



AW-IHT-1271

Industrial VivoCam L2+
Managed PoE Switch



L2+ Managed Gigabit Ethernet • Managing IP Surveillance •
Surge Protection 6KV • -40°C ~ 75°C

The AW-IHT-1271 is an Industrial 8-port Gigabit PoE port (Supports 802.3 at/af, and total up to 240W) + 4-port Gigabit SFP L2 plus managed PoE switch with a wide operating temperature range from -40°C to 75°C and supports surge protection per port up to 6KV. The AW-IHT-1271 combines high hardware performance and environmental flexibility for use in outdoor surveillance, outdoor telecom, heavy industry, factory automation and transportation applications.

The AW-IHT-1271 supports surveillance features such as Topology/ Floor/Map views for controlling, understanding network topology and device status. It not only features surveillance network environment set up functions, but also troubleshooting and traffic monitoring functions which help users to clarify and troubleshoot any connection and device issue. In addition, the AW-IHT-1271 also supports Rapid ring, a redundancy proprietary protocol with convergence time within 20ms and up to 250 switches.

Key Features

Managing IP Surveillance

- The Root VivoCam Will Auto-Sync With All VivoCam Sub Switches
- Auto Discovery and Classification of Network Devices
- Batch Camera Configuration - File Import & Export
- Batch Camera Network/Login Configuration
- Auto Generated Surveillance Topology View
- Easy Tag VLAN Configuration in Topology View
- Smart Device-Management in Topology View
- PoE On/Off Control in Topology View
- Display IP Camera Live Stream in Topology View, Floor View and Google Map View
- Supports Discovery of ONVIF IP Cameras

Layer 2 Feature

- Supports DHCP Server
- Supports IPv4/IPv6 L3 Static Route
- Supports IEEE802.1Q VLAN (up to 4096), Double Tag (Q-in-Q)
- Supports IEEE802.1v Protocol VLAN and MAC-based VLAN
- Supports Rapid Ring with Convergence Time within 20ms and up to 250 Switches
- Supports 802.1d (STP), 802.1w (RSTP) and 802.1s (MSTP)
- Supports IEEE802.3ad Link Aggregation Control Protocol (LACP)
- Supports SNMP v1/v2c/v3 for Management
- Supports Access Control List (ACL)

Feature Highlight - Managing IP Surveillance

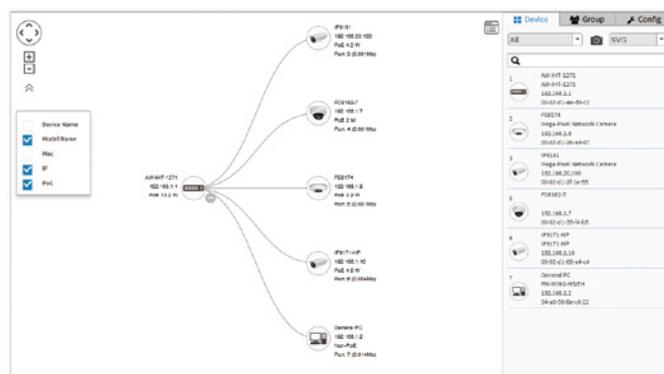
Auto Discovery

AW-IHT-1271 can automatically discover any IP devices such as network cameras, video servers, CMS and NVR with a simple click of the mouse.

Remove	Status	Device Type	Model Name	Device Name	MAC	IP Address
	Online	IP Camera	FE8174	Mega-Pixel Network Camera	00-02-01-2A-51-26	192.168.40.80
	Online	IP Camera	FD8154V	Mega-Pixel Network Camera	00-02-01-30-06-4E	192.168.40.83
	Online	IP Camera	IP8384	Mega-Pixel Network Camera	00-02-01-29-87-05	192.168.40.85
	Online	IP Camera	FD8162-F2	Mega-Pixel Network Camera	00-02-01-28-F9-8C	192.168.40.86
	Online	IP Camera	FD8382C	Mega-Pixel Network Camera	00-02-01-21-29-05	192.168.40.88
	Online	IP Camera	IB8308-H	IB8308-H	00-02-01-2F-99-81	192.168.40.89
	Online	IP Camera	FD8173-H	Mega-Pixel Network Camera	00-02-01-30-56-8F	192.168.40.94
	Online	IP Camera	CC8130	Mega-Pixel Network Camera	00-02-01-1D-21-83	192.168.40.95
	Online	IP Camera	IP8333H	Mega-Pixel Network Camera	00-02-01-23-23-E7	192.168.40.96
	Online	IP Camera	IZ8301-CH	IZ8301-CH	00-02-01-43-80-52	192.168.40.97

Graphical View - Topology View

Auto-generated Topology View allows administrators to quickly view and export a complete network topology in SVG/PNG/PDF format for easier inspection and planning.



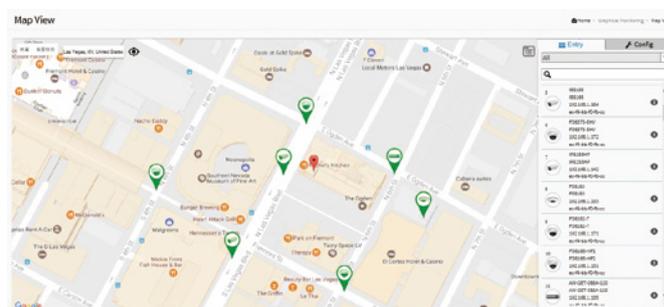
Graphical View - Floor View

Upload custom floor images. Floor View allows for quick location of deployed surveillance devices and for export of this view in SVG/PNG/PDF formats for easier inspection and planning.



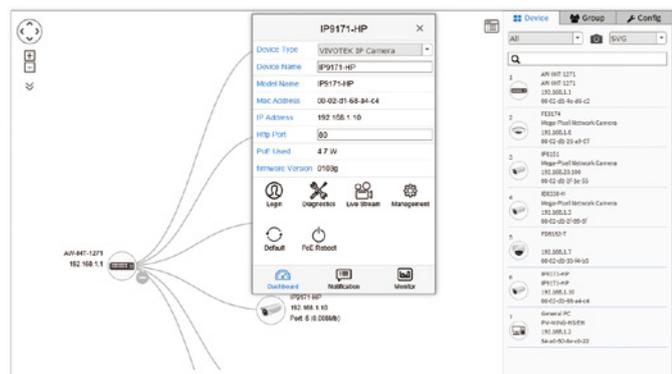
Graphical View - Google Map

Locate surveillance devices on Google map to simplify multi-site management of any large scale deployments.



Device Management

Easy Network Configuration, Open Camera Web UI, Diagnose Camera Connection and Cable Status, Display Camera Live Stream, Change Camera Network Setting, Restore Default, PoE consumption, PoE on/off control.



Device Status

Device Status page to show the real-time verification result of each connection between switch port and device.

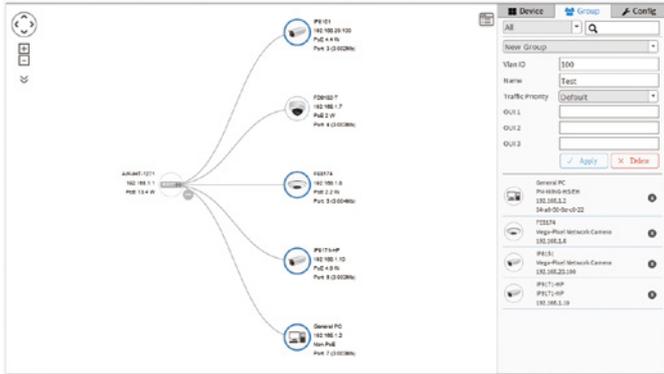
Select	Status	Model Name	Device Name	MAC	IP Address	Version
<input type="checkbox"/>	Online	IB8168	Mega-Pixel Network Camera	00-02-01-2D-45-0F	192.168.1.7	0100e

192.168.1.17	00-02-e7-1c-a2-07	Connection...	Cable status...
192.168.1.1	00-02-e1-26-45-0f		

Feature Highlight - Managing IP Surveillance

Easy-Tag VLAN

Hierarchical topology view allows administrators to easily build a VLAN.



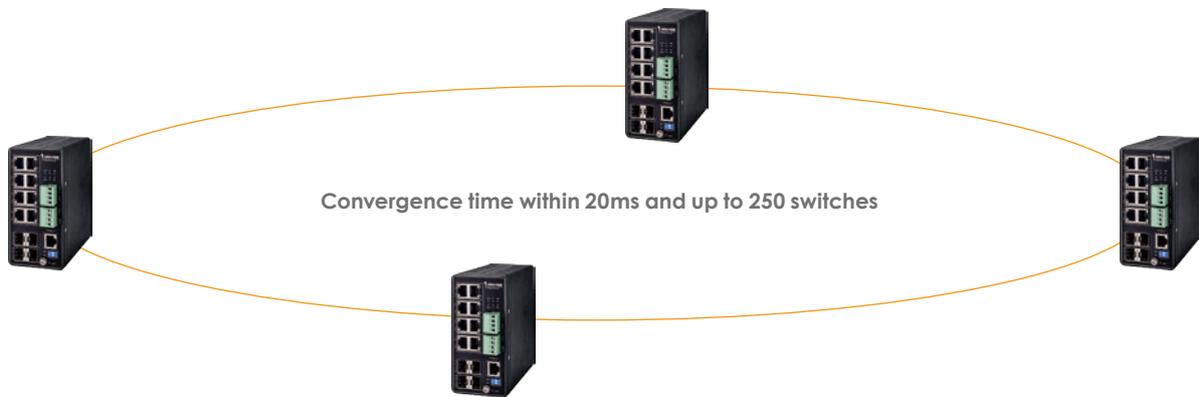
Live Stream

Display live streaming camera window in Topology View, Floor View and Google Map View.

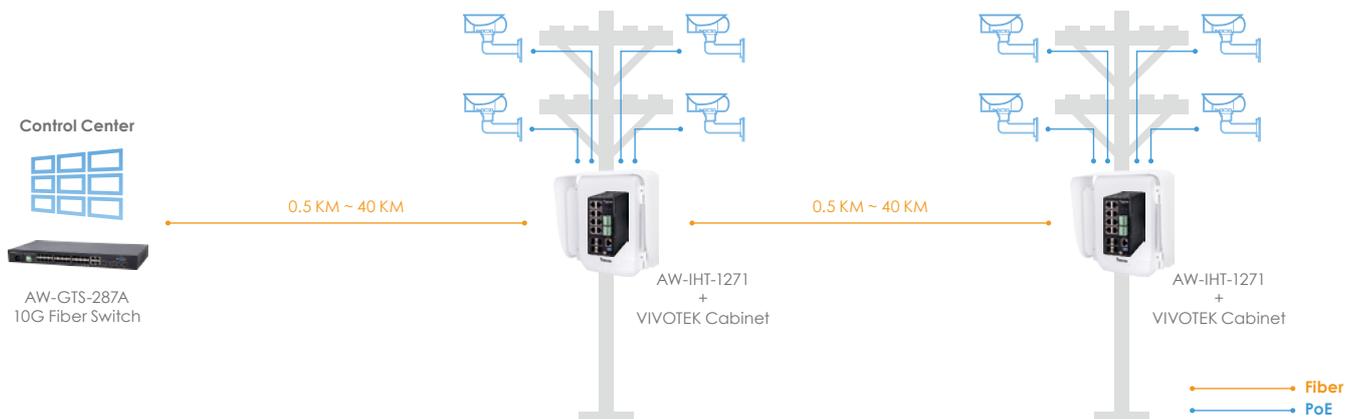


Application

Rapid Ring



Outdoor Surveillance Solution



Technical Specifications

Model	AW-IHT-1271
Managing IP Surveillance Functions	
Management	
Auto Search VIVOTEK Device	Up to 1000 pcs
Surveillance Device Management List	√
DHCP Server Function	√
Easy Tag VLAN in Topology View	√
VIVOTEK Device Name Edit	√
VIVOTEK Device Account/Password Setting	√
VIVOTEK Device Static IP Setting	√
VIVOTEK Camera/Video Server Reboot/Restore Default	√
VIVOTEK Device Re-direct Link	√
VIVOTEK Device On/Off Line Status	√
Discover ONVIF IP camera	√
Graphic View	
Topology View	√
Floor View	√
Google Map View	√
Maintenance	
VIVOTEK Camera/Video Server Configuration File Export/Import	√
VIVOTEK Cameras/Video Server Configuration File Management	√
Floor Image Management	√
Export Surveillance Management Device List	√
Security	√
Trouble Shooting	√
Traffic Monitoring	√
Hardware Specification	
Port Configuration	
10M/100M/1G RJ45 PoE Port	8
100M/1G SFP Port	4
Console Port	1xRJ45
Hardware Performance	
Switching Capacity	24 Gbps
Forwarding Capacity	17,856 Mpps
MAC Address	8K
Jumbo Frames	9600 Bytes
PoE Function	

Technical Specifications

Number of PoE Out Ports		8
Max. PoE Output Power /Per Port		30W
802.3at/af Standard Compatible		√
Over Current Protection		√
Circuit Shorting Protection		√
Total PoE Power Budget		240W
Power Pin Assignment		1/2(+), 3/6(-)
PoE PD Auto Detection		√
Managed Layer 2+ PoE Switch Functions		
Layer 2+ Features		
Spanning Tree	IEEE802.1D (STP)	√
	IEEE802.1w (RSTP)	√
	IEEE802.1s (MSTP)	√
VLAN	802.1Q Tag-based VLAN	4096 VLAN IDs
	Port-based VLAN	√
	MAC-based VLAN	√
	Management VLAN	√
	Q-in-Q (Double Tag)	√
	Private VLAN Edge (PVE)	√
	Voice VLAN	√
	GARP VLAN Registration Protocol (GVRP)	√
Trunking	IEEE 802.3ad LACP	Up to 4 ports in a group, Max. up to 6 groups
IGMP Snooping (v1/v2/v3)		√
Loop Detection		√
L3 Features		
IP Host Table		√
IPv4/v6 Static Routing		√
Static ARP		√
DHCP Server		√
Ring Management		
ITU-T G.8031	Supports ITU-T G.8031 Ethernet Linear Protection Switching	√
ITU-T G.8032	Supports ITU-T G.8032 Ethernet Ring Protection Switching	√
Rapid Ring	Convergence Time within 20ms	√
	Total Number of Switch	Up to 250 units
QoS Features		
Hardware Queues		8

Technical Specifications

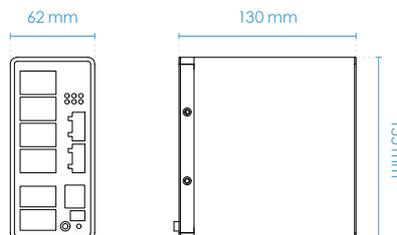
Classification	Port Based	✓
	802.1p VLAN Priority Based	✓
	Private VLAN Edge (PVE)	✓
	Differentiated Services (DiffServ)	✓
	Classification and Re-marking ACLs	✓
Rate Limiting	Ingress Policer	✓
	Egress Shaping and Rate Control	✓
	Per Port	✓
Priority Queue Scheduling	Strict Priority and Weighted Round-robin (WRR)	✓
	Queue Assignment Based on DSCP and Class of Service	✓
Security		
Port Security (MAC-based)		✓
IEEE802.1x		✓
ACLs	Supports up to 256 Entries	✓
	Source and Destination MAC, VLAN ID or IP Address, Protocol, Port	✓
	Differentiated Services Code Point (DSCP) / IP Precedence	✓
	TCP/UDP Source and Destination Ports	✓
	802.1p Priority	✓
	Ethernet Type	✓
	Internet Control Message Protocol (ICMP) Packets	✓
TCP Flag		✓
IP Source Guard (IP-MAC-Port Binding)		✓
Storm Control		✓
RADIUS Authentication (RFC2138)		✓
DDoS Prevention		✓
Layer 3 Isolation (Allow/Disallow Routing between IP Subnets)		✓
HTTPs and SSL (Secured Web)		✓
SSH v1.5/v2.0 (Secured Telnet Session)		✓
BPDU Guard		✓
STP Root Guard		✓
DHCP Snooping		✓
Management		
SNMP (v1, v2c, v3)		✓
RMON (1, 2, 3 & 9 groups)		✓
CLI (Command Line Interface)		✓
Web GUI Interface		✓

Technical Specifications

Firmware Upgrade		✓
Dual Image		✓
Configuration Export/Import		✓
DHCP	Support DHCP Server to Assign IP to DHCP Clients	✓
Event/Error Log	Syslog	✓
Management Access Filtering	SNMP	✓
	Web	✓
	Telnet	✓
Port Mirroring		✓
Remote Monitoring (RMON)		✓
LLDP (IEEE802.1ab)		✓
LLDP-MED		✓
NTP		✓
UPnP		✓
S-Flow		✓
NTP		✓
IEEE 1588v2 PTP		✓
Hardware Monitoring	Temperature Detection and Alarm	✓
Hardware Watchdog	Supported to Resume Operation from CPU Hang up	✓
IPv6 Support		
Dual IPv6/IPv4 Stack		✓
IPv6 Web/SSL		✓
IPv6 SNTP (Simple Network Time Protocol)		✓
IPv6 Telnet Server/SSH		✓
IPv6 Ping Trace Route		✓
IPv6 TFTP		✓
IPv6 RADIUS		✓
IPv6 Syslog		✓
IPv6 DNS Client		✓
IPv6 Protocol-based VLANs		✓
IPv6 SNMP		✓
PoE Management		
ON/OFF Control		✓
Alive Checking for PD		✓
Power Delay		✓
7/24 On/Off Scheduling		✓
Environmental Specifications		
Operating Temperature		-40°C ~ 75°C (-40°F ~ 167°F)

Technical Specifications

Storage Temperature	-40°C ~ 85°C (-40°F ~ 185°F)
Operating Humidity	5% ~ 90% Non-Condensing
Mechanical Specifications	
Dimensions	62(W) x 135(H) x 130(D) mm
Weight	0.68 kg
Power Specifications	
Power Input Voltage	PW1: 48 ~ 57VDC PW2: 48 ~ 57VDC Redundant Power Backup
Output Voltage Range /Per PoE Port	54VDC PoE IEEE 802.3af (Max. 15.4W) output PoE+ IEEE802.3at (Max. 30W) output
Surge Protection /Per PoE Port	6KV
Certifications	
EMS	EN61000-4-2 ESD, EN61000-4-3 RS, EN61000-4-4 EFT, EN61000-4-5 Surge, EN61000-4-6 CS, EN61000-4-8 PFMF
EMI	FCC Part 15 Class A
Safety	CE, LVD, VCCI
Vibration	IEC 60068-2-6
Shock	IEC 60068-2-27
Freefall	IEC 60068-2-32
Dimensions	



Compatible Accessories

Power Supply		SFP Transceiver			
					
NDR-240-48 Indoor Industrial Din Rail Power Supply, 48VDC/240W, -20°C ~ 70°C	HLG-240H-54 Outdoor Industrial Wall Mount Power Supply, 54VDC/240W, -40°C ~ 70°C, IP67	SFP-1000-MM85-X5I MMF, 0.5 KM, -40°C ~ 85°C	SFP-1000-MM13-02I MMF, 2 KM, -40°C ~ 85°C	SFP-1000-SM13-10I SMF, 10 KM, -40°C ~ 85°C	SFP-1000-SM13-40I SMF, 40 KM, -40°C ~ 85°C