

FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

Please be informed that the data shown in this PDF document is generated from our online catalog. Please find the complete data in the user documentation. Our general terms of use for downloads are valid.

Managed PoE Switches 4000, 1 SFP port 100/1000 Mbps, 4 RJ45 ports 10/100 Mbps



Product description

FL SWITCH 4000 managed industrial PoE Ethernet switches combine Gigabit interfaces with extensive network performance for the most demanding applications. Extensive user and device access control security features with complete IEEE redundancy and 15 ms recovery time extended ring redundancy optimize network uptime. POE control is optimized with POE diagnostics, watchdog, and scheduling, functions. A comprehensive mix of 10/100 Mbps and Gigabit fiber optic connections combine performance with installed cost savings.

Your advantages

- Four 10/100 Mbps RJ45 ports for device connections and one SFP-based fiber optic LC interfaces for network trunk lines.
- -40 °C to 75 °C ambient temperature
- Redundant power supply
- Wide -40° ... +75°C temperature range
- VLANs
- DHCP client
- MSTP
- RSTP
- Web-based management, SNMP
- Secure web-based and SNMP-based management
- Extensive web diagnostics with configurable LED and remote alarm contacts
- Unique cleanup function hides unused configuration pages, reducing complexity, maintenance and startup times

Commercial data

Item number	1026924
Packing unit	1 pc
Minimum order quantity	1 pc
Product key	DNN125
Catalog page	Page 319 (C-6-2019)
GTIN	4055626519968
Weight per piece (including packing)	1,949.4 g
Weight per piece (excluding packing)	1,949.4 g
Customs tariff number	85176200
Country of origin	TW

FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

Technical data

Dimensions

Width	75 mm
Height	170 mm
Depth	152 mm

Notes

General	Designed to function with all 48 V DC QUINT and TRIO power supplies.
General	Mode A or Mode B PoE

Utilization restriction

EMC note	EMC: class A product, see manufacturer's declaration in the download area
----------	---

Material specifications

Housing material	Aluminum
------------------	----------

Mounting

Mounting type	DIN rail mounting
---------------	-------------------

Interfaces

Ethernet (SFP)

Number of interfaces	1
Connection method	SFP
Transmission speed	100/1000 Mbps (full duplex)
Transmission physics	Depending on the SFP module
Transmission length	up to 80 km (Depending on the fiber/SFP module used)
Signal LEDs	Data receive, link status
No. of channels	1 (SFP port)

Ethernet (PoE)

Connection method	RJ45
Note on the connection method	Auto negotiation and autocrossing
Transmission speed	10/100 Mbps
Transmission physics	Ethernet in RJ45 twisted pair
Transmission length	100 m
No. of channels	4 (RJ45 ports)

Product properties

Type	Block design
Product type	Switch
Product family	Managed PoE Switches 4000
MTTF	21.3 Years (MIL-HDBK-217F standard, temperature 25°C,

FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

	operating cycle 100%)
Switch functions	
Diagnostic functions	RMON History
	LLDP (Link Layer Discovery Protocol)
	SNMP-Traps
	N:1-Portmirroring
Basic functions	Store and forward switch, Extended Ring and IEEE redundancy, Multicast control, IGMP snooping, trunking, Port and Tagging VLANs, Port and IEEE 802.1x security, SNMP V3 and Https security, SNTP, web customization, user accounts, Modbus/TCP, PoE according to IEEE 802.3at/af.
Filter functions	Quality of Service (8 and 64 priority classes)
	Port prioritization
	VLAN (up to 64 VLANs)
	IGMP Snooping (256 groups)
	IGMP Query
IP parameterization	DHCP-Client
	BootP
Management	Web-based management (HTTP/HTTPS)
	SNMPv1/v2/v3
Redundancy	ERR (Extended ring redundancy (15 ms))
	RSTP (Rapid Spanning Tree Protocol)
	MSTP (Multiple Spanning Tree Protocol)
Status and diagnostic indicators	LEDs: U _{S1} , U _{S2} (redundant voltage supply), Alarm (alarm contact), Link/Activity and PoE per Ethernet port
Additional functions	Transmission of MMS and GOOSE (IEC 61850-8-1)
Time synchronization	SNTP (Simple Network Time Protocol)

Security functions

Basic functions	Store and forward switch, Extended Ring and IEEE redundancy, Multicast control, IGMP snooping, trunking, Port and Tagging VLANs, Port and IEEE 802.1x security, SNMP V3 and Https security, SNTP, web customization, user accounts, Modbus/TCP, PoE according to IEEE 802.3at/af.
-----------------	---

Electrical properties

Local diagnostics	US1, US2 Supply voltage Green LED
	LNK/ACT Link status/data transmission Green LED
	PoE PoE detection Orange LED
	Alarm Power failure at US1 or US2/Link failure
Transmission medium	Copper
	FO

Supply

Supply voltage (DC)	55 V DC (redundant)
Supply voltage range	50 V DC ... 57 V DC (> 52 V DC for PoE+ or 60 W output recommended)

FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

Inrush current	43.6 A (52 V DC for 1830 µs)
Residual ripple	3.6 V _{PP} (within the permitted voltage range)
Max. current consumption	3.9 A (Maximum, nominal load)
Typical current consumption	142 mA (U _S = 55 V DC)

Connection data

Connection technology

Connection name	Power supply
pluggable	yes

Power supply

Connection method	Screw connection
Conductor cross section, rigid	0.2 mm ² ... 2.5 mm ²
Conductor cross section, flexible	0.2 mm ² ... 2.5 mm ²
Conductor cross section AWG	24 ... 12
Stripping length	7 mm

Environmental and real-life conditions

Ambient conditions

Degree of protection	IP30
Ambient temperature (operation)	-40 °C ... 75 °C
Ambient temperature (storage/transport)	-40 °C ... 85 °C
Permissible humidity (operation)	5 % ... 95 % (non-condensing)
Permissible humidity (storage/transport)	5 % ... 95 % (non-condensing)
Air pressure (operation)	57 kPa ... 108 kPa (up to 4850 m above mean sea level)
Air pressure (storage/transport)	57 kPa ... 108 kPa (up to 4850 m above mean sea level)

Standards and regulations

Standards/specifications	EN 50121 for railway applications
--------------------------	-----------------------------------

Approvals

Conformity/Approvals

Conformance	CE-compliant
-------------	--------------

EMC data

Conformance with EMC directives	IEC 61000-6-2 IEC 61000-4-2 (ESD) Criterion B
	IEC 61000-4-3 (immunity to radiated interference) Criterion A
	IEC 61000-4-4 (burst) Criterion A
	IEC 61000-4-5 (surge) Criterion B
	IEC 61000-4-6 (immunity to conducted interference) Criterion A
	IEC 61000-4-8 (immunity to magnetic fields) Criterion A
	EN 55022 (emitted interference) Criterion A
Noise immunity	EN 61000-6-2:2005
Electromagnetic compatibility	Conformance with EMC Directive 2004/108/EC

FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

Noise emission	EN 61000-6-4
----------------	--------------

System properties

Functionality

Basic functions	Store and forward switch, Extended Ring and IEEE redundancy, Multicast control, IGMP snooping, trunking, Port and Tagging VLANs, Port and IEEE 802.1x security, SNMP V3 and Https security, SNTP, web customization, user accounts, Modbus/TCP, PoE according to IEEE 802.3at/af.
-----------------	---

Signaling

Status display	LEDs: U _{S1} , U _{S2} (redundant voltage supply), Alarm (alarm contact), Link/Activity and PoE per Ethernet port
----------------	--

FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

Approvals

To download certificates, visit the product detail page: <https://www.phoenixcontact.com/pc/products/1026924>



EAC

Approval ID: RU*-DE.*.B.00741/19



UL Listed

Approval ID: FILE E 238705



cUL Listed

Approval ID: FILE E 238705

cULus Listed

FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

Classifications

ECLASS

ECLASS-11.0	19170401
ECLASS-12.0	19170401
ECLASS-13.0	19170401

ETIM

ETIM 8.0	EC000734
----------	----------

UNSPSC

UNSPSC 21.0	43222600
-------------	----------

FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

Environmental product compliance

REACH SVHC	Lead 7439-92-1
China RoHS	Environmentally Friendly Use Period = 10;
	For information on hazardous substances, refer to the manufacturer's declaration available under "Downloads"

FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

Accessories

MSTB 2,5/ 5-ST - PCB connector

1754504

<https://www.phoenixcontact.com/pc/products/1754504>



PCB connector, nominal cross section: 2.5 mm², color: green, nominal current: 12 A, rated voltage (III/2): 320 V, contact surface: Tin, contact connection type: Socket, number of potentials: 5, number of rows: 1, number of positions: 5, number of connections: 5, product range: MSTB 2,5/...-ST, pitch: 5 mm, connection method: Screw connection with tension sleeve, screw head form: L Slotted, conductor/PCB connection direction: 0 °, locking clip: - Locking clip, plug-in system: COMBICON MSTB 2,5, locking: without, mounting: without, type of packaging: packed in cardboard

QUINT4-PS/1AC/48DC/5 - Power supply unit

2904610

<https://www.phoenixcontact.com/pc/products/2904610>



Primary-switched QUINT POWER power supply for DIN rail mounting with free choice of output characteristic curve and SFB (Selective Fuse Breaking) technology, input: 1-phase, output: 48 V DC / 5 A

FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

QUINT4-PS/1AC/48DC/10 - Power supply unit

2904611

<https://www.phoenixcontact.com/pc/products/2904611>



Primary-switched QUINT POWER power supply for DIN rail mounting with free choice of output characteristic curve and SFB (Selective Fuse Breaking) technology, input: 1-phase, output: 48 V DC / 10 A

TRIO-PS-2G/1AC/48DC/5 - Power supply unit

2903159

<https://www.phoenixcontact.com/pc/products/2903159>



Primary-switched TRIO power supply for DIN rail mounting, input: 1-phase, output: 48 V DC / 5 A, dynamic boost, tool-free fast connection technology for solid and stranded conductors with ferrule

FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

TRIO-PS-2G/1AC/48DC/10 - Power supply unit

2903160

<https://www.phoenixcontact.com/pc/products/2903160>



Primary-switched TRIO POWER power supply with push-in connection for DIN rail mounting, input: single phase, output: 48 V DC/10 A

FL PD 1001 T GT - Ethernet module

2891042

<https://www.phoenixcontact.com/pc/products/2891042>



Factoryline Power over Ethernet splitter (PD) for separating power and data according to IEEE 802.3af and at, no configuration required, can be used with 10, 100, 1000 Mbps networks, 24 V DC output voltage

FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

DT-LAN-CAT.6+ - Surge protection device

2881007

<https://www.phoenixcontact.com/pc/products/2881007>



Surge protection in accordance with Class E_A (CAT6_A), for Gigabit Ethernet (up to 10 Gbps), token ring, FDDI/CDDI, ISDN, and DS1. Suitable for Power over Ethernet (PoE++ / 4PPoE) "Mode A" and "Mode B". RJ45 attachment plug with separate grounding cable and ground connection snap-on foot for NS 35 DIN rails.

FL SEC PAC 4TX - Port Guard Security Element

2832865

<https://www.phoenixcontact.com/pc/products/2832865>



Layer1 security elements for 4 RJ45 network connections for use with patch boxes and panels

FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

FL DIN RA - DIN rail adapter

2891053

<https://www.phoenixcontact.com/pc/products/2891053>

The FL DIN RA is installed in a standard, 19-inch rack (EIA-310-D, IEC 60297-3-100) to allow DIN rail mounted equipment to be rack mounted.



FL RJ45 PROTECT CAP - Dust protection

2832991

<https://www.phoenixcontact.com/pc/products/2832991>

Dust protection caps for RJ45 socket



FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

E/NS 35 N - End clamp

0800886

<https://www.phoenixcontact.com/pc/products/0800886>

End clamp, width: 9.5 mm, color: gray



FL SFP FX - Media module

2891081

<https://www.phoenixcontact.com/pc/products/2891081>

The small form-factor plug-in module provides a fiber optic interface with a data transmission speed of 100 Mbps with a wavelength of 1310 nm (long).



FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

FL SFP FX SM - Media module

2891082

<https://www.phoenixcontact.com/pc/products/2891082>



The small form-factor plug-in module provides a fiber optic interface with a data transmission speed of 100 Mbps with a wavelength of 1310 nm (long).

FL SFP SX - Media module

2891754

<https://www.phoenixcontact.com/pc/products/2891754>



Gigabit SFP module for transmission up to 1 km with a wavelength of 850 nm.

FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

FL SFP SX2 - Media module

2702397

<https://www.phoenixcontact.com/pc/products/2702397>



Gigabit SFP module for transmission up to 2 km with a wavelength of 1310 nm.

FL SFP LX10-B - Media module

1025401

<https://www.phoenixcontact.com/pc/products/1025401>



Gigabit SFP module for transmission up to 10 km with a wavelength of 1310 nm.

FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

FL SFP LX - Media module

2891767

<https://www.phoenixcontact.com/pc/products/2891767>



Gigabit SFP module for transmission up to 30 km with a wavelength of 1310 nm.

FL SFP LH - Media module

2989912

<https://www.phoenixcontact.com/pc/products/2989912>



Gigabit SFP module for transmission up to 80 km with a wavelength of 1,550 nm.

FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

FL SFP WDM10-SET - Media module

2702442

<https://www.phoenixcontact.com/pc/products/2702442>



Gigabit SFP WDM set for transmission up to a maximum of 10 km on a single fiber with a wavelength of 1310/1550 nm.

FL SFP FE WDM20-SET - Media module

2702439

<https://www.phoenixcontact.com/pc/products/2702439>



Fast Ethernet SFP WDM set for transmission up to a maximum of 20 km on a single fiber with a wavelength of 1310/1550 nm.

FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

FL SFP GT - Media module

2989420

<https://www.phoenixcontact.com/pc/products/2989420>



Gigabit SFP module for transmission up to 100 m.

FL CAT5 PATCH 0,5 - Patch cable

2832263

<https://www.phoenixcontact.com/pc/products/2832263>



Patch cable, CAT5, assembled, 0.5 m

FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

FL CAT5 PATCH 1,0 - Patch cable

2832276

<https://www.phoenixcontact.com/pc/products/2832276>

Patch cable, CAT5, assembled, 1 m



FL CAT5 PATCH 2,0 - Patch cable

2832289

<https://www.phoenixcontact.com/pc/products/2832289>

Patch cable, CAT5, assembled, 2 m



FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

NBC-R4AC-R4AC-IE8A/.../... - Patch cable

1411854

<https://www.phoenixcontact.com/pc/products/1411854>



Patch cable, degree of protection: IP20, number of positions: 8, 10 Gbps, CAT6_A, cable outlet: straight, Ethernet

NBC-R4AC/10G-R4AC/10G-94F/2,0 - Patch cable

1408360

<https://www.phoenixcontact.com/pc/products/1408360>



Patch cable, CAT6_A, 4-pair, shielded, connection not crossed (line), assembled at both ends with RJ45/IP20 connectors, outer sheath material: PUR, length: 2.0 m

FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

NBC-R4AC/10G-R4AC/10G-94F/3,0 - Patch cable

1408365

<https://www.phoenixcontact.com/pc/products/1408365>



Patch cable, CAT6_A, 4-pair, shielded, connection not crossed (line), assembled at both ends with RJ45/IP20 connectors, outer sheath material: PUR, length: 3.0 m

NBC-R4AC/1,0-93B/R4AC - Patch cable

1408968

<https://www.phoenixcontact.com/pc/products/1408968>



Patch cable, degree of protection: IP20, cable length: 1 m, number of positions: 4, 100 Mbps, CAT5, material: PA 6.6, PROFINET

FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

NBC-R4AC/2,0-93B/R4AC - Patch cable

1408969

<https://www.phoenixcontact.com/pc/products/1408969>



Patch cable, degree of protection: IP20, cable length: 2 m, number of positions: 4, 100 Mbps, CAT5, material: PA 6.6, PROFINET

NBC-R4AC/5,0-93B/R4AC - Patch cable

1408970

<https://www.phoenixcontact.com/pc/products/1408970>



Patch cable, degree of protection: IP20, cable length: 5 m, number of positions: 4, 100 Mbps, CAT5, material: PA 6.6, PROFINET

FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

FOC-LC:PA-SC:PA-OM2:D01/1 - FO patch cable

1115607

<https://www.phoenixcontact.com/pc/products/1115607>

Multi-mode OM2 duplex jumper, LC-SC, UPC polishing, length 1 m



FOC-LC:PA-SC:PA-OM2:D01/2 - FO patch cable

1115605

<https://www.phoenixcontact.com/pc/products/1115605>

Multi-mode OM2 duplex jumper, LC-SC, UPC polishing, length 2 m



FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

FOC-LC:PA-LC:PA-OM2:D01/1 - FO patch cable

1115633

<https://www.phoenixcontact.com/pc/products/1115633>

Multi-mode OM2 duplex jumper, LC-LC, UPC polishing, length 1 m



FOC-LC:PA-LC:PA-OM2:D01/2 - FO patch cable

1115634

<https://www.phoenixcontact.com/pc/products/1115634>

Multi-mode OM2 duplex jumper, LC-LC, UPC polishing, length 2 m



FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

FOC-LC:PA-ST:PA-OM2:D01/1 - Fiber optic cable

1115588

<https://www.phoenixcontact.com/pc/products/1115588>

Multi-mode OM2 duplex jumper, LC-ST, UPC polishing, length 1 m



FOC-LC:PA-ST:PA-OM2:D01/2 - Fiber optic cable

1115587

<https://www.phoenixcontact.com/pc/products/1115587>

Multi-mode OM2 duplex jumper, LC-ST, UPC polishing, length 2 m



FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

FOC-LC:PA-SC:PA-OM4:D01/1 - FO patch cable

1115601

<https://www.phoenixcontact.com/pc/products/1115601>

Multi-mode OM4 duplex jumper, LC-SC, UPC polishing, length 1 m



FOC-LC:PA-SC:PA-OM4:D01/2 - FO patch cable

1115600

<https://www.phoenixcontact.com/pc/products/1115600>

Multi-mode OM4 duplex jumper, LC-SC, UPC polishing, length 2 m



FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

FOC-LC:PA-LC:PA-OM4:D01/1 - FO patch cable

1115625

<https://www.phoenixcontact.com/pc/products/1115625>

Multi-mode OM4 duplex jumper, LC-LC, UPC polishing, length 1 m



FOC-LC:PA-LC:PA-OM4:D01/2 - FO patch cable

1115624

<https://www.phoenixcontact.com/pc/products/1115624>

Multi-mode OM4 duplex jumper, LC-LC, UPC polishing, length 2 m



FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

FOC-LC:PA-LC:PA-OS2:D01/1 - FO patch cable

1115636

<https://www.phoenixcontact.com/pc/products/1115636>

Single-mode OS2 duplex jumper, LC-LC, UPC polishing, length 1 m



FOC-LC:PA-LC:PA-OS2:D01/2 - FO patch cable

1115629

<https://www.phoenixcontact.com/pc/products/1115629>

Single-mode OS2 duplex jumper, LC-LC, UPC polishing, length 2 m



FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

FOC-LC:PA-ST:PA-OS2:D01/1 - FO patch cable

1115596

<https://www.phoenixcontact.com/pc/products/1115596>

Single-mode OS2 duplex jumper, LC-ST, UPC polishing, length 1 m



FOC-LC:PA-ST:PA-OS2:D01/2 - FO patch cable

1115595

<https://www.phoenixcontact.com/pc/products/1115595>

Single-mode OS2 duplex jumper, LC-ST, UPC polishing, length 2 m



FL SWITCH 4000T-4POE-SFP - Industrial Ethernet Switch



1026924

<https://www.phoenixcontact.com/pc/products/1026924>

FOC-LC:PA-SC:PA-OS2:D01/1 - FO patch cable

1115618

<https://www.phoenixcontact.com/pc/products/1115618>

Single-mode OS2 duplex jumper, LC-SC, UPC polishing, length 1 m



FOC-LC:PA-SC:PA-OS2:D01/2 - FO patch cable

1115617

<https://www.phoenixcontact.com/pc/products/1115617>

Single-mode OS2 duplex jumper, LC-SC, UPC polishing, length 2 m



Phoenix Contact 2023 © - all rights reserved
<https://www.phoenixcontact.com>

PHOENIX CONTACT GmbH & Co. KG
Flachsmarktstraße 8
D-32825 Blomberg
+49 (0) 5235-3 00
info@phoenixcontact.com