

Overview of Monitoring and SNMP values - DL-MUX4

The description in the column 'Name Monitoring' is displayed during the monitoring process and can also assume the values from the column 'Monitoring values'. The description in the column 'Name SNMP' is displayed during the monitoring process and can also assume the values from the column 'SNMP values'. Translations for the monitoring integrated in G&D devices are not considered in the list. The value from the column 'Nominal value' represents the nominal value. If the nominal value is reached and does not fall below or exceed the defined value, the value is shown in **green** during monitoring. If the nominal value is not reached or falls below or exceeds the defined value, the value is shown in **red** during monitoring.

Values are sent via SNMP/syslog if a nominal value is reached or deviates from the given value. If the nominal value is not defined, the monitoring value is neutral and is displayed in black during monitoring. In this case, each change of values is sent via SNMP/syslog.

The SNMP manager ZABBIX provides templates to import elements for all supported G&D devices. The templates not only include SNMP names and values but also pre-defined triggers and update intervals. These values are listed in the columns Zabbix template "Trigger" and Zabbix template "Update interval (in sec)".



| Name Monitoring | Name SNMP | Monitoring values | SNMP values | Nominal value | Zabbix template "Trigger" | Zabbix template "Update interval (in sec)" | Description |
|-----------------|---------------------|-------------------|----------------|---------------|---------------------------|--|---|
| - | sysDescr | - | Variable value | - | - | 3600 | A textual description of the entity. This value includes the full name and version identification of the system's hardware type, software operating-system, and networking software. |
| - | sysObjectID | - | Variable value | - | - | - | The vendor's authoritative identification of the network management subsystem contained in the entity. This value is allocated within the SMI enterprises subtree (1.3.6.1.4.1) and provides an easy and unambiguous means for determining 'what kind of box' is being managed. |
| - | sysUpTime | - | Variable value | - | - | 30 | The time (in hundredths of a second) since the network management portion of the system was last re-initialized. |
| - | sysContact | - | Variable value | - | - | 3600 | The textual identification of the contact person for this managed node, together with information on how to contact this person. |
| - | sysName | - | Variable value | - | - | 3600 | An administratively-assigned name for this managed node. By convention, this is the node's fully-qualified domain name. |
| - | sysLocation | - | Variable value | - | - | 3600 | The physical location of this node (e.g., 'telephone closet, 3rd floor') |
| - | generalErrorCode | - | Variable value | 0 = No error | <> 0 (Desaster) | 3600 | Error Code |
| - | generalErrorMessage | - | Variable value | No error | - | 3600 | Error Message |
| - | deviceId | - | Variable value | - | - | 3600 | Device ID (variable value) |
| - | deviceCl | - | Variable value | - | - | 3600 | Device class (variable value) |
| - | deviceType | - | Variable value | - | - | 3600 | Device type (variable value) |
| - | serialNumber | - | Variable value | - | - | 3600 | Serial number (variable value) |
| - | etherAddress0 | - | Variable value | - | - | 3600 | MAC address of first ethernet port (variable value) |



Overview of Monitoring and SNMP values - DL-MUX4

Continued from page 1

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|-----------------|--------------------------|--|--|---------------|---------------------------|--|---|
| - | etherAddress1 | - | Variable value | - | - | 3600 | MAC address of second ethernet port (variable value) |
| - | firmwareVersion | - | Variable value | - | - | 3600 | Firmware version (variable value) |
| Status | - | 0 = Offline 1 = Online | - | 1 = Online | - | - | Device status (Online/Offline) ----- Online = Device online Offline = Device offline |
| Main power | mainPower | 0 = Off 1 = On | 0 = off 1 = on | 1 = On | <> 1 (High) | 30 | Status of main power supply (On/Off) ----- 0 = Main power supply is not supplied with power 1 = Main power supply is supplied with power |
| Redundant power | redundantPower | 0 = Off 1 = On | 0 = off 1 = on | 1 = On | <> 1 (Warning) | 30 | Status of redundant power supply (On/Off) ----- 0 = Redundant power supply is not supplied with power 1 = Redundant power supply is supplied with power |
| Temperature | temperature1 | °C | °C | 0 - 65°C | > 65 (Desaster) | 30 | Device temperature (variable value / ° Celsius) |
| Network A | networkInterface0 | 0 = Down 1 = Up | 0 = down 1 = up | neutral | <> 1 (Information) | 30 | Status of network interface A (Up/Down) ----- 0 = Inactive network interface 1 = Active network interface |
| Network B | networkInterface1 | 0 = Down 1 = Up | 0 = down 1 = up | neutral | <> 1 (Information) | 30 | Status of network interface B (Up/Down) ----- 0 = Inactive network interface 1 = Active network interface |
| Load | load | Variable value | Variable value | neutral | - | 30 | System load (variable value consisting of several system values) |
| CPU M USB K/M | cpuChannelTargetUsbHid.M | 0 = Disconnected 1 = Connected 2 = Initialized | 0 = notConnected 1 = connected 2 = initialized | neutral | - | 30 | Status of USB-HID interface to target (Disconnected/Connected/Intialized) <<< M = number of CPU channel >>> ----- 0 = USB-HID interface not connected to target 1 = USB-HID interface connected to target 2 = Communication between USB-HID interface and computer established |
| CPU M device | cpuChannelTargetDevice.M | Variable value | Variable value | neutral | - | 30 | Name of connected target (variable value) <<< M = number of CPU channel >>> |



Overview of Monitoring and SNMP values - DL-MUX4

Continued from page 2

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|--------------------|------------------------------|-----------------------------------|-----------------------------------|---------------|---------------------------|--|--|
| CPU M power | cpuChannelTargetPower.M | 0 = Off 1 = On | 0 = off 1 = on | neutral | - | 30 | Device status of connected target <<< M = number of CPU channel >>> ----- 0 = Target is turned off (no USB auxiliary voltage) 1 = Target is turned on (USB auxiliary voltage) |
| DVI cable CPU M.N | cpuChannelVideoDviCable.M.N | 0 = Disconnected 1 = Connected | 0 = notConnected 1 = connected | neutral | - | 30 | Status of digital part of DVI interface to target (Disconnected/Connected) <<< M = number of CPU channel >>> <<< N = number of video channel >>> ----- 0 = Digital part of DVI interface is not connected to target 1 = Digital part of DVI interface is connected to target |
| DVI signal CPU M.N | cpuChannelVideoDviSignal.M.N | 0 = None 2 = Signal | 0 = noSignal 2 = signal | neutral | - | 30 | DVI signal status from target (no signal/signal) <<< M = number of CPU channel >>> <<< N = number of video channel >>> ----- 0 = No DVI input signal from target 1 = Target provides DVI signal |
| VGA cable CPU M.N | cpuChannelVideoVgaCable.M.N | 0 = Disconnected 1 = Connected | 0 = notConnected 1 = connected | neutral | - | 30 | Status of analogue part of DVI interface to target (Disconnected/Connected) <<< M = number of CPU channel >>> <<< N = number of video channel >>> ----- 0 = Analogue part of DVI interface is not connected to target 1 = Analogue part of DVI interface is connected to target |
| VGA signal CPU M.N | cpuChannelVideoVgaSignal.M.N | 0 = None 2 = Signal | 0 = noSignal 2 = signal | neutral | - | 30 | VGA signal status from target (No signal/Signal) <<< M = number of CPU channel >>> <<< N = number of video channel >>> ----- 0 = No VGA input signal from target 1 = Target provides VGA signal |
| CPU M PS/2 | cpuChannelTargetPS2.M | 0 = Disconnected 1 = Connected | 0 = notConnected 1 = connected | neutral | - | 30 | Status of PS/2 interface to target (Disconnected/Connected) <<< M = number of CPU channel >>> ----- 0 = PS/2 interface not connected to target 1 = PS/2 interface connected to target |



Overview of Monitoring and SNMP values - DL-MUX4

Continued from page 3

| Name Monitoring | Name SNMP | Monitoring values | SNMP values | Nominal value | Zabbix template "Trigger" | Zabbix template "Update interval (in sec)" | Description |
|-----------------|-------------------------|---|---|---------------|---------------------------|--|---|
| CPU M USB 2.0 | cpuChannelTargetUsb20.M | 0 = Inactive 1 = Active | 0 = inactive 1 = active | neutral | - | 30 | Status of USB 2.0 interface to target (Inactive/Active) <<< M = number of CPU channel >>> ----- 0 = USB 2.0 interface not connected to target 1 = USB 2.0 interface connected to target |
| Console PS/2 | consolePS2Connection | 0 = None 1 = Keyboard 2 = Mouse 3 = K/M | 0 = none 1 = keyboard 2 = mouse 3 = keyboard-Mouse | neutral | - | 30 | Status of console PS/2 interface (No device/Keyboard/Mouse/Keyboard and Mouse) ----- 0 = No device connected 1 = Keyboard connected 2 = Mouse connected 3 = Keyboard and mouse connected |
| Console USB | consoleUSBConnection | 0 = None 1 = Keyboard 2 = Mouse 3 = K/M | 0 = none 1 = keyboard 2 = mouse 3 = keyboard-Mouse | neutral | - | 30 | Status of console USB-HID interface (No device/Keyboard/Mouse/Keyboard and Mouse) ----- 0 = No device connected 1 = Keyboard connected 2 = Mouse connected 3 = Keyboard and mouse connected |
| Display N | displayConnection.N | 0 = Disconnected 1 = Connected | 0 = notConnected 1 = connected | neutral | - | 30 | Status of console screen (Disconnected/Connected) <<< M = number of CPU channel >>> ----- 0 = Screen is not connected 1 = Screen is connected |
| Display type N | displayType.N | Variable value | Variable value | neutral | - | 30 | Information about screen type (variable value) <<< N =number of video channel >>> |
| Active video N | activeVideo.N | 0 = No video 1 = VGA 2 = SL-DVI 3 = DL-DVI | 0 = none 1 = vga 2 = dvisl 3 = dvidl | neutral | - | 30 | Status of video signals at console (No signal/VGA/Single-link DVI/Dual-link DVI) <<< N = number of video channel >>> ----- 0 = No active video signal available 1 = Active VGA signal 2 = Active DVI single-link signal 3 = Active DVI dual-link signal |



Overview of Monitoring and SNMP values - DL-MUX4

Continued from page 4

| Name Monitoring | Name SNMP | Monitoring values | SNMP values | Nominal value | Zabbix template "Trigger" | Zabbix template "Update interval (in sec)" | Description |
|-----------------|-------------------------|-------------------|-----------------------|---------------|---------------------------|--|--|
| Selected port | selectedChannel | 1, 2, 3, 4 | 1, 2, 3, 4 | neutral | - | 30 | Number of accessing CPU channel (1/2/3/4) Read: Check number of active channel Write: Switch to this channel |
| - | disableSwitching | - | 0 = false 1 = true | - | - | 3600 | Enable/disable channel switching --- Read ----- Check active configuration --- Write ----- 0 = Disable channel switching 1 = Enable channel switching |
| - | disableFrontkeys | - | 0 = false 1 = true | - | - | 3600 | Enable/disable switching by frontkeys --- Read ----- Check active configuration --- Write ----- 0 = Disable channel switching by frontkeys 1 = Enable channel switching by frontkeys |
| - | disableHotkeys | - | 0 = false 1 = true | - | - | 3600 | Enable/disable switching by hotkeys --- Read ----- Check active configuration --- Write ----- 0 = Disable channel switching by hokeys 1 = Enable channel switching by hokeys |
| - | disableSerialPort | - | 0 = false 1 = true | - | - | 3600 | Enable/disable switching by serial commands --- Read ----- Check active configuration --- Write ----- 0 = Disable channel switching by serial commands 1 = Enable channel switching by serial commands |
| - | disableRemoteControlApi | - | 0 = false 1 = true | - | - | 3600 | Enable/disable switching by remote control API --- Read ----- Check active configuration --- Write ----- 0 = Disable channel switching by remote control API 1 = Enable channel switching by remote control API |
| - | generalErrorCode | - | Variable value | - | - | 3600 | Query error code |
| - | generalErrorMessage | - | Variable value | - | - | 3600 | Query error message |