE settings	rnet-pse)# set port	1 15	
Description	Attribute Name	Current Value	Modified Value
Port 1 Power	portl	Disable	15 (15 W)
Port 2 Power	port2	Disable	
Port 3 Power	port3	Disable	

Update the device settings

General settings

[WEB GUI]

To update the description, location, Country code of the WaveTunnel device on this page.

Config -> General **C**admi □6.6% @60.1% <u>□</u>1.2% 0 Ξ Device settings Refesh Running Configuration Systep Server NTP Server 4 Description VOI AirVine wave tunnel device input the des Santa Clara ~ Country code United States and this country code for this device Save Cancel AirVine Scientific, INC. @ 2022



[Mobile App]

Settings -> General



[CLI]

Config -> device -> general

WS(config-devic				
and the second second	∞) ≠			
telp: general ntp syslog exit WS(config-devic WS(config-devic	- Configure the de - Configure the NT - Configure the Sy - Novigate up one i - Exit Command line w)# (e)# general	vice general settings P server settings slog server settings category e interface		
Nevice general s	ettings	Course in terms		
Name	Attribute Name	drew81		
Description	description	AirVine wave tunnel device		
Benefit aprender				
Country code	countryCode	United States		
Country code	countryCode location	United States		
Country code Location WS(config-devic Set location to Device general s Description	countryCode location e-general)# set lo test ettings Attribute Name	United States	Modified Value	
Country code Location WS(config-devic Set location to Device general s Description Name	countryCode location e-general)# set lo test ettings Attribute Name name	United States	Modified Value	
Country code Location NVS(config-devic Set location to Device general s Description Name Description	countryCode location *-general)# set loc test ettings Attribute Name name description	United States	Modified Value	
Country code Location NVS(config-devic Set location to Device general s Description Name Description Country code	countryCode location *-general)# set loc test ettings Attribute Name name description countryCode	United States	Modified Value	



Syslog settings

To export the log messages to the external syslog server, you can enable the syslog server on this page. The settings include enabled/disable, server address, port.



[WEB GUI] Configuration-> General -> Syslog Server

[Mobile App]

Settings -> Syslog

Syslog settings	
root	¥
Setting Enabled 💿 Disable 🔿	
Server 192.168.31.252	1
Protocol udp () tcp ()	
Port 514	~
Update	



[CLI] Config -> device -> syslog

		eterite	teren al a construction and a const	
WS[config-devic	:e}#			
WS(config-device	- Configure the de - Configure the NTI - Configure the STY - Navigate up one - Exit Command line ce)# syslog	vice general settin P server settings slog server setting category e interface	35. S	
Syslog Server se	ettings			
Description	Attribute Name	Current Value		
Syslog	enabled	Disable		
Description	Attribute Name	Current Value	Modified Value	
Description	Attribute Name	Current Value	Modified Value	
Famme	enouted	102 168 21 253		
Protocol	protocol	TCP		
Port	port	514		
WS(config-devi	:e-syslog)≢ save			



NTP settings

You can configure the NTP settings of the WaveTunnel to synchronize the date time with the external server. It requires that your WaveTunnel can reach the NTP server in your local network or Internet. If there is no NTP server available, the WaveTunnel sync up the date time with the user's client device when they login.

=		47210104	-root v	□ 5.0 %	@ 60.1%	1.2 %	Q.	2
								-
Device se	ttings						ſ	R
							L	
Genera	Syslog Server	NTP Server	Running Configuration					
Status								
O En	abled 🔘 Disable							
Primar	y server							
time	.nist.gov	~						
Backup	p server							
time	.google.com	~						
TimeZ	one							
Ame	erica/Los_Angeles (GN	T-08:00)						
Local 1								
oile App]	ve ØCancel Sett	ings -> NTF						
oile App]	Ve @ Cancel Sett	ings -> NTF	⊃ * -					
oile App]	ve Cancel Sett	33 ings -> NTF	-					
oile App]	Ve Cancel Sett	ings -> NTF						
oile App]	Ve Cancel Sett 3:43 Concel Setting Enabled ©	ings -> NTF	>					
oile App]	Ve Cancel Sett 3:43 vot Setting Enabled Primary Server	ings -> NTF						
oile App]	ve Cancel Setti 3:43 root Setting Enabled @ Primary Server time.nist.gov	ings -> NTF						
oile App]	Ve Cancel Setti 3:43 Concel Setting Enabled Primary Server time.nist.gov Backup Server time.google.	33 ings -> NTF						
oile App]	Ve Cancel Sett 3:43 root Setting Enabled Primary Server time.nist.gov Backup Server time.google. Timezone	ings -> NTF						
oile App]	Ime: 2022/9/23 15:41 ve Cancel Settin root Setting Enabled Primary Server time.nist.gov Backup Server time.google. Timezone America/Los_d	33 ings -> NTF NTP settings Disable O	> ↓ ↓ ↓ × × ×					
oile App]	Ime: 2022/9/23 15:41	33 ings -> NTF NTP settings Disable O com ngeles	> ↓ ↓ ↓ ↓ × ×					
oile App]	Ve Cancel Setting Enabled Primary Server time.nist.gov Backup Server time.google. Timezone America/Los_d	33 ings -> NTF NTP settings Disable O com ngeles Update						
oile App]	Ve Cancel Setting Enabled O Primary Server time.nist.gov Backup Server time.google. Timezone America/Los_A	ings -> NTF TP settings Disable O com ngeles Update						



[CLI] config -> device -> ntp

VS(config-device)						
) <i>w</i>					
elp: general = ntp = syslog = exit = VS(config-device)	Configure the dev Configure the NTP Configure the Sys Navigate up one c. Exit Command line	ice general settings server settings log server settings ategory interface				
TP Server setting	gs					
Description	Attribute Name	Current Value				
NTP	enabled	Enabled				
Primary Server	server1	time.nist.gov				
Backup Server	server2	time.google.com				
Backup Server TimeZone VS{config-device	server2 timezone -ntp)# set server1	time.google.com America/Los_Angeles timel.nist.gov				
Backup Server TimeZone VS(config-device- et server1 to tis TP Server setting Description	server2 timezone -ntp)# set server1 nel.nist.gov gS Attribute Name	time.google.com America/Los_Angeles timel.nist.gov	Modified Value			
Backup Server TimeZone VS(config-device- et server1 to tis TP Server setting Description NTP	server2 timezone -ntp)# set server1 me1.nist.gov ps Attribute Name enabled	time.google.com America/Los_Angeles timel.nist.gov Current Value Enabled	Modified Value			
Backup Server TimeZone VS(config-device- tet server1 to time TP Server setting Description NTP Primary Server	server2 timezone -ntp)# set server1 nel.nist.gov JS Attribute Name enabled server1	time.google.com America/Los_Angeles timel.nist.gov Current Value Enabled time.nist.gov	Modified Value timel.nist.gov			
Backup Server TimeZone VS(config-device- iet server1 to time TP Server setting Description NTP Primary Server Backup Server	server2 timezone -ntp)# set server1 mel.nist.gov JS Attribute Name enabled server1 server2	time.google.com America/Los_Angeles timel.nist.gov Current Value Enabled time.nist.gov time.google.com	Modified Value timel.nist.gov			

Auto persistent settings

There is a mechanism in the WaveTunnel device which you can disable the persistence of configurations. This means the configurations are temporarily stored in memory as "running configuration". It will be lost if you reboot the WaveTunnel device. It's useful if you want to test some new functions. If the device runs into any issue, you can just reboot the device back to the previous good configurations.

[WEB GUI] Configuration-> General ->Running Configuration ->



+ - 0	 Config Guide SA Orall docs • • • • • • • • • • • • • • • • • • •	en Capitora - Geogle Silon 🔹 📄 🗛	rrine - Device Management 🔹 📄 Airline - Dev	ta Managament in 🦓 Songhi) Na Ar Ar			
	= = = = = = = = = = = = = = = = = = =	472101	●	😧 TW 🛅 Alvina 🛅 Kanka	2.0 % @ 60.1 9	E 100 E Inerae E ⊟1.2 % Q	- El divertosenero
0	Device settings						(mar.)
-	Device settings						Refresh
e B	General Syslog Se	ver NTP Server	Running Configuration				
۹	Automatically Persister Enabled Disa	hie					
Ŧ	Save Ø Cano						
B							
144 S							
191						AirVine Scien	tific, INC. © 2022



Config -> autosave

Ø O B allen@allen-unc: -	736
AVS(config)#	
Help:	
device - Sub menu to configure the device settings	
ethernet - Sub menu to configure the ethernet settings	
wavetunnel - Sub menu to configure the wave tunnel settings	
wifi – Sub menu to configure the management WIFI settings	
persist – Save the running configuration permanently	
autoSave – Set if persist the running configuraitons automatically	
user – Sub menu to configure the User settings	
snmp — Sub menu to configure the SNMP settings	
Navigate up one category	
exit – Exit Command line interface	
AVS(config)# autoSave	
Set auto-save option as 'enabled' or 'disabled'	
AVS(config)# autoSave enabled	
The auto-save is set to enabled	
AVS(config)#	



Type "**persist**" command to save the configurations permanently.

😫 🗢 allanigallan-unc: -	7.852
AVS(config)#	
Help:	
device - Sub menu to configure the device settings	
ethernet - Sub menu to configure the ethernet settings	
wavetunnel – Sub menu to configure the wave tunnel settings	
wifi - Sub menu to configure the management WIFI settings	
persist - Save the running configuration permanently	
autoSave - Set if persist the running configuraitons automatically	
user - Sub menu to configure the User settings	
snmp — Sub menu to configure the SNMP settings	
– Navigate up one category	
exit – Exit Command line interface	
AVS(config)# persist	
Persist the running configurations? (v/n): v	
Torona the running configurations (j) (i) (j)	
The running configurations has been saved permanently	
AVS(config)#	



Monitor the WaveTunnel device

There are several pages in the system you can use to monitor the status of your WaveTunnel device. You can check these sections below for more information.

Check the system resource usage

You can check the resource usages of System CPU, Memory, Flash Drive and Temperature on this page

[WEB GUI] Monitoring -> Device -> General

	47210011drew01 ~	🖸 2.0 % - ⊕ 38.7 % 目 0.7 % 🗘 🕹 🗞 admin
Hardware status		
CPU usage	5.0 %	
Memory usage	60.4 %	
Disk usage	1.2 %	
Temperature	System :41 °C CPU :49 °C	



[Mobile App]

Dashboard

You can click the Dashboard widget to see the usage of system resources.







[CLI]

Show -> Device -> Hardware

0 0 0		ssh admin@10.16.113.10
AVS# show		
Incomplete Command: sh	now	
Help: device - Show ethernet - Show wavetunnel - Show wifi - Show events - Show running - Show permanent - Show AVS# show device hardw Device hardware inform	w the device settings w the ethernet interf w the wave tunnel set w the management WIFI w the last n events;U w the running configu w the permanent confi ware mation	ace settings tings settings se 'show events n' rations gurations
Description	Value]
Device Uptime	13 days, 16:39:59	
CPU usage %	5.0	
Memory usage %	61.5	
Disk usage %	1.2	
Device Temperature	System :41 ºC CPU :50 ºC	
AVS#		



Check the accumulated traffics of ethernet ports

Monitoring -> Ethernet

On this page, you can check the accumulated traffic statistics of each ethernet port since last boot up. It includes Bytes sent, Bytes received, Packets sent, Packets received, Error in, Error out, Drop in and Drop out. These values are reset when the system is rebooted.

=		47210104root	-		□ 13.5 %	-∰-61.5% E	∃12% (2
					-	0	-	
Ethernet Port Cor	figurations							
Port Name	Port Ena	ibled Manag	ement Port	Management Vlan	Tru	ink Vlans	Untagge	ed Vlan
Port 1	Yes	No		N/A	N/A		N/A	
Port 2	Yes	No		N/A	N/A		N/A	
Port 3	Yes	No		N/A	N/A	¢.	N/A	
Port 4/Mgmt Port	Yes	No		N/A	N/A	<	N/A	
I Ethernet Doct Stat	listics							
E chemer Poir ata	19069							
Port Name	Bytes Sent	Bytes Received	Packets Sent	Packets Received	Error In	Error Out	Drop In	Drop Out
Port 1	939.1M	508.3M	6,576,269	2,196,766	0	0	0	0
Port 2	0.0B	0.0B	0	0	0	0	0	0
Port 3	0.0B	0.0B	0	0	0	0	0	0
					1.00			

[WEB GUI]



[Mobile App]

USER MANUAL AND CONFIGURATION GUIDE

¢	Etherr	net traffic	
∢> Port 1	∢ ⊷∢ Port 2	∢ > Port 3	<> Port 4
oot			<u> </u>
Byte rece	ived	508.4M	
Byte Sent		939.1M	_
Packet Re	ceived	2,197,024	_
Packet Se	nt	2,197,024	
Drop In		0	_
Drop Out		0	_
Error In		0	_
Error Out		0	

[CLI]

Show -> ethernet -> stats

management - SH internal - SH lag - SH port1 - SH port2 - SH port3 - SH port4 - SH stats - SH	how the manage how the intern how the ethern how the port 1 how the port 2 how the port 3 how the Port 4 how the ethern	ment ip settings al ip settings et port link aggreg: interface interface interface interface et port statistics	ation					
AVS# AVS# show ethernet								
Incomplete Command:	show ethernet							
Help: management — SH internal — SH lag — SH port1 — SH port2 — SH port3 — SH port4 — SH stats — SH	how the manage how the intern how the ethern how the port 1 how the port 2 how the port 3 how the Port 3 how the ethern stats	ment ip settings al ip settings et port link aggregs interface interface interface et port statistics	ation					
Port Name	Bytes sent	Bytes received	Packets sent	Packets received	Error in	Error out	Drop in	Drop out
Port 1	939.3M	508.4M	6,577,115	2,197,537	0	0	0	
								0
Port 2	0.0B	0.05	0	0	9	9	0	9 0
Port 2 Port 3	0.0B 0.0B	0.08 0.05	0 0	0	e 8	e e	0 0	0 0





Check the historical statistic

The WaveTunnel collects the historical statistics every 10 minutes, and the collected data last for 30 days. You can query the TX/RX traffic going through the WaveTunnel connection or ethernet ports with different criteria.

[WEB GUI] Statistics





Check the events and alarms

The System events and user operations are logged in the event database. These events are classified by category, severity and type. You can do the full search or sorting to locate the events you want to check. For some critical events, it will be translated as an alarm to notify the user on the Dashboard banner or sending out the SNMP trap.

[WEB GUI] Events

=		47210104root	-	D89% 6616% E12% C
-				
Event list				
Filter: type string				
Datetime	Category	Severity	Туре	Message
2012.00.73 18 50 31	Suttern		Admin	
2022-09-22 23:28:06	System	Warning	Admin	Backup file 20220831-22-01-39 tar.gz has been deleted
2022-09-22 21:55:38	System		Admin	admin user login successfully
2022-09-22 21:26:46	System		Admin	admin user login successfully
2022-09-22 11:27:42	System		Admin	admin user login successfully
2022-09-19 15:52:16	System	629	Admin	admin user login successfully
2022-09-19 14:36:38	System	(40)	Admin	admin user login successfully
2022-09-17 16:51:22	System	600	Admin	admin user login successfully
2022-09-17 11:47:35	System	CD	Admin	admin user login successfully
2022-09-16 10:40:20	System	646	Admin	admin user logout successfully
2022-09-16 10:35:47	System	(9/a)	Admin	admin user logout successfully
2022-09-16 10:01:56	System	648	Admin	admin user logout successfully
2022-09-16 09:41:17	System	(Web)	Admin	admin user login successfully
2022-09-15 22:34:20	System	60	Admin	admin user login successfully
2022-09-15 17:20:44	System	(476)	Admin	admin user logout successfully
2022-09-15 12:14:48	System	629	Admin	admin user login successfully
2022-09-16 11-54-17	System	(inter	Admin	admin user logout successfully

The alarms shown on the top banner. You can check the list and acknowledge it.

=	47210011dev01 ~	□ 7.5 % 尊 39.1 % 目 0.9 % 🧔	admi
		Recent Alarms	••
Wave Tunnel Network		Ack All Alarms	
		Critical [2022-09-20 03:46:03] downstream tunnel disconnected	
		Critical [2022-09-20 03:45:31] downstream tunnel disconnected	



[Mobile App] Events



The alarms shown on the top banner. You can check the list and acknowledge it.





[CLI]

Show -> events

And a second of					
Y5# SNOW					
incomplete Command: shi	DW .				
elp: device - Show ethernet - Show wavetunnel - Show vifi - Show events - Show permanent - Show VSW show events 10	the device set the ethernet is the wave tunne the wave tunne the last n eve the running co the permanent	ttings interfac el setti t WIFI s ents;Use onfigura configu	e settings ngs ettings 'show event: tions rations	s n*)	
he last 10 events:					
Datetime	Severity	Туре	category	Message	
Datetime 2022-09-23 18:50:31	Severity Info	Type Admin	category System	Message admin user login successfully	
Datetime 2022-09-23 18:50:31 2022-09-22 23:28:06	Severity Info Warning	Type Admin Admin	category System System	Message admin user lögin successfully Backup file 20220031_22_01_39.tar.gz has been deleted	
Datetime 2022-09-23 18:50:31 2022-09-22 23:28:06 2022-09-22 21:55:38	Severity Info Warning Info	Type Admin Admin Admin	category System System System	Message admin user login successfully Backup file 20220831_22_01_39.tar.gz has been deleted admin user login successfully	
Datetime 2022-09-23 18:50:31 2022-09-22 23:28:06 2022-09-22 21:55:38 2022-09-22 21:26:46	Severity Info Warning Info Info	Type Admin Admin Admin Admin	category System System System System	Message admin user login successfully Backup file 20220031_22_01_39.tar.gz has been deleted admin user login successfully admin user login successfully	
Datetime 2022-09-23 18:50:31 2022-09-22 23:28:06 2022-09-22 21:55:38 2022-09-22 21:26:46 2022-09-22 11:27:42	Severity Info Warning Info Info Info	Type Admin Admin Admin Admin Admin	category System System System System System	Message admin user login successfully Backup file 20220031_22_01_39.tar.gz has been deleted admin user login successfully admin user login successfully admin user login successfully	
Detetime 2022-09-22 18:50:31 2022-09-22 23:28:06 2022-09-22 21:55:38 2022-09-22 21:26:46 2022-09-22 11:27:42 2022-09-19 15:52:16	Severity Info Warning Info Info Info Info	Type Admin Admin Admin Admin Admin Admin	category System System System System System System	Message admin user login successfully Backup file 20220831_22_01_39.tar.gz has been deleted admin user login successfully admin user login successfully admin user login successfully admin user login successfully	
Detetime 2022-09-23 18:50:31 2022-09-22 23:28:06 2022-09-22 21:55:38 2022-09-22 21:26:46 2022-09-22 11:27:42 2022-09-19 15:52:16 2022-09-19 14:36:38	Severity Info Warning Info Info Info Info Info	Type Admin Admin Admin Admin Admin Admin	category System System System System System System System	Message admin user login successfully Backup file 20220831_22_01_39.tar.gz has been deleted admin user login successfully admin user login successfully admin user login successfully admin user login successfully admin user login successfully	
Datetime 2022-09-23 18:50:31 2022-09-22 23:28:06 2022-09-22 21:55:38 2022-09-22 11:25:46 2022-09-22 11:27:42 2022-09-19 15:52:16 2022-09-19 14:36:38 2022-09-17 16:51:22	Severity Info Warning Info Info Info Info Info Info	Type Admin Admin Admin Admin Admin Admin Admin	category System System System System System System System System	Message admin user login successfully Backup file 20220831_22_01_39.tar.gz has been deleted admin user login successfully	
Datetime 2022-09-23 18:50:31 2022-09-22 23:28:06 2022-09-22 21:55:38 2022-09-22 11:26:46 2022-09-22 11:27:42 2022-09-19 15:52:16 2022-09-19 14:36:38 2022-09-17 11:47:55	Severity Info Warning Info Info Info Info Info Info Info	Type Admin Admin Admin Admin Admin Admin Admin Admin	category System System System System System System System System	Message admin user login successfully Backup file 20220831_22_01_39.tar.gz has been deleted admin user login successfully admin user login successfully	



User Login

) AIR**VINE**

This is the page for the user to login to the management interface. The user authentication is provided by the Linux user database and the default user is "admin". You can create more admin users based on your needs.

I	Type the http://Imar	agement IP address	sl on	vour browser
	i ypo ano map.//[mai	agomont i aaaroot	J 011	your bromoor

AIRV	INE	
Login		
요 admin	4	
θ	5 0	
	Login	



[Mobile App]

Select the device you want to connect via WIFI or management IP.



Input the username and password to login the Mobile App.





[CLI] Use SSH client or Serial cable to connect to the CLI.



User Logout

There is a button on WEB GUI and Mobile for the user to logout the system. The user session is cleared after the logout.

[WEB GUI] - Logout

=	47210019drew02 ~	🗆 1.0 % 🎄 41.9 % 🗐 0.4 % 🖓 🗞 ad	dmin
		Account	
Change password		✓ Logout A Change passwo	ard
C		O change public	iu.

[Mobile App] - Logout





[CLI] - Logout

For CLI, type "exit" to logout the console.

0 • •	allen@Allens-Mac-mini:-/bin
AVS> enable Password: AVS#	
Help: show - Show the device status config - Enter configuration menu firmware - Enter firmware menu operation - Enter operation menu Navigate up one category exit - Exit Command line interface	
AVS# exit Do you want to exit CLI? (y/n)? y Connection to 10.16.113.10 closed. allen@Allens-Mac-mini >~/bin	

Change the user password

You can change the password on this page



Current			
New	√ ₽		
Repeat	√ ₽		



[Mobile App] – Change Password





[CLI] – Change Password

VS(config)#
lelp:
device - Sub menu to configure the device settings
ethernet - Sub menu to configure the ethernet settings
wavetunnel - Sub menu to configure the wave tunnel settings
wifi – Sub menu to configure the management WIFI settings
persist - Save the running configuration permanently
autoSave - Set if persist the running configuraitons automatically
user - Sub menu to configure the User settings
Navigate up one category
exit - Exit Command line interface
WS(config)# user
WS(config-user)#
lelp:
list – List admin users
add - Add admin user
delete - Delete admin user
password - Update the user password
Navigate up one category
exit - Exit Command tine interface
VS(config-user)# password
input your current password:
input your new password:

Change the enable password of CLI

For CLI, there are two levels of command set. To enter the second level, you need to input the "enable" password. The default password is blank but you can change it via the following commands.

• • •	allen@allen-unc: ~
AVS>	
Help:	
deviceinfo – Show the device general information enable – Enter 'enable' for enable mode;'enable pass ping – Ping destination ip. Ex: ping 8.8.8.8 traceroute – Trace route to destination ip. Ex: tracerou – Navigate up one category exit – Exit Command line interface	sword' to change the password ute 8.8.8.8
AVS> enable password	
Input the current enable password:	
Input the new enable password: admin	
Repeat the new enable password: admin	
Enable password is updated AVS>	



Add New User

Add a new admin user to the connected WaveTunnel device.

E	47210019drew02 ~	□ 2.0 % 傳 41.9 % 目 0.4 % ↓
▦		Add User F
To add the new user, input	the user name and password and click	
[Save] to add it.		
User Name	~	
User password	C2 🚱	
Repeat	N	
represe	65	
Save Cancel		
Save Cancel	Last Login	
password Save Save Name admin	Last Login 2022-09-19 02:20:29	
Save Cancel Name admin	Last Login 2022-09-19 02:20:29	
Save Cancel	Last Login 2022-09-19 02:20:29	
Ssword	Last Login 2022-09-19 02:20:29	
Save Cancel Name admin	Last Login 2022-09-19 02:20:29	
password	Last Login 2022-09-19 02:20:29	
password	Last Login 2022-09-19 02:20:29	
password	Last Login 2022-09-19 02:20:29	



Delete User

Delete a new admin user from the connected WaveTunnel device.

_	47210011room1 ~	
=		
		Add User Refres
Name	Last Login	
admin	2022-09-20 04:04:52	
test1	N/A	Delete
test2	N/A	Delete

System Operations

Reboot the WaveTunnel device

To reboot the WaveTunnel device, you can issue the request from the interfaces below. It takes a few minutes for the WaveTunnel device to come back.



[WEB GUI]

Operations-> System Operations-> Reboot

Reboot		
Reboot the device.		
Reboot		



[Mobile App] Settings -> Reboot

11:16			÷ =
≡ Set	tings		
Node	Upstream	Downstream	n
Ethernet	Port set	tings	
Management	CD LAG	Ports	Mirroring
Device se	ettings		
General	Ō NTP	Syslog	© WIFI settings
System C	peration	าร	
1 Firmware	Reboot	Reset	pa
ф	Ŧ	🔅 Settings	ä



[CLI] Operation-> reboot

	100	aufr adamine (10.16.112.10	100
AVS> en Passwor AVS# op AVS(ope	able d: eration ration)#		
Help:	reboot - reset -	- Reboot the device - Factory reset the device	
	diag - log -	Execute troubleshooting command - Log files commands	
	backup - restore -	Backup the device configurations - Restore the device configurations	
	mirror -	Port mirroring settings - Navigate up one category	
	exit -	Exit Command line interface	
AVS(ope	ration)# r	reboot	
Do you	want to re	boot this device? (y/n):	

Reset the WaveTunnel device

To reset the WaveTunnel device, you can issue the request from the interfaces below. To be aware that all the configurations and user data will be lost after this reset operation.

[WEB GUI] Operations-> System Operations-> Reset

Reset			
Factory reset the device.			
Reset			
	r	T	
	Conf	irmation	
	Are you sur configuratio after s		
	No	Voc	



[Mobile App] Settings -> Reset



[CLI] Operation -> reset





Backup the configurations of the WaveTunnel device

On this page, you can back up the configurations of the WaveTunnel device for future use.For example, rollback to the earlier settings or restore it to another replacement device. You can also download the backup file to your local computer to avoid losing the configurations if the device runs into the abnormal state. The max. Number of configurations that can be backup is up to 10.

[WEB GUI] Operations-> System Operations-> Backup

Backup and Restore	Refresh
To backup all settings, including system and network configurations etc.click[backup] and select to open or save the backup file.	

To "Download","Restore" or "Delete" the backup file, please click the button in the selected row.					
Number	Name	Size	Datetime		
1	20220919_04_46_07.tar.gz	1.4K	2022-09-19 04:46:07	Download Restore Delete	
2	20220919_04_46_09.tar.gz	1.4K	2022-09-19 04:46:09	Download Restore Delete	

[CLI] Operation -> backup

operatio	on-backup)#		
o: exec del	ist - List out the current tute - Execute the backup co lete - Delete the backup fi Navigate up one cate exit - Exit Command line in	backup ommand le gory terface	files
(operatio	on-backup)# execute ng leading '/' from member n	names	
kup the d (operatio	evice configurations succe n-backup)# list	ssfully	
kup the d (operatio	levice configurations succes on-backup)# list Name	ssfully Size	Datetime
kup the c (operatic Number 1	levice configurations succes on-backup)# list Name 20220831_22_01_39.tar.gz	Size	Datetime 2022-08-31 22:01:40
kup the c (operation) Number 1 2	levice configurations succes n-backup)# list Name 20220831_22_01_39.tar.gz 20220914_18_04_11.tar.gz	Size 1.0K	Datetime 2022-08-31 22:01:40 2022-09-14 18:04:11



Restore the configurations from the Backup file

[WEB GUI]

Operations-> System Operations-> Restore

Upload the backup file from your laptop.

To upload the backup file, click [Browse] to select a previously saved backup file and click [Upload] to confirm.	
Choose File No file chosen	
Upload	

Restore the configurations from the old backup file.

Number	Name	Size	Datetime			
1	20220919_04_46_07.tar.gz	1.4K	2022-09-19 04:46:07	Download	Restore	Delete
2	20220919_04_46_09.tar.gz	1.4K	2022-09-19 04:46:09	Download	Restore	Delete

[CLI] Operation-> restore

AVS(operation	on-restore)#			
Help: exec AVS(operatio	list – List out the current cute – Restore the device co – Navigate up one categ exit – Exit Command line int on-restore)# list	backup fi onfigurati gory terface	iles ion from the backup fil	le
Number	Name	Size	Datetime	
1	20220914_18_04_11.tar.gz	1.0K	2022-09-14 18:04:11	
2	20220922_23_27_52.tar.gz	1.0K	2022-09-22 23:27:52	
AVS(operation Please spection AVS(operation	on-restore)# execute ify the number of backup fil on-restore)# execute 1	le you war	nt to restore	



Diagnostic and troubleshooting

Checking the Status of the WaveTunnel connections

To check the status of the connections of WaveTunnel devices, there are several pages you can visit to get the information. See the explanations in the following sections.

[WEB GUI] Tunnel Topology

Check the status of connections of your devices and how they are connected. Mouse hover to the device or the link to see more information.



You can check the upstream/downstream tunnel metrics from the "Monitoring-> Wave Tunnel" page.



tream tunnel sta ower NR over Gi64 acket Error Rate ICS eam Index eam Index iem Temperature o Temperature	ntus > Noise = (PER)	-20.00 dBm 27.25 dB 21.50 dB 0.12 % 12 12 33		Downstream Rx Power Rx Average S Ratio Rx SNR over I Rx Packet Err Tx MCS Rx MCS	tunnel status ignal to Neise Gi64 or Rate (PER)	N/A N/A N/A N/A		
ower werage Signal to p NR over Gi64 acket Error Rate CS tCS eam Index eam Index eam Index iem Temperature	> Noise • (PER)	-20.00 dBm 27.25 dB 21.50 dB 0.12 % 12 12 33		Rx Power Rx Average S Ratio Rx SNR over I Rx Packet Err Tx MCS Rx MCS	ignal to Noise 5854 or Rate (PER)	N/A N/A N/A N/A		
verage Signal to n NR over Gi64 acket Error Rate MCS HCS eam Index leam Index leam Temperature to Temperature	> Noise + (PER)	2725 dB 2150 dB 0.12 % 12 12 33		Rx Average S Ratio Rx SNR over (Rx Packet Err Tx MCS Rx MCS	ignal to Noise Gi64 or Rate (PER)	N/A N/A N/A N/A		
NR over Gi64 acket Error Rate ICS eam Index eam Index eam Index iem Temperature	(PER)	21.50 dB 0.12 % 12 12 33		Rx SNR over (Rx Packet Err Tx MCS Rx MCS	Gi64 or Rate (PER)	N/A N/A N/A		
acket Error Rate ICS eam Index eam Index em Temperature	(PER)	0.12 % 12 12 33		Rx Packet Err Tx MCS Rx MCS	or Rate (PER)	N/A N/A		
ICS eam Index eam Index em Temperature to Temperature		12 12 33		Tx MCS Rx MCS		N/A		
ICS eam Index eam Index om Temperature o Temperature		12 33		Rx MCS				
eam Index eam Index em Temperature o Temperature		33				N/A		
eam Index em Temperatur o Temperature				Tx Beam Inde	x	N/A.		
em Temperatur		34		Rx Beam Inde	ox	N/A		
o Temperature	*	62 °C		Modern Temp	erature	62 *0	c	
		81ºC		Radio Temper	rature	67 %	¢	
Nave tunnel traffi	ic							
rt Name	Bytes Sent	Bytes Received	Packets Sent	Packets Received	Error	Error Out	Drop In	Drop Out
stream Tunnel	603.6M	405.3M	4,991,695	4,009,107	0	0	0	D
wnstream nnel	0.08	0.0B	D	0	0	0	0	268,6
	Vave tunnel traff rt Name stream Tunnel wnstream inel	Vave tunnel traffic rt Name Sent stream Tunnel 503.6M wnstream 0.0B	Neve tunnel traffic rt Name Bytes Bytes Sent Received stream Turnel 503.6M 405.3M wnstream 0.0B 0.0B	Neve funnel traffic rt Name Bytes Bytes Packets stream Turnel 503.6M 405.3M 4.991,685 wnstream 0.0B 0.0B 0	Veve tunnel traffic rt Name Bytes Bytes Packets Packets Received stream Turnel 503.6M 405.3M 4,991,685 4,009,107 wnstream 0.0B 0.0B 0 0	Neve tunnel traffic rt Name Bytes Bytes Received Sent Received In stream Turnel 503.6M 405.3M 4,991,695 4,009,107 0 wmstneam 0.0B 0.0B 0 0 0 0	Bytes Sent Bytes Received Packets Sent Packets Received Error Out stream Turnel 503.6M 405.3M 4.991,685 4,009,107 0 0 wnstream 0.0B 0.0B 0 0 0 0	Bytes sent Bytes Received Packets Sent Packets Received Error Inn Error Out Inno stream Turnel 503.6M 405.3M 4991,695 4.009,107 0 0 0 wnstream 0.0B 0.0B 0 0 0 0 0

You can also check the realtime traffic widgets on the Dashboard to see the traffic/bandwidth of your wave tunnel connections.





[Mobile App]

Click the button to check the WaveTunnel connection status in the Topology Screen





From Dashboard, you can check the real time traffic/bandwidth passing through the WaveTunnel connections.



Check the upstream connection metrics



11-12		
(Upstream t	unnel status	
ifth		4
Rx Power	-30.00 dBm	
Rx Average SNR	26.75 dB	
Rx SNR over Gi64	18.75 dB	
Rx PER	9.63 %	
Tx MCS	6	
Rx MCS	9	
Tx Beam Index	28	
Rx Beam Index	25	
Modem Temperature	51 °C	
Radio Temperature	63 °C	

Check the downstream connection metrics



1112		
C Downstream	tunnel status	
ifth		4
Rx Power	-33.50 dBm	
Rx Average SNR	19.75 dB	
Rx SNR over Gi64	19.50 dB	
Rx PER	0.68 %	
Tx MCS	4	
Rx MCS	11	
Tx Beam Index	34	
Rx Beam Index	26	
Modem Temperature	51 °C	
Radio Temperature	61 °C	
		_

[CLI]

show wavetunnel stats show wavetunnel upstatus show wavetunnel downstatus



0 • •	ssh admin@10.16.113.10 🥼	
AVS# show wavetunnel		
Incomplete Command: sho	w wavetunnel	
Help:	the use to see 1 and a set the se	
node - Snow	the wave tunnel node settings	
downstream - Show	the downstream wave tunnel settings	
upstream - Snow	the upstream wave tunnet settings	
stats - Show	the wave tunnet statistics	
upstatus - Show	the upstream wave tunnet status	
downstatus - Show	the downstream wave tunnel status	
AVS#		

Ping Test

You can run a "Ping" test to check if the traffic can be sent to the destination.

[WEB GUI]

System > Operations > Diagnostic > Ping





	📕 Cardy Guide De-Card Boox - 🗴 📔 Picture Capture - Doogle Silon 🗴 👘 Article - Doole Manager	w x Arthur - Denie Haragene	e x +		-
+ + a	0 A http://www.com.com/com/com/com/com/com/com/com/com/com/	9.6	a - 🔞 🔳 🖣 🖬 🖣		
	≡ 47210104root ~		口 1.0 % 袋 58.6 %	目1.4% 章	admin
æ					
-	Device troubleshooting tools				
曲	Ping Traceroute Traffic test				
0	IP/Domain 8.8.8.8 Test	Clear			
19 19 19	PING 8.8.8.8 (8.8.8) 56(64) bytes of data. 64 bytes from 8.8.8.8: icmp_seq=1 ttl=116 time=8.64 mi 64 bytes from 8.8.8.8: icmp_seq=2 ttl=116 time=7.86 mi 64 bytes from 8.8.8.8: icmp_seq=3 ttl=116 time=7.85 mi 64 bytes from 8.8.8.8: icmp_seq=4 ttl=116 time=7.73 mi 64 bytes from 8.8.8.8: icmp_seq=4 ttl=116 time=7.73 mi				
	8.8.8.8 ping statistics 5 packets transmitted, 5 received, 0% packet loss, time rtt minjøvg/max/mdev = 7.626/7.943/8.638/0.358 ms	4005ms			
>					

[CLI]

o e e atlenjaden-unc: -	THE
AVS>	
Help:	
deviceinfo - Show the device general information	
enable - Enter 'enable' for enable mode; 'enable password' to change the passwo	rd
ping - Ping destination ip. Ex: ping 8.8.8.8	
traceroute - Trace route to destination ip. Ex: traceroute 8.8.8.8	
– Navigate up one category	
exit – Exit Command line interface	
AVS> ping 8.8.8.8	
PING 8.8.8.8 (8.8.8.8) 56(84) bytes of data.	
64 bytes from 8.8.8.8: icmp_seq=1 ttl=116 time=8.34 ms	
64 bytes from 8.8.8.8: icmp_seq=2 ttl=116 time=7.49 ms	
64 bytes from 8.8.8.8: icmp_seq=3 ttl=116 time=7.80 ms	
64 bytes from 8.8.8.8: icmp_seq=4 ttl=116 time=7.75 ms	
64 bytes from 8.8.8.8: icmp_seq=5 ttl=116 time=7.76 ms	
8.8.8.8 ping statistics	
5 packets transmitted, 5 received, 0% packet Loss, time 400/ms	
rtt min/avg/max/mdev = /.489//.82//8.340/0.2/8 ms	
AVS>	

Traceroute Test

You can run a "Traceroute" test to check how the packets are routed to the destination.

[WEB GUI]





[CLI]

	atherspatien-save: -	
AVS>		
Heln:		
ne cp.	device info - Show the device general information	
	enable - Enter 'enable' for enable mode 'enable password' to change the password'	
	ning - Ding destingtion in Ev. ping 8 8 8	
	pring - Fing descrimetron ap. LA. pring 0.00000	
	- Naviate in one category	
	evit - Fixit Command Line interface	
	EXIC - EXIC Command Cline Interrace	
AV/S>	traceroute LAL google com	
trace	chalter build www.google.com (142,251,32,228), 64 hone may	
1	10.16.113.1.1.206mc 0.300mc 0.467mc	
2	102 169 1 254 1 83 mc 1 65 mc 0 425 mc	
3	104.7.64.1 3.487ms 2.757ms 1.871ms	
4	71 148 140 226 5 486mc 3 380mc 3 741mc	
5	12,242,105,110,12,346ms,7,384ms,7,811ms	
6	* * :	
7	32,130,26,233 6,104ms 4,197ms 3,875ms	
8	12.255.10.242 8.450ms 6.320ms 6.860ms	
9	* * *	
10	108.170.242.241 9.389ms 7.320ms 7.902ms	
11	108.170.242.237 9.910ms 7.741ms 7.912ms	
12	72.14.237.160 8.400ms * 9.704ms	
13	142.250.237.174 15.328ms 13.226ms 16.866ms	
14	142.250.238.28 23.667ms 22.088ms 21.896ms	
15	142.250.208.140 47.549ms 46.258ms 45.829ms	
16	108.170.231.6 48.558ms 46.116ms 47.112ms	
17	108.170.228.85 48.232ms 45.126ms 44.950ms	
18	108.170.240.193 46.362ms 44.206ms 44.952ms	
19	142.251.60.135 46.586ms 44.076ms 43.829ms	
20	142.251.32.228 47.331ms 46.357ms 45.840ms	
AVS>		
AVS>		

Traffic Test

There is an internal tool in the WaveTunnel we can use to generate the traffic on the WaveTunnel connections.

[WEB GUI]

System > Operations > Diagnostic > Traffic Test

Specify the criteria and traffic direction before generating the traffic and monitor the result on the widgets.



		47210104	- root -					
=		1. 2 10 10 4				6.0 % @ 58.6 9	% <u>⊟</u> 13% 0	(O ^{ad}
Device troubles	nooting tools							
	-	10000						
Ping ina	teroute tra	inc test						
Wave Tunnel	Traffic Test							
Connecti	n							
O upstr	earn 🔘 downe	stream						
Direction								
O Rx	⊖ Tx : ◯ Tx/R	tw.						
Duration								
O 3 min	utes 🔿 5 min	utes 🔘 10 n	ninutes					
Start T	annel Traffic	Stop Tunnel	Traffic					
	1	and the second second						
11 mate	eam traffic stat	us						
opsu								
opsu								
Mbps								
Mbps								
Mape								
Mbps 1.500	9 9	<u>ş</u>	8 8	g 8	P2 6		8 2	-
Mbps 1509	8 8	9	8 8	§ R Last x second	12 S		8 2	
Mbps 1500	9	90	8 8	g 3 Last x second	12 S	1 1	A 2	

[Mobile App] Monitoring > Link Traffic

Specify the criteria before generating the traffic and monitor the result on the widgets.



10:24		- -	
< Wave Tunnel	Traffic T	est	
root			ν
Wave tunnel U	patream (tx		
g 0.3 0 now taxin age	2 Dinin		insta
Wave tunnel Do			
0 naw taka aya	. Zmin	allin - 2	Imin
Connection Upstream 💿 Downstr	ream ()		
Direction RX	0		-
Duration 3 mins (e) 5 minis (C)) 10 minis	0	
Start Traffic	Stop	Traffic	Ť.

Mirroring the Ethernet Port traffic

For the troubleshooting purposes, this function provides the capability to mirror the packets on a specific port to another port in the local or neighboring device. To be aware, the settings are not persisted which are cleaned up after system reboot.

[WEB GUI] System > Operations > Port Mirroring

Local Port Mirroring

Operations-> Port Mirroring-> Local



A THE STORE DI. R. H. HARDEN		
	47210019drew02 *	□ 10 % ⊕ 41.7 % 目 0.5 % ♀
Port Mirroring Settings		R
Local Mirroring Rem	ote Mirroring	
Status	Disable	
Capture Port	N/A	
Mirror Port	N/A	
Capture Port		
Port 1	-	
Please select the capture por		
Mirror Port		
Port 4		
Please select the mirror port		
Enable Disable		
		AirVine Scientific, 1

Remote Port Mirroring

Operations-> Port Mirroring-> Remote



	47730030 dam03	
	47210019drewoz *	0.5% @ 417% 0 0.5% 0
Port Mirroring Settings		
Local Mirroring Ren	note Mirroring	
Status	Disable	
Send Node	NJA	
Capture Port	N(A	
Receive Node	NGA	
Mirror Port	NUA	
Sender Node		
Prevase select the sender no	de	
Capture Port		
Port 1		
Please select the capture pl	vt	
Receiver Node		
drew01		
Please select the receiver n	ode	
Mirror Port		
Port 4	~	

[Mobile App]

Settings > Mirroring > Local Mirroring



63	63
Local Mirror	Remote Mirror
oot	
Status	Disable
Capture Port	N/A
Mirror Port	N/A
Capture Port Port 1	-
Mirror Port Port 2	
Enable	Disable

Settings > Mirroring > Remote Mirroring



< Port Mir	roring Settings
수 > Local Mirror	 ←> Remote Mirror
oot	¥
Status	Disable
Send Node	N/A
Capture Port	N/A
Receive Node	N/A
Mirror Port	N/A
Send Node root	Capture Port • Port 1 •
Receive Node fourth	Mirror Port • Port 4 •
Enable	Disable

[CLI]

AVS(operation-mirror-local)#



	atergater-set: -	
disable . exit	– Disable the local port mirroring – Navigate up one category – Exit Command line interface	
AVS(operation-mi AVS(operation-mi	rror-local)# irror-local)#	
Help:		
list enable disable exit	 Show the local port mirroring settings Enable the local port mirroring Disable the local port mirroring Navigate up one category Exit Command line interface 	
AVE / on or ration and	ree lealté anbla	
wystoperacion-mi	(rror-tocal) w enable	
Which port for c 1 (Port 1) 2 (P	aptureing packets? ort 2) 3 (Port 3) 4 (Port 4) [0 to exit]1	
Which port for m 1 (Port 1) 2 (P	irroring packets? Port 2) 3 (Port 3) 4 (Port 4) [0 to exit]4	
The local port m	irroring has been enabled	
Local Port Mirro Status: Enabled	riog:	
Capture Port	Mirror Port	
Port 1	Port 4	
AVS(operation-mi	.rror-local)#	
-		

AVE (appending mi		adhery@cathere cansi :	
Avs(operation-mi	rror-local)#		
Help: list enable disable exit	- Show the local pr - Enable the local - Disable the local - Navigate up one o - Exit Command line	ort mirroring settings port mirroring i port mirroring sategory s interface	
AVS(operation-mi	rror-local)# list		
Local Port Mirro Status: Enabled	ring:		
Capture Port	Mirror Port		
Port 1	Port 2		
AVS(operation-mi Disable the loca	rror-local)# disabl	le (v/n): v	
AVS(operation-mi Disable the loca The local port m Local Port Mirro Status: Disable	rror-local)# disabl l port mirroring? (irroring has been c ring:	le y/n): y jisable	
AVS(operation-mi Disable the loca The local port m Local Port Mirro Status: Disable Capture Port	rror-local)# disab l port mirroring? d irroring has been o ring: Mirror Port	ie y/n): y jisable	



AVS(operation-mirror-remote)#

0.00		alter	ografiee-weer -		
AVS(operation- AVS(operation-	-mirror)# remote -mirror-remote)#				
Help: lis enab disab ex:	st – Show the rem le – Enable the ro le – Disable the – Navigate up it – Exit Command	ote port mirro emote port mir remote port mi one category line interface	ring settings roring rroring e		
AVS(operation-	-mirror-remote)# (enable			
which node for 1 (root) 2 (s	r captureing pack second) 3 (third)	ets? 4 (fourth) 5	(fifth) 6 (sixth)) [0 to exit]1	
Which port for 1 (Port 1) 2	r captureing pack (Port 2) 3 (Port	ets? 3) 4 (Port 4)	[0 to exit]1		
Which mode for 1 (root) 2 (s	r mirroring packe second) 3 (third)	ts? 4 (fourth) 5	(fifth) 6 (sixth)	[0 to exit]3	
Which port fo 1 (Port 1) 2	r mirroring packe (Port 2) 3 (Port	ts? 3) 4 (Port 4)	[0 to exit]3		
The remote po	rt mirroring has (been enabled			
Remote Port M: Status: Enable	irroring: ed				
Send Node	Capture Port	Recv Node	Mirror Port		
root	Port 1	third	Port 3		
AVS(operation-	-mirror-remote)#				





	- 0 - 0		s⊜allan-unz: –	. (Sw2)
AVS(operation-	-mirror-remote)#			
Help: lis enabl disabl ex: AVS(operation-	st – Show the remu le – Enable the re le – Disable the re le – Navigate up o t – Exit Command -mirror-remote)#	ote port mirro emote port mir remote port mir one category line interface list	ring settings roring rroring	
Remote Port M; Status: Enable	irroring: ed			
Send Node	Capture Port	Recv Node	Mirror Port	
root	Port 1	third	Port 3	
AVS(operation- Disable the re The remote por Remote Port Mi Status: Disabl	mirror-remote)# (mote port mirror: rt mirroring has i lrroring: le	iisable ing? (y/n): y been disable		
Send Node	Capture Port	Recv Node	Mirror Port	
N/A	N/A	N/A	N/A	
AVS(operation-	-mirror-remote)#			

Download the Support Logs

You can download the support logs from this page and send it to Airvine support for further investigations.

[WEB GUI]

System > Operations > System Operation > Download Logs





Fermites	Save As: support	
Desktop	Tags:	
Downloads	C > C + C + C + C + C + C + C + C + C +	Q Search
Cloud Cloud Drive Documents Desktop Shared	Today way 5552custbill05182022.pdf IMG_2C505D1E2C6A-1.jpeg KeyboardCleanTool.zip	
Locations Google Drive Network Tage	April algorithmic-tcompress.pdf beyond-the-bcompress.pdf Birth certificate.PDF enterprise-arth-python.pdf ccn_01.2 bird	
OrangePurple	New Folder	Cancel



Appendix 1 Event/Alarm Code Definition

```
{
 "101": {
  "description": "update configuration successfully",
  "type": "Admin",
  "severity": "Info",
  "notification": "False",
  "category": "Configuration"
 },
 "102": {
  "description": "update configuration failed",
  "type": "Admin",
  "severity": "Error",
  "notification": "True",
  "category": "Configuration"
 },
 "103": {
  "description": "country code changed",
  "type": "Admin",
  "severity": "Warning",
  "notification": "False",
  "category": "Configuration"
 },
 "104": {
  "description": "timezone changed",
  "type": "Admin",
  "severity": "Warning",
  "notification": "False",
  "category": "Configuration"
 },
 "105": {
  "description": "user added",
  "type": "Admin",
  "severity": "Info",
  "notification": "False",
  "category": "User"
 },
 "106": {
  "description": "user deleted",
  "type": "Admin",
  "severity": "Info",
```



```
"notification": "False",
 "category": "User"
},
"107": {
 "description": "configuration backup",
 "type": "Admin",
 "severity": "Info",
 "notification": "False",
 "category": "Configuration"
},
"108": {
 "description": "configuration restored successfully",
 "type": "Admin",
 "severity": "Warning",
 "notification": "False",
 "category": "Configuration"
},
"109": {
 "description": "configuration restored failed",
 "type": "Admin",
 "severity": "Error",
 "notification": "True",
 "category": "Configuration"
},
"110": {
 "description": "Device support log files have been downloaded",
 "type": "Admin",
 "severity": "Info",
 "notification": "False",
 "category": "System"
},
"111": {
 "description": "firmware upgraded successfully ",
 "type": "Admin",
 "severity": "Info",
 "notification": "False",
 "category": "System"
},
"112": {
 "description": "firmware upgraded failed",
 "type": "Admin",
 "severity": "Error",
 "notification": "True",
 "category": "System"
},
```



```
"113": {
 "description": "firmware image corrupted",
 "type": "Admin",
 "severity": "Error",
 "notification": "True",
 "category": "System"
},
"114": {
 "description": "Configuration rollback",
 "type": "Admin",
 "severity": "Warning",
 "notification": "False",
 "category": "Configuration"
},
"115": {
 "description": "Change primary firmware blank",
 "type": "Admin",
 "severity": "Info",
 "notification": "False",
 "category": "System"
},
"116": {
 "description": "Change primary firmware blank failed",
 "type": "Admin",
 "severity": "Critical",
 "notification": "True",
 "category": "System"
},
"117": {
 "description": "Download the firmware image from server",
 "type": "Admin",
 "severity": "Info",
 "notification": "False",
 "category": "System"
},
"118": {
 "description": "Download the firmware image from server failed",
 "type": "Admin",
 "severity": "Warning",
 "notification": "False",
 "category": "System"
},
"119": {
 "description": "Delete the firmware image file from the device",
 "type": "Admin",
```





```
"severity": "Info",
 "notification": "False",
 "category": "System"
},
"120": {
 "description": "Download the backup file",
 "type": "Admin",
 "severity": "Info",
 "notification": "False",
 "category": "System"
},
"121": {
 "description": "Delete the backup file",
 "type": "Admin",
 "severity": "Warning",
 "notification": "False",
 "category": "System"
},
"122": {
 "description": "Set DHCP IP failed",
 "type": "Admin",
 "severity": "Critical",
 "notification": "True",
 "category": "System"
},
"201": {
 "description": "high CPU usage",
 "type": "Device",
 "severity": "Critical",
 "notification": "False",
 "category": "System"
},
"202": {
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 "type": "Device",
 "severity": "Critical",
 "notification": "False",
 "category": "System"
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"203": {
 "description": "insufficient disk space",
 "type": "Device",
 "severity": "Critical",
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 "category": "System"
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"301": {
 "description": "upstream tunnel disconnected",
 "type": "Device",
 "severity": "Critical",
 "notification": "True",
 "category": "System"
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"302": {
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 "type": "Device",
 "severity": "Critical",
 "notification": "True",
 "category": "System"
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"303": {
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 "type": "Device",
 "severity": "Warning",
 "notification": "False",
 "category": "System"
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"304": {
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"305": {
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 "notification": "False",
 "category": "System"
},
"306": {
 "description": "downstream tunnel connected",
 "type": "Device",
 "severity": "Info",
 "notification": "False",
 "category": "System"
},
"401": {
 "description": "new wifi client",
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"type": "Device",
 "severity": "Info",
 "notification": "False",
 "category": "User"
},
"402": {
 "description": "management SSID disable",
 "type": "Admin",
 "severity": "Warning",
 "notification": "False",
 "category": "Configuration"
},
"501": {
 "description": "device reboot",
 "type": "Admin",
 "severity": "Info",
 "notification": "False",
 "category": "System"
},
"502": {
 "description": "device critical reboot",
 "type": "Device",
 "severity": "Warning",
 "notification": "False",
 "category": "System"
},
"601": {
 "description": "user login success",
 "type": "Admin",
 "severity": "Info",
 "notification": "False",
 "category": "System"
},
"602": {
 "description": "use login failed",
 "type": "Admin",
 "severity": "Warning",
 "notification": "False",
 "category": "System"
},
"603": {
 "description": "user logout",
 "type": "Admin",
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"category": "System"
 },
 "604": {
  "description": "Add User",
  "type": "Admin",
  "severity": "Info",
  "notification": "False",
  "category": "System"
 },
 "605": {
  "description": "Delete User",
  "type": "Admin",
  "severity": "Info",
  "notification": "False",
  "category": "System"
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}
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