IES-1041FX / 1042FX Series

IES-1041FX IES-1042FX

Industrial slim type 5-port/6-port unmanaged Ethernet switch

Features

- IES-1041FX series provide 4x10/100Base-T(X) and 1x100Base-FX single/multi-mode fiber ports
- IES-1042FX series provide 4x10/100Base-T(X) and 2x100Base-FX single/multi-mode fiber ports
- Support auto-negotiation and auto-MDI/MDI-X
- Support store-and-forward transmission
- Support flow control
- Support surge protection technology
- Warning system by relay output
- Rigid IP-30 housing design
- DIN-Rail and wall mounting enabled

Slim Type Redundant PWR -40~70°C Temperature

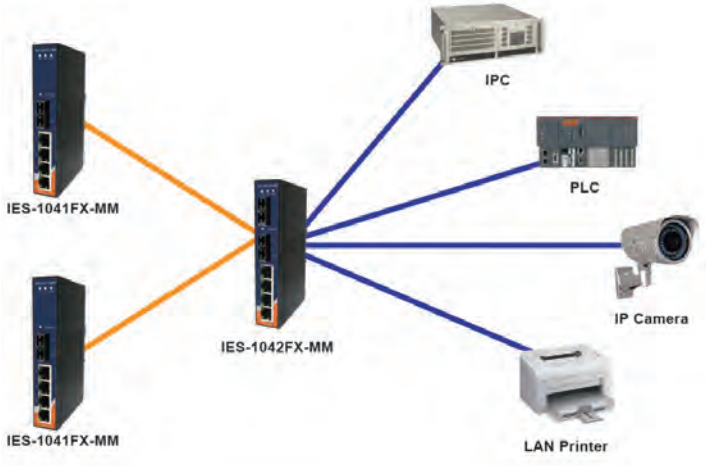
RoHS Lead Free

Introduction

IES-1041FX/1042FX series are unmanaged Ethernet switches with 4 x 10/100Base-T(X) and 100Base-FX ports. IES-1041FX/1042FX series support redundant power inputs, configurable relay output alarm and rigid IP-30 housing. In addition, the wide operating temperature range from -40 to 70°C can satisfy most of operating environment.

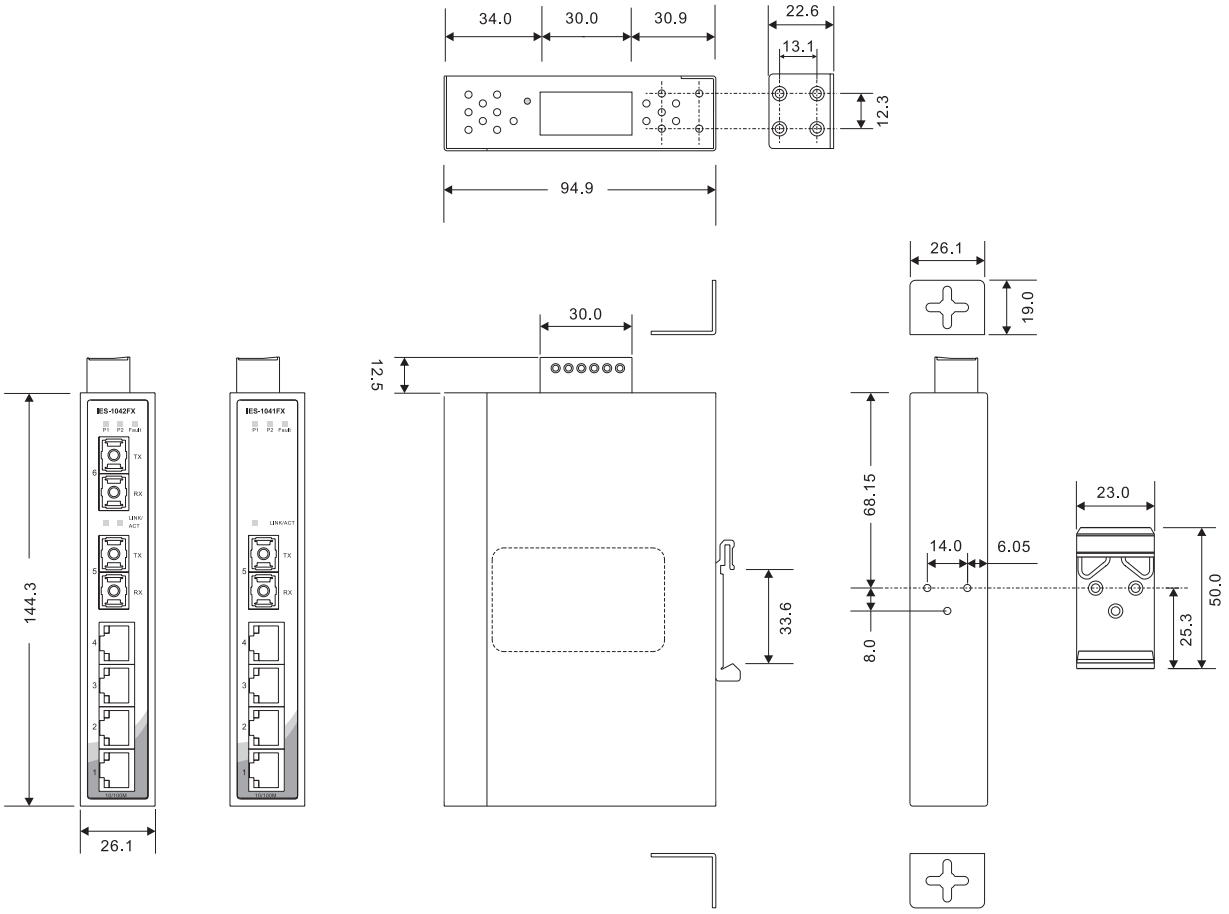
Practical Operation

IES-1041FX/1042FX series can be used in connecting several Ethernet devices like Ethernet I/O, IP-Camera or other Ethernet switches. In addition, there are two different power inputs at terminal block to avoid interruption caused by power down. When the primary DC power input fails, the backup power input will take over immediately to guarantee a non-stop operation.



Connections of Ethernet devices

Dimensions



(Unit=mm)

Specifications

ORing Switch Model		IES-1041FX-MM-SC	IES-1041FX-SS-SC	IES-1042FX-MM-SC	IES-1042FX-SS-SC
Physical Ports					
10/100Base-T(X) Ports in RJ45 Auto MDI/MDIX		4	4	4	4
Fiber Ports Specifications	Fiber Ports Number	1	1	2	2
	Fiber Ports Standard	100Base-FX	100Base-FX	100Base-FX	100Base-FX
	Fiber Mode	Multi-mode	Single-mode	Multi-mode	Single-mode
	Fiber Diameter (μm)	62.5/125 μm 50/125 μm	9/125 μm	62.5/125 μm 50/125 μm	9/125 μm
	Fiber Optical Connector	SC	SC	SC	SC
	Typical Distance (km)	2 km	30 km	2 km	30 km
	Wavelength (nm)	1310 nm	1310 nm	1310 nm	1310 nm
	Max. Output Optical Power (dBm)	-14 dBm	-8 dBm	-14 dBm	-8 dBm
	Min. Output Optical Power (dBm)	-23.5 dBm	-15 dBm	-23.5 dBm	-15 dBm
	Max. Input Optical Power (Saturation)	0 dBm	0 dBm	0 dBm	0 dBm
	Min. Input Optical Power (Sensitivity)	-31 dBm	-34 dBm	-31 dBm	-34 dBm
	Link Budget (dB)	7.5 dB	19 dB	7.5 dB	19 dB

Technology				
Ethernet Standards	IEEE 802.3 for 10Base-T IEEE 802.3u for 100Base-TX and 100Base-FX IEEE 802.3x for Flow control			
MAC Table	2048 MAC addresses			
Processing	Store-and-Forward			
LED Indicators				
Power Indicator	Green : Power LED x 2			
Fault Indicator	Amber : Indicates PWR1 or PWR2 failure occurred			
10/100Base-T(X) RJ45 Port Indicator	Green for port Link/Act. Amber for Duplex/Collision			
Fiber Port LED	Green for port Link/Act.			
Fault contact				
Relay	Relay output to carry capacity of 1A at 24VDC			
Power				
Redundant Input Power	Dual DC inputs: 12~48VDC on 6-pin terminal block			
Power Consumption (Typ.)	5 Watts		7 Watts	
Overload Current Protection	Present			
Reverse Polarity Protection	Present			
Physical Characteristics				
Enclosure	IP-30			
Dimensions (W x D x H)	26.1(W) x 94.9(D) x 144.3(H) mm (1.03 x 3.74 x 5.68 inch.)			
Weight (g)	378 g		382 g	
Environmental				
Storage Temperature	-40 to 85°C (-40 to 185°F)			
Operating Temperature	-40 to 70°C (-40 to 158°F)			
Operating Humidity	5% to 95% Non-condensing			
Regulatory Approvals				
EMI	FCC Part 15, CISPR (EN55022) class A			
EMS	EN61000-4-2 (ESD), EN61000-4-3 (RS), EN61000-4-4 (EFT), EN61000-4-5 (Surge), EN61000-4-6 (CS), EN61000-4-8, EN61000-4-11			
Shock	IEC60068-2-27			
Free Fall	IEC60068-2-32			
Vibration	IEC60068-2-6			
Safety	EN60950-1			
MTBF (Hours) (MIL-HDBK-217F2, GB, GC, 25°C)	668,306	668,306	668,306	668,306
Warranty	5 years			

Ordering Information

IES-1 AA B CC - DD - EE

Code Definition	10/100Base-T(X) Port Number	Additional Port Number	Additional Port Type	Fiber Optical Mode	Fiber Optical Connector
Option	**- 04:** 4 ports	**- 1:** 1 port **- 2:** 2 ports	**- FX:** 100Base-FX	**- MM:** Multi-mode **- SS:** Single-mode	**- SC:** SC connector

	Model Name	Description
Available Model	IES-1041FX-MM-SC	Industrial 5-port slim type unmanaged Ethernet switch with 4x10/100Base-T(X) and 1x100Base-FX, multi-mode, 2km/1310nm, SC connector
	IES-1041FX-SS-SC	Industrial 5-port slim type unmanaged Ethernet switch with 4x10/100Base-T(X) and 1x100Base-FX, single-mode, 30km/1310nm, SC connector
	IES-1042FX-MM-SC	Industrial 6-port slim type unmanaged Ethernet switch with 4x10/100Base-T(X) and 2x100Base-FX, multi-mode, 2km/1310nm, SC connector
	IES-1042FX-SS-SC	Industrial 6-port slim type unmanaged Ethernet switch with 4x10/100Base-T(X) and 2x100Base-FX, single-mode, 30km/1310nm, SC connector

Packing List

- IES-1041FX / 1042FX
- DIN-Rail Kit
- Wall-mount Kit
- Quick Installation Guide

Optional Accessories (Can be purchased separately)

- DR-45 series, 45W DIN-Rail power supply
- DR-75 series, 75W DIN-Rail power supply
- DR-120 series, 120W DIN-Rail power supply
- SDR-240-48, 240W DIN-Rail power supply
- SDR-480-48, 480W DIN-Rail power supply