

IDS1808F2

Din-rail Managed Industrial Ethernet Switch

Description

The IDS1808F2 is a high performance L2+ Managed Ethernet Switch with 8 x10/100/1000TX RJ45 Copper ports with 2 x1000M SFP Ports, which meets the high reliability requirements demanded by industrial rolling stock applications.

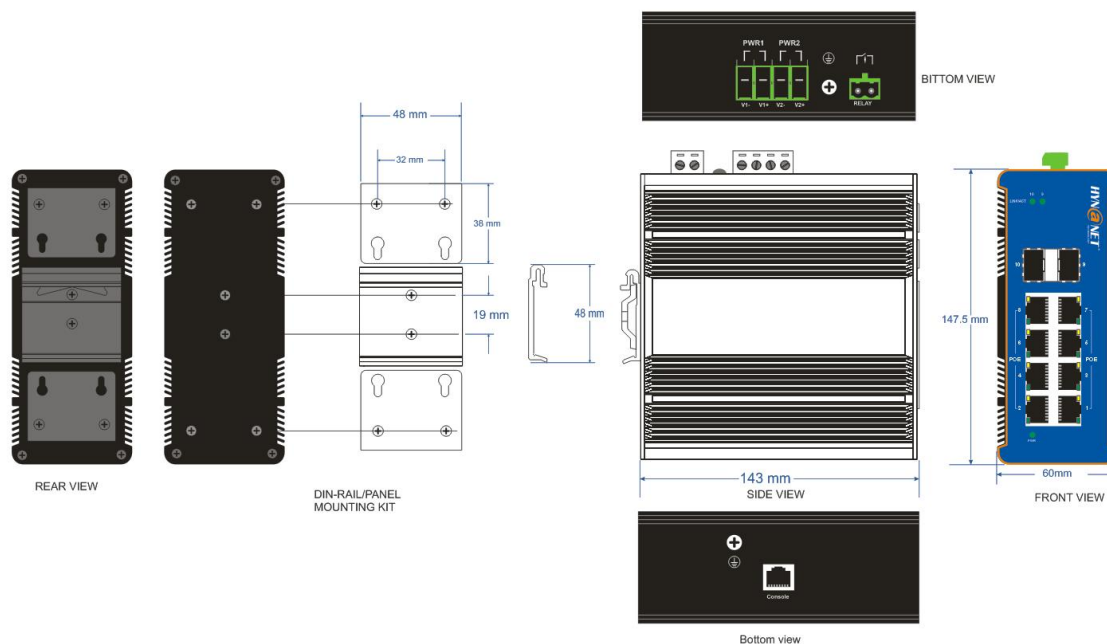
It provides L2 wire speed and advanced security function for network aggregation deployment. It delivers enhanced ring recovery less than 20ms in single ring. For more usage flexibilities, IDS1808F2 supports wide operating temperature from -40~75°C.



Features

- Conforms to IEEE802.3, IEEE 802.3u, IEEE 802.3ab, IEEE802.3z.
- Provide 8 10/100/1000TX RJ45 Copper ports with 2x1000M SFP ports
- High back-plane bandwidth 20Gbps
- Support ICMPv6
- Support IPv6 Neighbor Discovery
- Support MLD Snooping
- Support IPv6 Telnet
- Support standard IP/ Extend IP / MAC IP / ARP ACL
- Support IGMP snooping for Multi-media application
- Support Port mirror and bandwidth control
- Support IEEE802.3x Flow control
- Support Port Based VLAN / 802.1Q Tag VLAN
- Support IEEE802.3ad Port trunk with LACP
- Support Spanning tree protocol IEEE802.1d/802.1w/802.1s
- Support IEEE 802.1p class of service
- Support IEEE 802.1x user authentication
- Support Broadcast storm filter
- Support System event log
- Support command line interface management
- Management by Web / SNMP / SSH / Telnet (IPv6 ready) / Console
- Surge protection for power port and data ports
- Wide power input: 12-36VDC
- Wide working temperature: -40~75°C
- IP30 Aluminum case
- 200,000 hours MTBF (Parts count reliability prediction)

Dimensions



Specifications

Attributes	
Networking Interfaces	8 10/100/1000M RJ45 Copper ports. 2 1000M SFP ports.
Management Interface	RJ45 Console port
LED Indicators	Power, Link/Act,
Copper Cable	
10Base-T	2-pair UTP/STP Cat. 3,4,5/5E,6 cable EIA/TIA-568 100-ohm (100m)
100Base-T	2-pair UTP/STP Cat. 5/5E,6 cable EIA/TIA-568 100-ohm (100m)
1000Base-T	4-pair UTP/STP Cat. 5E,6 cable EIA/TIA-568 100-ohm (100m)
Performance	
Switching Capacity	20 Gbps
Forwarding Capacity	14.88 Mpps
Forwarding Mode	Store and Forward
Packet Buffer Memory	4.1 Mbit
RAM for CPU	1 Gbit
Flash Memory	128 Mbit
MAC Address Table	8K
Max. Jumbo Frame size	16K
VLAN Quantity	4K
ACL Table	512
L3 Interface	32
Port Queues	8
PoE Budget	240W
Physical	
Dimensions	140x138x40mm

Weight	
Operating Temperature	-40 to 75℃
Storage Temperature	-40 to 75℃
Operating Humidity	5 to 95% Noncondensing
Power Method	12-36VDC
Max. Power Consumption	Excluding Output: 15W
EMC Safety	FCC, CE, RoHS
Reliability	
Port Configuration	
Enable and Disable	Support control enable and disable
Auto-Negotiation	Support force port mode and speed
Flow Control	Support IEEE802.3x full-duplex Support half-duplex backpressure
Storm Control	Support broadcast, multicast and DLF package rate limit
Port Mirroring	Support many to one mirroring
Rate Limit	Support Port input and output rate limit
Link Aggregation	Support manual Link Aggregation Support LACP Up to 8 maximum aggregation groups, each containing up to 8 ports
Aggregation Strategy	Source MAC / Destination MAC / Source Destination MAC Source IP / Destination IP / Source Destination IP
Port Protection	Each port can be configured into isolated protected port from each other
MAC Configuration	
MAC Address Table Management	Support
Transfer Mode	Support IVL transfer mode
Static MAC Address	Support
MAC Binding	Support
MAC Address Filter	Support
MAC Quantity Limitation	Support limit the number of MAC-addresses Learning per port
VLAN Configuration	
VLAN Based on 802.1Q	Support
MAC-Based VLAN	Support
IP-Based VLAN	Support
Protocol-Based VLAN	Support
Voice VLAN	Support
Guest VLAN	Support
Private VLAN	Support
VLAN Mapping	Support 1:1 mapping
Double VLAN Markup	Support basic QinQ
Reliability Protocol	
Spanning Tree	Support STP/RSTP/MSTP
BPDU Guard	Support
BPDU Filter	Support
Port Loop Detection	Support
EAPS Protocol	Support RFC3619
ERPS Protocol	Support G.8032/Y.1344
LLDP Protocol	Support LLDP and LLDP-MED
UDLD Protocol	Totally compatible with UDLD protocol of CISCO

Host Routing	
Static ARP	Support
Static Routing	Support
Multicast	
Static Multicast MAC Address	Support
IGMP SNOOPING	Support
MVR	Support
GMRP	Support
Access Control List (ACL)	
Based on Standard IP	Support
Based on Extend IP	Support
Based on MAC IP	Support
Based on MAC ARP	Support
Based on time	Support
Port Filtering	Support
Quality of Service (QOS)	
Scheduling Mode	Support WRR, SP, WFQ
Sorting Based on Port	Support
Sorting Based on 802.1p	Support
Sorting Based on DSCP(DiffServ)	Support
Sorting Based on ACL Data Flow	Support
QoS Strategy	Support packet mapped to the corresponding output queue Support to modify the packet's COS and DSCP sign Support limit of data flow Support statistics of data flow Support mirroring of data flow
Security	
Administrative Security	Support start and end TELNET, WEB and SNMP serve Support TELNET, WEB and SNMP serve binding with Standard IP ACL Support control the number of user for TELNET
CPU Protect	Switch self-security protect, forbid flow attack
IP-MAC Address Binding	Support binding between static configuration IP, MAC and Port
AAA	Support 802.1x protocol Support RADIUS protocol Support RADIUS server authentication authorization and bill Support MAC-based 802.1X authentication. Support 802.1x guest VLAN
DHCP SNOOPING	Support dynamic ARP binding to prevent ARP spoofing Support dynamic IP, MAC port binding Support stationary port connect to DHCP server, to prevent privately connect to DHCP sever
Prevent ARP Spoofing	Support manual configure ACL rule based on MAC ARP prevent ARP spoofing Support DHCP SNOOPING function, switch dynamically binding ARP and port, when the DHCP get IP address , to prevent ARP spoofing
IPv6	
ICMPv6	Support
IPv6 Neighbor Discovery	Support
MLD Snooping	Support
IPv6 Telnet	Support
Management Feature	

CLI Management	Support serial port management Support TELNET management Support SSH management
WEB Management	Support
SNMP Management	Support SNMP protocol Support SNMP TRAP Support standard and private MIB
User management	Support multi-user management
Show CPU Utilization	Support
Show RAM Utilization	Support
TACACS+	Support TACACS+ server remote user name and password authentication Support PAP and CHAP password encryption Support TACACS+ server command authorization
Log Management	Support
RMON	Support RMON 1,2,3,9 group
Cluster Management	Support neighbor discovery protocol Support topology discovery protocol Support manual and automated join cluster group Support cluster unification management
OAM	Support 802.3ah Support 802.1ag
Configuration Download / Upload	Support
Debugging Tools	
PING	Support
TRACEROUTE	Support
TELNET Client	Support
Package List	
Ethernet Switch	1pcs
User Manual	1pcs
DB9 to RJ45 Cable	1pcs

Order Information

Switch Models	
IDS1808F2	8GE+2SFP Din-rail Managed Industrial Switch
SFP Modules	
GSFP-RJ45	1000M SFP module, RJ45 port
GSFP-M-LC-R5	1000M SFP module, multi-mode, 500M, 850nm, LC
GSFP-S-LC-20	1000M SFP module, single-mode, 20km, 1310nm , LC
GSFP-S-LC-40	1000M SFP module, single-mode, 40km, 1310nm, LC
GSFP-S-LC-80	1000M SFP module, single-mode, 80km, 1550nm, LC