

# ISOBUS LR



Preissinger GmbH & Co. KG

## Busbar system with ERIP-insulation for low voltage for very high degree of protection

Typ/Type:	ISOBUS LR
Application:	≤ 3,6 kV AC, -7000 A
Insulation:	ERIP
Degree of protection:	IP30-IP54 Indoor IP 54-IP68 Outdoor
No. of phases:	2,3,4,5
Remark:	Single phase segregated

The ISOBUS LR system provides a value added solution for low voltage projects ≤ 3.6kV and ≤ 7000A per phase. It is an ERIP, fully insulated busbar system which provides a very high degree of protection. The basic design, materials and components, manufacture, testing and delivery are the same as for ISOBUS MR. There is only one difference between both systems: ISOBUS LR has no capacitive grading embedded through the insulation layer. It is safe, compact, space and weight saving, virtually maintenance free with a very long lifespan.

### Low Voltage Application

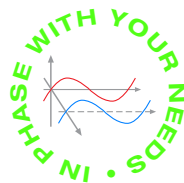
- Harsh aggressive environmental conditions, e.g. power projects situated in extreme ambient temperature conditions, desert, arctic, tropical or underground
- Petrochemical plant
- Chemical Plant
- Offshore and Marine
- Offshore wind-park substations
- Up to IP 68 degree of protection available and type tested
- Low voltage projects where space is limited
- Low voltage projects where weight saving is necessary

### Safety and Reliability

- Touch safe under operational conditions due to embedded concentric earth layer
- Partial discharge free according to IEC 60 137 due to void free manufacture and routine testing of each section prior to delivery
- No phase to phase short circuit due to complete encapsulation and insulation of each phase
- Insulation withstand is E-120
- High peak current withstand
- Easily withstands ambient temperatures from below -50°C to above + 55°C
- Natural cooling
- No halogens. If a fire occurs, no toxic gases develop and the insulation is self-extinguishing

### Space and Time Saving Installation

- Value added solution supplied. Both ISOBUS LR & its fixing system are designed, manufactured, tested and delivered as a low voltage distribution kit, complete with all components and installation documents



worldwide safely connected

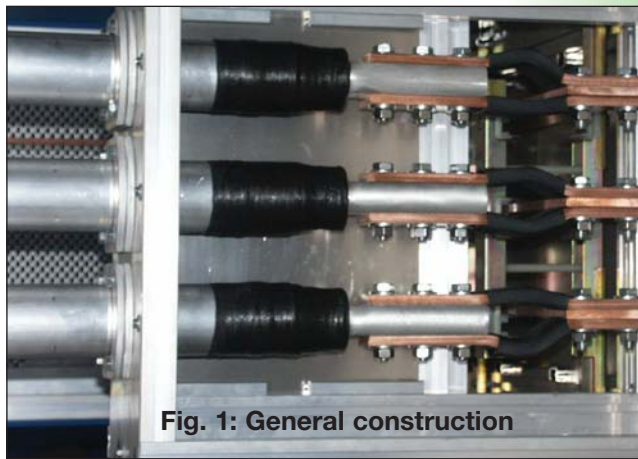


Fig. 1: General construction

- Modular system components allow made-to-measure distribution solutions within low voltage applications. Any three dimensional shape is possible
- Compact outer dimensions, extremely small bending radii, and close phase to phase distance allow maximum power in minimum space
- 1 busbar per phase up to 7000A
- Light weight system
- Minimum impact in the surrounding building
- Surrounding space can be dimensioned smaller

### Busbar – Busbar connections

Same as ISOBUS MR, except that the connecting cylinders are air insulated metal.

### Electro –Technical Equipment –ISOBUS LR Connections

As with ISOBUS MR, it is very easy to connect the ISOBUS LR system with all makes and types of electro - technical equipment available in today's market:

- Connections to flat terminals according to DIN 42206 or customer specifications
- Plug-in connections to transformers or other equipment
- Connections to every type of switchgear available on the market
- Connections to other apparatus is simple

