

VI-UTP-31xxx-Serie

Hybrid PoE switches with additional extender ports

- IP/PoE-Extender for UTP-cables
- Distances up to 500m
- PoE 802.1af, at and bt
- 8 or 16 extended channels
- Four of the data ports and four of the extended ports can deliver PoE++ up to 65W each



This hybrid Layer-2 switch with midspan extender ports was specially developed for applications with high data loads, such as video over IP, video streaming also in connection with multicast. IP cameras can be directly connected to the data ports with PoE via Cat5e or better with a maximum length of 100m to the switch. The midspan extender ports allow IP cameras to be connected to the switch via UTP cables with a maximum length of 500m. These extender lines must be terminated on the camera side with an IP extender of type VI-UTP-23xxA. The additional two combo ports with one RJ45 and one SFP port each allow two UpLink connections. All ports are switched. Very compact solutions can be implemented by integrating switch ports and extender ports in one device. Although the VI-UTP-31xxx is delivered ready for operation without any settings, the simple graphical user interface allows the setup of the device and each individual port.

More information

Systemhinweise

The connection of several device pairs via the same cable can lead to transmission problems by crosstalk of the different signals in the cable. Ideally, therefore, each device connection is realized via separate cables.

If several cables have to be lined up on a connection section, it is important to carry out these transitions as well as possible. This means that ideally professionally assembled RJ45 connectors are used for the transitions. If this is not possible, e.g. when using telephone cables, care should be taken to unwind the stranding of the wire pairs as little as possible. The contact between the wires of the cables to be connected must be as good as possible galvanically.

Shielded cables can cause problems due to potential equalisation currents. Particularly when several cables are connected in a central unit, we do not recommend grounding the shields in the central unit.



Technical data

General properties

supply voltage	100-240VAC
power consumption	Ohne PoE: 100W Mit max. PoE: 685W
operating temperature	0°C ... 40°C
dimensions	445 x 378 x 45mm (BxTxH)
weight	5,8kg
Testing standards	EN55022-2006 A1:2007 CISPR22:2006 A1:2006 EN55024 IEC61000-4-2, 2001 IEC61000-4-3, 2002 IEC61000-4-4, 2004 IEC61000-4-5, 2001 IEC61000-4-6, 2003 IEC61000-4-8, 2001 IEC61000-4-11, 2001



interfaces

copper ports	VI-UTP-31026: 16 x 10/100BaseT, PoE (15W), PoE+ (30W), 4 Ports of which can be set to PoE++ (65W), RJ45 VI-UTP-31126: 8 x 10/100BaseT, PoE (15W), PoE+ (30W), 4 Ports of which can be set to bis PoE++ (65W), RJ45
extender ports	VI-UTP-31026: 8 x 10/100BaseT, PoE (15W), PoE+ (30W), 4 Ports of which can be set to PoE++ (65W), RJ45 VI-UTP-31126: 16 x 10/100BaseT, PoE (15W), PoE+ (30W), 4 Ports of which can be set to PoE++ (65W), RJ45
transmission cable	Ideal type: Cat5e and better Further types: When using Cat3 cables (telephone cable) or bell wire, the possible distances are significantly reduced. If Cat7 cables are used, the same distances can be expected as for Cat5e/Cat6. The shielding of the Cat7 cable must not be earthed.
Transmission distance	The maximum transmission distance when using Cat5e cable or better is approx. 500m. When transmitting PoE, the power loss of the transmission path must be taken into account.
optical fibre ports	2 x 1000Base SFP (Combo Port with Uplink Ports)
uplink ports	2 x 1000T, RJ45 (Combo Port with fibre ports)
console port	USB Port, USB-B

network properties

backplane	9Gbit/s
MAC-table	4k
configuration	Konsole, Web GUI, SNMPv1, Telnet
port settings	Port disable/enable. Auto-negotiation 10/100/1000Mbps. Data rate control on each Port. MAC-Adress learning control, PoE-Power Control, SecurePort SecurePort: Once a port is configured as a SecurPort, it is automatically disabled when the switch detects that port has been lost.
port status	Per Port: Data rate, Link Status, PoE
VLAN	Port-based VLAN 802.1Q tag-based VLAN VID Based VLAN
link aggregation	LACP, IEEE802.3ad



QoS	Port Based Services 802.1Q priority tag based IP TOS/DSCP based for IPv4/IPv6 TCP/UDP port based 2 level priority per port WRRR/First Come-First Serve/Strict Priority
security	Port Security: MAC address based learning and programmable, IP address based, TCP/UDP port based, ghosting protection Log in: Programmable username and password Storm control: events traffic on a LAN from being disrupted by a broadcast, multicast, or unicast storm on
multicast	IGMP snooping v1 and v2
topology	Standard Spanning Tree 802.1d Protocol (STP)Rapid Spanning Tree (RSTP) 802.1w Multiple Spanning Tree (MSTP), supports up to 5 different
standards	IEEE 802.3 10Base-T IEEE 802.3u 100Base-TX/100BASE-FX IEEE 802.3z Gigabit SX/LX IEEE 802.3ab Gigabit 1000T IEEE 802.3x Flow Control and Back pressure IEEE 802.3ad Port trunk with LACP IEEE 802.1d Spanning tree protocol IEEE 802.1w Rapid spanning tree protocol IEEE 802.1s Multiple spanning tree protocol IEEE 802.1p Class ofservice IEEE 802.1Q VLAN Tagging IEEE 802.1x Port Authentication Network Control IEEE 802.1ab LLDP IEEE 802.3af/at Power over Ethernet



Product variants

VI-UTP-31026	16 x 10/100BaseT, PoE 8 x 10/100 Extended UTP, PoE
VI-UTP-31126	8 x 10/100BaseT, PoE 16 x 10/100 Extended UTP, PoE

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