

SWITCH

Quick Installation Guide

Introduction

IES-1000 Series are industrial unmanaged Ethernet switches. IES-1000 series support dual redundant power inputs, relay output alarm, and rigid IP-30 housing. In addition, the wide operating temperature range from -40°C to 70°C can satisfy most of operating environment.

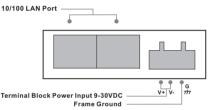
IES-1000 Series can be used in connecting several Ethernet devices like Ethernet I/O, IP-Camera or other Ethernet switches. In addition, there are two different power inputs at terminal block to avoid interruption caused by power down. When the primary DC power input fails, the backup power input will take over immediately to guarantee a non-stop operation.

Features

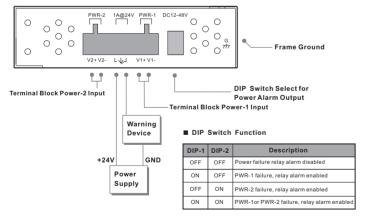
- > Dual redundant DC power inputs at terminal block
- > Support 10/100/1000Base-T(X), 100Base-FX and 1000BaseX ports
- > Very wide operating temperature range from -40 to 70°C
- Rigid IP-30 housing design
- DIN-Rail and wall mounting enabled

Power Connection Guide

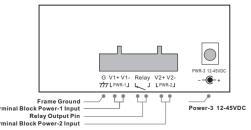
5-port Switches



• 5-port / 6-port / 8-port Switches



8-port / 10-port Switches



IES-1000 Series

Specifications

8-port /10-port Unmanaged Switches

| | | | | l . | | | |
|---|--|--|------------------------------|---------------------|----------------------|---------------|------------|
| ORing Switch Model | IES-1080 | IES-1062GT | IES-1062FX-MM | IES-1062FX-SS | IES-1062GF-MM | IES-1062GF-SS | IES-1082GF |
| Physical Ports | | | | | | | |
| 10/100 Base-T(X) Ports in RJ45 Auto MDI/MDIX | 8 | 6 | 6 | 6 | 6 | 6 | 8 |
| 10/100/1000 Base-T(X) Ports in RJ45 Auto MDI/MDIX | - | 2 | - | - | - | - | - |
| 100 Base-FX Multi-mode Port (2KM,1310nm,SC connector) | - | - | 2 | - | - | - | - |
| 100 Base-FX Single-mode Port (30KM,1310nm,SC connector) | - | - | - | 2 | - | - | - |
| 1000Base-SX Multi-mode Port (550M,850nm,SC connector) | - | - | - | - | 2 | - | - |
| 1000Base-LX Single-mode Port (10KM,1310nm,SC connector) | - | - | - | - | - | 2 | - |
| 1000Base-X SFP Port | - | - | - | - | - | - | 2 |
| Technology | | | | | | | |
| Ethernet Standards | IEEE 802.3at | or 10Base-T for 100Base-TX ar b for 1000Base-T for Flow control | nd 100Base-FX | | | | |
| MAC Table | 8192 MAC ad | Idresses | | | | | |
| Processing | Store-and-Fo | orward | | | | | |
| LED Indicators | | | | | | | |
| Power Indicator | Green: Power | LED x3 | | | | | |
| Fault Indicator | Amber: Indica | ate PWR1 or PWR2 | failure | | | | |
| 10/100TX RJ45 Port Indicator | Green for port | t Link/Act. Amber | for Duplex/Collision | | | | |
| Fiber Port Indicator | | - | Green for port Link/ | Act. Amber for Link | Green for port Link/ | Act. | |
| Fault Contact | | | | | | | |
| Relay | Relay output | to carry capacity | of 1A at 24 VDC | | | | |
| Power | | | | | | | |
| Redundant Input power | Triple DC inpu | ts. 12-48VDC on 7 | 7-pin terminal block, 1 | 2-45VDC on power ja | ck | | |
| Power consumption(Typ.) | 4 Watts | 7 Watts | 8 Watts | 8 Watts | 6 Watts | 6 Watts | 7 Watts |
| Overload current protection | Present | | | | | | |
| Reverse polarity protection | Present on terminal block | | | | | | |
| | | | | | | | |
| Physical Characteristic | | | | | | | |
| | IP-30 | | | | | | |
| Enclosure | IP-30 |)x144(H) mm (2.0 | 05x4.17x5.67 inch.) | | | | |
| Enclosure Dimension (W x D x H) | IP-30 |)x144(H) mm (2.0 | 05x4.17x5.67 inch.) 680 g | 680 g | 685 g | 685 g | 709 g |
| Enclosure Dimension (W x D x H) Weight (g) | IP-30 52(W)x106(D | | | 680 g | 685 g | 685 g | 709 g |
| Enclosure Dimension (W x D x H) Weight (g) Environmental | IP-30 52(W)x106(D | 677 g | | 680 g | 685 g | 685 g | 709 g |
| Enclosure Dimension (W x D x H) Weight (g) Environmental Storage Temperature | IP-30 52(W)x106(D 666 g | 677 g 40 to 185°F) | | 680 g | 685 g | 685 g | 709 g |
| Enclosure Dimension (W x D x H) Weight (g) Environmental Storage Temperature Operating Temperature | IP-30 52(W)x106(D 666 g -40 to 85°C (| 677 g 40 to 185°F) 40 to 158°F) | | 680 g | 685 g | 685 g | 709 g |
| Enclosure Dimension (W x D x H) Weight (g) Environmental Storage Temperature Operating Temperature | IP-30 52(W)x106(D 666 g -40 to 85°C (| 677 g 40 to 185°F) | | 680 g | 685 g | 685 g | 709 g |
| Enclosure Dimension (W x D x H) Weight (g) Environmental Storage Temperature Operating Temperature Operating Humidity Regulatory Approvals | IP-30 52(W)×106(D 666 g -40 to 85°C (40 to 70°C (5% to 95% No | 677 g 40 to 185°F) 40 to 158°F) on-condensing | 680 g | 680 g | 685 g | 685 g | 709 g |
| Enclosure Dimension (W x D x H) Weight (g) Environmental Storage Temperature Operating Temperature Operating Humidity Regulatory Approvals | IP-30 52(W)×106(D 666 g -40 to 85°C (40 to 70°C (5% to 95% No | 677 g 40 to 185°F) 40 to 158°F) on-condensing | 680 g | 680 g | 685 g | 685 g | 709 g |
| Enclosure Dimension (W x D x H) Weight (g) Environmental Storage Temperature Operating Temperature Operating Humidity Regulatory Approvals EMI | IP-30 52(W)×106(D 666 g -40 to 85°C (40 to 70°C (5% to 95% No | 677 g 40 to 185°F) 40 to 188°F) 40 to 158°F) CISPR (EN55022) ((ESD), (RS), (EFT), (Surge), (CS), | 680 g | 680 g | 685 g | 685 g | 709 g |
| Enclosure Dimension (W x D x H) Weight (g) Environmental Storage Temperature Operating Temperature Operating Humidity Regulatory Approvals EMI | 1P-30 52(W)×106(D 666 g -40 to 85°C (40 to 70°C (5% to 95% No FCC Part 15, C ENS1000-4-2 ENS1000-4-2 ENS1000-4-6 ENS1000-4-6 ENS1000-4-6 ENS1000-4-6 | 677 g 40 to 185°F) 40 to 188°F) 40 to 158°F) CISPR (EN55022) ((ESD), (RS), (EFT), (Surge), (CS), (1 | 680 g | 680 g | 685 g | 685 g | 709 g |
| Enclosure Dimension (W x D x H) Weight (g) Environmental Storage Temperature Operating Temperature Operating Humidity Regulatory Approvals EMI EMS | 1P-30 52(W)×106(D 666 g -40 to 85°C (40 to 70°C (5% to 95% No FCC Part 15, C ENS1000-4-2 ENS1000-4-2 ENS1000-4-8 ENS1000-4-8 ENS1000-4-8 ENS1000-4-6 | 677 g 40 to 185°F) 40 to 188°F) on-condensing CISPR (ENSS022) ((ESD), (RS), (EST), (Surge), (CS), (1 | 680 g | 680 g | 685 g | 685 g | 709 g |
| Enclosure Dimension (W x D x H) Weight (g) Environmental Storage Temperature Operating Temperature Operating Humidity Regulatory Approvals EMI EMS Shock Free Fall | 1P-30 52(W)×106(D 666 g -40 to 85°C (-40 to 70°C (5% to 95% No ENS1000-4-2 ENS1000-4-2 ENS1000-4-1 ENS1000-4-1 ENS1000-4-1 IEC60068-2-1 | 677 g 40 to 185°F) 40 to 188°F) 40 to 158°F) on-condensing CISPR (EN55022) ((ESD), (RS), (EST), (Surge), (CS), , 1 27 | 680 g | 680 g | 685 g | 685 g | 709 g |
| Physical Characteristic Enclosure Dimension (W x D x H) Weight (g) Environmental Storage Temperature Operating Temperature Operating Humidity Regulatory Approvals EMI EMS Shock Free Fall Vibration Safety | 1P-30 52(W)×106(D 666 g -40 to 85°C (40 to 70°C (5% to 95% No EN61000-4-2 EN61000-4-3 EL60068-2-3 EL60068-2-3 | 677 g 40 to 185°F) 40 to 188°F) 40 to 158°F) on-condensing CISPR (EN55022) ((ESD), (RS), (EST), (Surge), (CS), , 1 27 | 680 g | 680 g | 685 g | 685 g | 709 g |

• 5-port / 6-port /8-port Unmanaged Switches (Slim Type)

| ORing Switch Model | IES-1080A | IES-1050A | IES-1041FX-MM | IES-1041FX-SS | IES-1042FX-MM | IES-1042FX-SS | |
|---|--|---------------------|-------------------------|---------------|---------------|---------------|--|
| Physical Ports | | | | | | | |
| 10/100 Base-T(X) Ports in RJ45 Auto MDI/MDIX | 8 | 5 | 4 | 4 | 4 | 4 | |
| 10/100/1000 Base-T(X) Ports in RJ45 Auto MDI/MDIX | - | - | - | - | - | - | |
| 100 Base-FX Multimode Port (2KM,1310nm,SC connector) | - | - | 1 | - | 2 | - | |
| 100 Base-FX Singlemode Port (30KM,1310nm,SC connector) | - | - | - | 1 | - | 2 | |
| 1000Base-SX Multimode Port (550M,850nm,SC connector) | - | - | - | - | - | - | |
| 1000Base-LX Singlemode Port (10KM,1310nm,SC connector) | - | - | - | - | - | - | |
| 1000Base-X SFP Port | - | - | - | - | - | - | |
| Technology | | | | | | | |
| Ethernet Standards | IEEE 802.3 for 1 IEEE 802.3u for IEEE 802.3x for | 100Base-TX and | 100Base-FX | | | | |
| MAC Table | 2048 MAC addre | esses | | | | | |
| Processing | Store-and-Forw | | | | | | |
| LED Indicators | | | | | | | |
| Power Indicator | Green: Power LE | n v 2 | | | | | |
| Fault Indicator | | PWR1 or PWR2 fai | | | | | |
| 10/100TX RJ45 Port Indicator | | nk/Act. Amber for | | | | | |
| Fiber Port Indicator | - | - | Green for port Link/A | Act. | | | |
| Fault Contact | | | | | | | |
| Relav | Relay output to | carry capacity of 1 | IA at 24 VDC | | | | |
| Power | | | | | | | |
| Redundant Input power | Dual DC inputs 1 | 12-48VDC on 6-pir | n terminal block | | | | |
| Power consumption(Typ.) | 4 Watts | 3.5 Watts | 5 Watts | 5 Watts | 7 Watts | 7 Watts | |
| Overload current protection | Present | J.J Watts | 3 watts | J watts | / watts | / watts | |
| - | Present | | | | | | |
| Reverse polarity protection | Present | | | | | | |
| Physical Characteristic | | | | | | | |
| Enclosure | IP-30 | | | | | | |
| Dimension (W x D x H) | | | .30 x 3.74 x 5.68 inch. | | | | |
| Weight (g) | 391 g | 390 g | 395 g | 395 g | 406 g | 406 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), EN61000-4-6 (CS), EN61000-4-8, EN61000-4-8, | | | | | | |
| | EN61000-4-11 | | IEC60068-2-27 | | | | |
| Shock | | | | | | | |
| Shock Free Fall | | | | | | | |
| | IEC60068-2-27 | | | | | | |
| Free Fall | IEC60068-2-27 IEC60068-2-32 | | | | | | |

5-port Unmanaged Switches

| ORing Switch Model | IES-1050 | | | | |
|---|--|--|--|--|--|
| Physical Ports | | | | | |
| 10/100 Base-T(X) Ports in RJ45 Auto MDI/MDIX | 5 | | | | |
| 10/100/1000 Base-T(X) Ports in RJ45 Auto MDI/MDIX | - | | | | |
| 100 Base-FX Multimode Port (2KM,1310nm,SC connector) | - | | | | |
| 100 Base-FX Singlemode Port (30KM,1310nm,SC connector) | - | | | | |
| 1000Base-SX Multimode Port (550M,850nm,SC connector) | - | | | | |
| 1000Base-LX Singlemode Port (10KM,1310nm,SC connector) | - | | | | |
| 1000Base-X SFP Port | - | | | | |
| Technology | | | | | |
| Ethernet Standards | IEEE 802.3 for 10Base-TX and 100Base-FX IEEE 802.3x for 100Base-TX and 100Base-FX IEEE 802.3x for Flow control | | | | |
| MAC Table | 2048 MAC addresses | | | | |
| Processing | Store-and-Forward | | | | |
| LED Indicators | | | | | |
| Power / Ready indicator | Green: Power LED x1 | | | | |
| Fault Indicator | - | | | | |
| 10/100TX RJ45 Port Indicator | Green for port Link/Act. Amber for duplex indicator | | | | |
| Fiber Port Indicator | - | | | | |
| Fault Contact | | | | | |
| Relay | - | | | | |
| Power | | | | | |
| Input power | 9~ 30 VDC voltage power input at 3-pin terminal block | | | | |
| Power consumption(Typ.) | 3 Watts | | | | |
| Overload current protection | Present | | | | |
| Reverse polarity protection | Present on terminal block | | | | |
| Physical Characteristic | | | | | |
| Enclosure | IP-30 | | | | |
| Dimension (W x D x H) | 88(W) x 102(D) x 24(H)mm (3.46 x 4.0 x 0.94 inch.) | | | | |
| Weight (g) | 305 g | | | | |
| Environmental | | | | | |
| Storage Temperature | -40 to 85°C (-40 to 185°F) | | | | |
| Operating Temperature | -10 to 60°C (14 to 140°F) | | | | |
| Operating Humidity | 5% to 95% Non-condensing | | | | |
| Regulatory Approvals | | | | | |
| EMI | FCC Part 15, CISPR (EN55022) class A | | | | |
| EMS | ENS1000-4-2 (ESD), ENS1000-4-3 (RS), ENS1000-4-4 (EFT), ENS1000-4-5 (Surge), ENS1000-4-6 (CS), ENS1000-4-8 (ENS100-4-8), ENS1000-4-8 (ENS100-4-8), ENS1000-4-8 (ENS1000-4-8) | | | | |
| Shock | IEC60068-2-27 | | | | |
| | | | | | |
| Free Fall | IEC60068-2-32 | | | | |
| Free Fall Vibration | IEC60068-2-32 IEC60068-2-6 | | | | |

Industrial Unmanaged Switch

SWITCH INDUSTRIAL

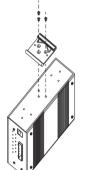
Quick Installation Guide

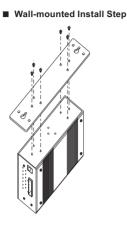
IES-1000 Series

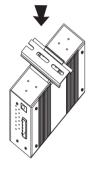
Industrial Unmanaged Switch

Installation

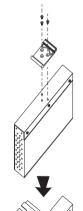
- 8-port /10-port Switches
- DIN-Rail Install Step



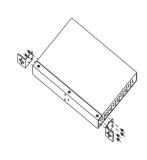




- 5-port / 6-port / 8-port Switches (Slim type)
- DIN-Rail Install Step

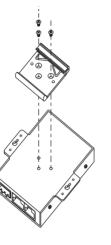


IES-1000 Series

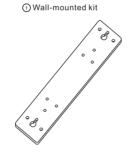




5-port Switches ■ DIN-Rail Install Step



Accessory



4 7-Pin Terminal block

7 Dust Cover (RJ-45)

10 Wall-mounted kit (for Slim Type)

















2 45mm DIN-Rail kit









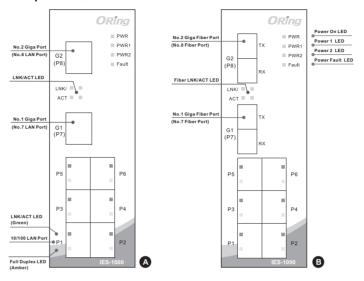


3 Flat Screw (M3 X5)

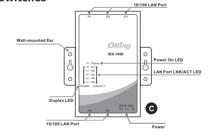
6 6-Pin Terminal block

₽ Front Panel

8-port Switches

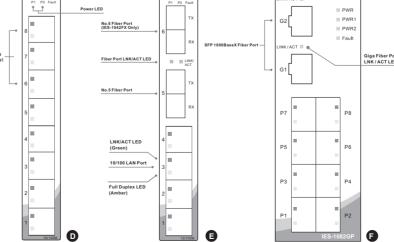


5-port Switches



5-port / 6-port / 8-port Switches





▶ Packing list

IES-1000 Series

| Model name | Front Panel | Model Description | Accessory |
|---------------|-------------|---|--|
| IES-1080 | | | ①X 1, ②X 1, ③X 6, ④X 1, ⑦X 8, ②X 1 |
| IES-1062GT | | | ①X 1, ②X 1, ③X 6, ④X 1, ①X 8, @X 1 |
| IES-1062FX-MM | | | ①X 1, ②X 1, ③X 6, ④X 1, ⑦X 6, @X 1 |
| IES-1062FX-SS | | | ①X 1, ②X 1, ③X 6, ④X 1, ⑦X 6, ②X 1 |
| IES-1062GF-MM | | | ①X 1, ②X 1, ③X 6, ④X 1, ①X 6, @X 1 |
| IES-1062GF-SS | ₿ | Industrial 8-port unmanaged Ethernet switch with 6x10/100Base-T(X) and 2x1000Base-LX, single-mode | ①X 1, ②X 1, ③X 6, ④X 1, ⑦X 6, @X 1 |
| IES-1050 | | Industrial 5-port unmanaged Ethernet switch with 5x10/100Base-T(X) | ②X1, ③X1, ①X5, @X1 |
| IES-1082GP | 3 | | ①X1, ②X1, ③X6, ④X1, ①X8, ③X2, ②X1 |

• IES-1000 Series (Slim Type)

| Model name | Front Panel | Model Description | Accessory |
|---------------|-------------|--|---|
| IES-1050A | | Industrial 5-port slim type unmanaged Ethernet switch with 5x10/100Base-T(X) | ⊚X1, ⑦X5, ⑨X8, ⑩X2, ⑪X1, ②X1 |
| IES-1080A | | Industrial 8-port slim type unmanaged Ethernet switch with 8x10/100Base-T(X) | ◎X1, ②X8, ③X8, @X2, · ①X1, ②X1 |
| IES-1041FX-MM | G | multi-mode | ⊕X1, @X1 |
| IES-1041FX-SS | G | | : 1 (1) (1) (1) (1) (1) (1) (1) (1) (1) (|
| IES-1042FX-MM | • | mutt-mode | : 10 X 1, 12 X 1 |
| IES-1042FX-SS | | Industrial 6-port slim type unmanaged Ethernet switch with 4x10/100Base-T(X) and 2x100Base-FX, single-mode | ⊚X1, ⑦X4, ⑨X8, ⑩X2, ⑪X1, ⑩X1 |



IES-1082GP