



HDL-MBR06.431 HDL 6 Ports Switch

# buspro

### Datasheet

Issued: March 7, 2019 Edition: V1.0.0



Figure 1. HDL 6 Ports Switch

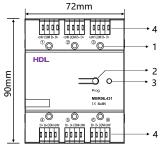


Figure 2. Dimensions - Front View

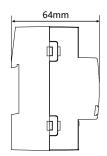


Figure 3. Dimensions - Side View

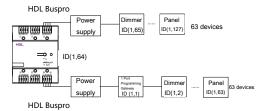


Figure 4. System diagram

### Overview

HDL 6 Ports Switch (See Figure 1) works with 1 Port Programming Gateway (HDL-MBUS01IP.431) to expand device connection and is convenient for wiring. Each Bus cable is electrically isolated and data filtering function can reduce data flow.

### **Functions**

- Data filtering
- Data checking
- 6 bus cables supported, up to 63 devices connection supported for each bus cable
- Communication: HDL Buspro
- Supports online upgrade

### **Important Notes**

- The subnet ID of this Module and the devices on the bus should be the same as that of the 1 Port Programming Gateway, and the ID of each device should be unique.
- The sixth port should connect to 1 Port Programming Gateway.
- In order to work properly, all ports must connect to power supply.
- Each Bus cable can connect up to 63 devices.

### **Product Information**

### Dimensions - See Figure 2 - 3

System diagram - See Figure 4 (Take the connection of the third and sixth ports as examples)

- 1. Indicator: Turns green when working properly, flashes in red during communication
- 2. Programming button: Press for 3s, indicator turns red. Then users can modify module address via HDL Buspro Setup Tool
- 3. Indicator: Flashes at an interval of 3s when module works properly. Turns red when reading or modifying address.
- 4. HDL Buspro interface

### Installation - See Figure 5 - 7

- Step 1. Fix the DIN rail with screws.
- Step 2. Buckle the bottom cap of the HDL 6 Ports Switch on the edge of the DIN rail.
- Step 3. Press the device on the DIN rail, slide it and fix it up until an appropriate position is adjusted.

# Safety Precautions

- The installation and commissioning of the device must be carried out by HDL or the organization designated by HDL. For planning and construction of electric installations, the relevant guidelines, regulations and standards of the respective country are to be considered.
- The device should be installed with DIN rail in DB box. HDL does not take responsibility for all the consequences caused by installation and wire connection that are not in accordance with this document.
- Please do not privately disassemble the device or change components, otherwise it may cause mechanical failure, electric shock, fire or body injury.
- Please resort to our customer service department or designated agencies for maintenance service. The warranty is not applicable for the product fault caused by private disassembly.

### Package Contents

HDL-MBR06.431\*1 / Buspro connector\*6 / Label\*5 / Datasheet\*1





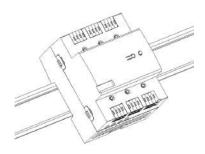


Figure 6



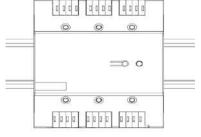


Figure 7

Figure 5 – 7. Installation

# Follow us in f © HDL QA Automation Website: www.hdl.qa E-mail: info@hdl.qa

### Technical Data

Technical Data					
Basic Parameters					
Working voltage	12~30V DC				
Working current	15mA/24V DC				
Ports	6				
Devices for each port	0-63				
Communication	HDL Buspro				
External Environment					
Working temperature	-5°C~45°C				
Working relative humidity	≤90%				
Storage temperature	-20°C~60°C				
Storage relative humidity	≤93%				
Specifications					
Dimensions	72mm×90mm×64mm				
Net weight	139g				
Housing material	Nylon, PC				
Installation	35mm DIN rail installation (See Figure 5 - 7)				
Protection rating (Compliant with EN 60529)	IP20				

### Name and Content of Hazardous Substances in Products

	Hazardous substances					
Components	Lead (Pb)	Mercury (Hg)	Cadmium (Cd)	Chromium VI (Cr (VI))	Poly-brominated biphenyls (PBB)	Poly-brominated diphenyl ethers ( PBDE )
Plastic	o	o	0	O	o	0
Hardware	O	0	0	0	-	-
Screw	o	0	o	×	-	-
Solder	×	0	O	О	-	-
PCB	×	0	O	O	0	0
IC	О	0	O	O	×	×

The symbol "-" indicates that the hazardous substance is not contained.

The symbol "o" indicates that the content of the hazardous substances in all the homogeneous materials of the component is below the limit requirement specified in the Standard IEC62321-2015.

The symbol "x" indicates that the content of the hazardous substance in at least one of the homogeneous materials of the part exceeds the limit requirement specified in the Standard IEC62321-2015.

## **HDL Buspro Cable Guide**

HDL Buspro	HDL Buspro Cable	CAT5/CAT5E
DATA+	Yellow	Blue/Green
DATA-	White	Blue white/Green white
СОМ	Black	Brown white/Orange white
24V DC	Red	Brown/Orange