

RTU7M - Chassis and Bus Backplanes



Example of chassis for 8 cards with bus backplane

General Description

In standardized configurations, we offer 2, 3, 5, 8, 10 and 16-slot chassis made of aluminum sheets with protective powder coating. The 2 and 3-slot versions are standardly intended for mounting on a DIN rail and 5, 8, 10 and 16-slot on a wall/panel. The 16-slot version is available also for 19" rack mounting.

The previously used aluminum profile construction is now only used in a special 2,5 version of the chassis with two slots, where the first slot is used for standard power supplies (PS) for communication converter applications with a wide range of supply voltages.

All slots and cards have keyed connectors, which protect them against inserting a non-matching card into the slot. Individual specifications for inserting specific types of cards into the corresponding slots are described in the user manual of the modular RTU units.

RTU7M chassis have two subgroups of product lines:

- Standard chassis with 2 up to 16 slots for standard backplanes,
- Chassis with integrated power supply and/or communication interface on backplane they are 2-slot and 3-slot chassis focused for small standalone applications or for expansion of larger RTU7M systems. The integrated power supply saves the space and these chassis are used for applications, where older compact RTUs were used. They have the following features:
 - DIN rail or panel mounting, both horizontally or vertically,
 - integrated power supply on bus backplane 10 ÷ 60 V DC, isolated or non-isolated, 3-slot chassis optionally with battery charger
 - optional additional serial communication RS-485 on backplane, isolated or non-isolated, supported MODBUS RTU and HioCom2 communication protocols for expansion of other RTUs or for distributed system architecture.

Power supply and serial line connector is located on the bottom of chassis.

ELVAC a.s.

Basic Features

- chassis with bus backplane with 2, 3, 5, 8, 10 or 16 slots,
- keyed slots, protection against the insertion of improper card into the position,
- 2 and 3-slot bus backplanes available with integrated power supply, optionally with communication interface and battery charger,
- power supply hot-swap redundancy in 8, 10 and 16-slot chassis with redundant version backplanes, two power supply card can be located in two first slots, third slot in backplane is not used,
- modularity, easy expandability of I/O,
- according to type DIN rail, wall / panel or 19" rack mounting.



Example of RTU7M bus backplane with 10 slots

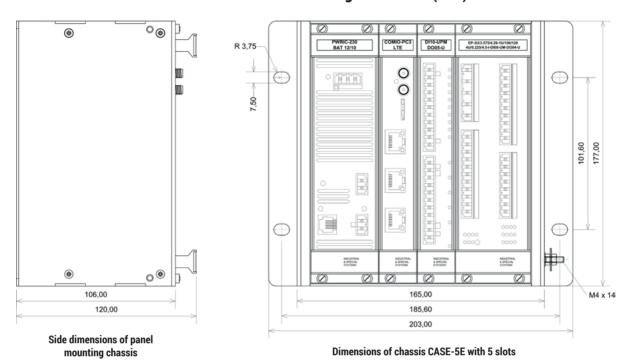
Technical Specification of Chassis

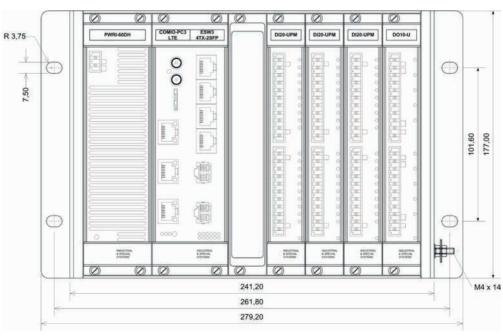
Standard chassis	RTU7M CASE-5E P RTU7M CASE-8E P RTU7M CASE-10E P RTU7M CASE-16E P RTU7M CASE-16E	Panel Panel Panel Panel 19" rack
Aluminum chassis	RTU7M CASE-2,5	Panel or DIN rail
Chassis with integrated PS	RTU7M CASE-2E DIN-PD RTU7M CASE-3E DIN-PD	DIN rail DIN rail

Technical Specification of Backplanes

Standard backplanes	RTU7M BUS-2,5N RTU7M BUS-5N RTU7M BUS-8N RTU7M BUS-10N RTU7M BUS-16N	
Backplanes for redundant PS	RTU7M BUS-8R RTU7M BUS-10R RTU7M BUS-16R	
Backplanes with integrated PS	RTU7M BUS-2E-x RTU7M BUS-3E-x RTU7M BUS-3P-x RTU7M BUS-3PB-x	PS + comm. PS + comm. PS only PS with bat. charger

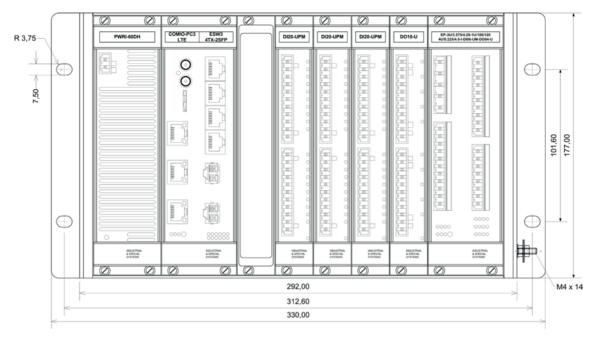
Dimensions of Standard Chassis with Powder Coating Protection (mm)



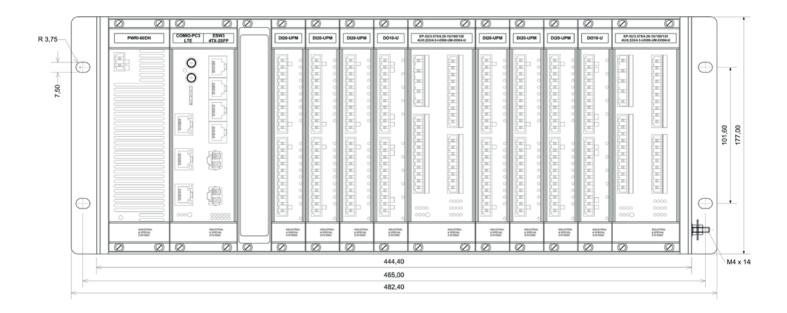


Dimensions of chassis CASE-8E with 8 slots



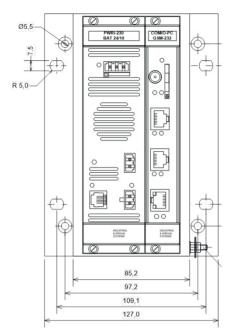


Dimensions of chassis CASE-10E with 10 slots

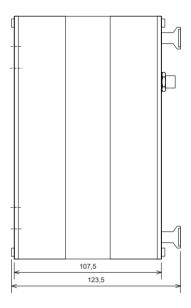


Dimensions of chassis CASE-16E with 16 slots

Aluminum Chassis Dimensions (mm)



Dimensions of chassis with 2 slots in aluminum version with 1st wider slot for power supply card



Side dimensions of all types of chassis

Dimensions of Chassis with Integrated Power Supply (mm)

