## Wizln

5 Poris Ethernet SWITCH 10/100BaseT/TX and 100BaseFX

## WIZ-51 <br> 

Media Wizard

# - Five port Ethernet switch <br> - Four 10/100BaseTX and one uplink port, FX or TX <br> - 100BaseFX uplink port available with - Multimode or Singlemode interfaces up to 100 Km - 10/100BaseTX RJ-45 ports supporting - Auto-negotiation or manual setting (speed \& duplex) - MDI-II / MDI-X auto crossover <br> - Full wire speed and half/full duplex support on all ports <br> - Far-end-fault detection, flow control and broadcast storm control support <br> - VLAN and QOS support (optional) <br> - Per port enhanced LED indicators <br> - Manageable 

The WIZ-5 10 modules are a series of five port switch modules used in the Media Wizard modular chassis. The WIZ-510 series provide the Media-Wizard with dual speed switching capabilities for small workgroups and LPP (LAN-Per-Port) distribution.
The WIZ-5 10 modules include four 10/100Mbps auto-negotiation UTP ports, as well as an uplink (fifth) port supporting 100BaseFX or 10/100 TX interfaces. The up-link port is available with a choice of RJ-45 or SC, ST, MT-R, VF-45, LC or FJ F/O connectors for Multi-mode or Single-mode fibers.
The WIZ-510 delivers powerful features usually found in highend switches: full wire speed forwarding and filtering on all ports; 1 k MAC addresses using automatic learning and aging; half/ full duplex operation with flow control that allow 20/200Mbps bandwidth and minimize packet loss; 128KByte frame buffer memory: auto-negotiation on the TX ports; broadcast storm control and optional VLAN and priority (QOS) capabilities.
The WIZ-5 10 uses store \& forward architecture enabling direct 10/100 speed transfers as well as error checking and filtering that optimize network performance.
The WIZ-5 10 supports VLAN frames up to 1536 bytes.
A complete set of LED indicators provides easy monitoring of the status and the activity on each individual port.
The WIZ-5 10 supports MDI-II/MDI-X auto crossover on the 10/100BaseT/TX ports.


Network Device


WIZ-2016 shown with
$1 \times$ WIZ-NMS
$2 \times$ WIZ-202
$1 \times$ WIZ-201
2 x WIZ-510
11 x WIZ-100

Technical Specifications
WIZ-5 10 - Five Ports 10/100Mbps Ethernet Switch

## 10/100BaseTX Ports

| $10 / 100$ BaseT/TX RJ-45 connectors |
| :--- |
| MDI-II / MDI-X Auto crossover |
| $10 / 100 \mathrm{~A} / \mathrm{N}$ or manual setting (speed and HDX/FDX) |
| 100 meter ( 330 ft) distance over UTP/STP |

Status Indicators (per RJ-45 port)

| Link/Act | On - Link established (10 or 100) |
| :--- | :--- |
|  | Blinks - activity detected on the port |
| 100 M | On - operating at 100 Mbps |
|  | Off - operating at 10 Mbps |
|  | On - port operates in FDX mode |
|  | Off - port operates in HDX mode |
|  | Blinks - collisions detected |

## Operational Characteristics

| MAC Address | 1 K addresses |
| :--- | :--- |
|  | Auto learning and aging |
| Buffer size | 128 KByte |
| Forwarding and | 148,880 pps for 100 Mbps |
| filtering rate | 14,880 pps for 10 Mbps |
| Max. frame size | 1536 byte |
| Architecture | Store \& forward |

## Standard Compliance

IEEE 802.3 - 1OBase Ethernet
IEEE 802.3u - 100Base Fast Ethernet
IEEE 802.3x - Flow Control
Physical Dimensions (Module)

| Height | Width | Depth |
| :--- | :--- | :--- |
| $130 \mathrm{~mm}\left(5.1^{\prime \prime}\right)$ | $25.4 \mathrm{~mm}(1 \mathrm{I})$ | $140 \mathrm{~mm}\left(5.5^{\prime \prime}\right)$ |

## 100BaseFX port

| - Interface |  |  |
| :---: | :---: | :---: |
| Multimode | 1300nm | SC, ST, MT-R, VF-45, LC |
| Singlemode | 1300nm | SC, ST, MT-R, LC |
|  | 1550nm* | SC ( 100 km ) |

- Distance/Power Budget

| Multimode | $62.5 / 125 \mu$ | 6 km (11dB opt. budget) |  |
| :--- | :--- | :--- | :--- |
| Singlemode | $9 / 125 \mu$ | 20 km 40 km 60 km 100 km |  |
|  | 11 dB | 21 dB | $31 \mathrm{~dB} \quad * 32 \mathrm{~dB}$ |

## Status Indicators (100BaseFX Up-link Port)

| Link/Act | On - Link established (10 or 100) |
| :--- | :--- |
|  | Blinks - if activity detected on the port |
| FDX/Col | On - port operates in FDX mode |
|  | Off - port operates in HDX mode |
|  | Blinks - collisions detected |

Electrical Characteristics
(Installed in WIZ-2016/2004/2001 Chassis)

| Chassis main Input Voltage | $90-240 \mathrm{VAC}, \mathrm{DCV}$ |
| :--- | :--- |
| Frequency | $47-400 \mathrm{~Hz}$ |
| DC Power Consumption (PU) <br> (Power Units per module) | WIZ-510/U-1.2 PU |
|  | WIZ-510/x/yy -1.5 PU |

## Environment

|  | ${ }^{\circ} \mathrm{C}$ | ${ }^{\circ} \mathrm{F}$ |
| :--- | :---: | :---: |
| Operating Temperature | 0 to 45 | 32 to 113 |
| Storage Temperature | -30 to 65 | -22 to 149 |
| Humidity | $10 \%$ to $90 \%$ non-condensing |  |

## Safety \& Emission

CE, FCC Part 15, EN60950

## Ordering Information

| WIZ-510/U | Five ports switch, 4 port 10/100BaseTX auto-neg. ports and one 10/100BaseT/TX auto-neg. up-link port, inc. status mgmt. (1.2 PU) |
| :---: | :---: |
| WIZ-510/M/C* | Five ports switch, 4 port 10/100BaseTX auto-neg. ports and one 10/100BaseFX up-link port (MM, $1300 \mathrm{~nm}, 0.6 \mathrm{~km}, \mathrm{C}^{*}=S C, S T, M T, ~ V F, L C$, FJ connector), inc. status mgmt. (1.5 PU) |
| WIZ-510/S/C* | Five ports switch, 4 port 10/100BaseTX auto-neg. ports and one 100BaseFX up-link port (SM, 1300nm, $0-20 \mathrm{~km}, \mathrm{C}^{*}=S \mathrm{SC}, \mathrm{ST}, \mathrm{MT}, \mathrm{LC}$ connector), inc. status mgmt. (1.5 PU) |
| WIZ-510/S1/C* | Five ports switch, 4 port 10/100BaseTX auto-neg. ports and one 100BaseFX up-link port (SM, $1300 \mathrm{~nm}, 10-40 \mathrm{~km}, \mathrm{C}^{*}=$ SC, ST connector), inc. status mgmt. (1.5 PU) |
| WIZ-510/S2/C* | Five ports switch, 4 port 10/100BaseTX auto-neg. ports and one 100BaseFX up-link port (SM, $1300 \mathrm{~nm}, 30-60 \mathrm{~km}, \mathrm{C}^{*}=$ SC, ST connector), inc. status mgmt. (1.5 PU) |
| WIZ-510/S3/C* | Five ports switch, 4 port 10/100BaseTX auto-neg. ports and one 100BaseFX up-link port (SM, $1550 \mathrm{~nm}, 50-100 \mathrm{~km}, \mathrm{C}^{*}=\mathrm{SC}$ connector), inc. status mgmt. (1.5 PU) |
| WIZ-510/VLAN | Special firmware configuration for the WIZ-510 switches. <br> Factory installed firmware per customer requested VLAN and QOS. |

All specifications are subject to change without notice. Neither manufacturer nor seller shall be liable for any loss, damage, or injury, direct or consequential, arising from the inability to use the product.

