



Cable accessories and connectors

145 kV Dry plug-in GIS/transformer termination

TP145

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TP145

Application

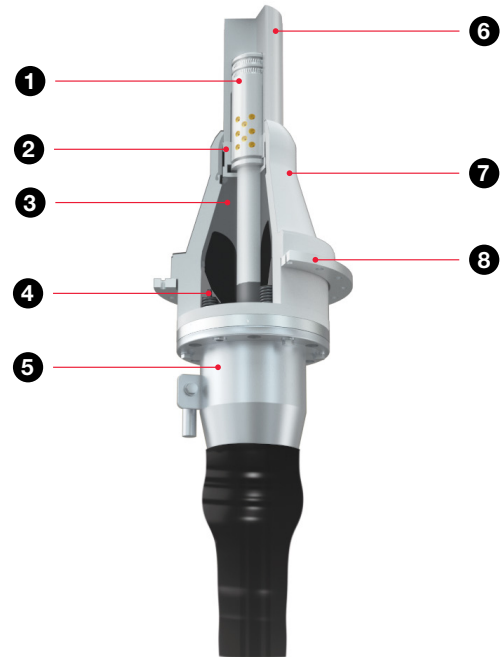
Suitable for 123 kV or 145 kV copper* Conductor XLPE insulated metal sheath cable and supporting GIS equipment or transformer equipment connection.

Standard

Designed to meet the requirements of international accepted standards, IEC 60840, IEC 62271-209, IEC 60859 and China standard GB/T 11017.

Features

- ❶ Connector: Bolted to achieve electrical connection through spring contacts
- ❷ Locking halves: Made of aluminum alloy and is used to lock the cable insulating layer
- ❸ Stress cone: The raw material liquid silicone rubber (LSR), enables a more compact structure. Different sizes are designed to fit cables with different cross-section area, to ensure optimal interface pressure between stress cone and cables, as well as the excellent electrical and insulation performance. All stress cone pass the routine test
- ❹ Spring assembly: High-quality spring steel to provide sufficient and durable interfacial pressure
- ❺ Cable gland: Provides a good seal and grounding for the termination
- ❻ Top connector: Made of silver-plated aluminum to ensure reliable connection to GIS or transformer equipment
- ❼ Epoxy insulator: Epoxy insulator adopts imported epoxy resin vacuum pouring molding, internal integrated shielding electrode
- ❽ Fixing flange: Connect epoxy insulator to GIS or transformer equipment



TP145 Dry plug-in GIS/transformer termination

Main electrical properties

Standard, IEC 60840, GB/T 11017	Type test kV	Routine test** kV
Highest voltage for equipment, U_m	145	145
Rated voltage, U	132	132
Value of U_0 for determination of test voltage	76	76
Heating cycle voltage test, $2 U_0$	152/20 cycles	/
Partial discharge test <5 pC, $1.5 U_0$	114	114
Switching impulse voltage test	+/-650	/
AC-voltage test, $2.5 U_0$	190, (15 mins)	190, (30 mins)
Visual inspection	Preformed	Preformed

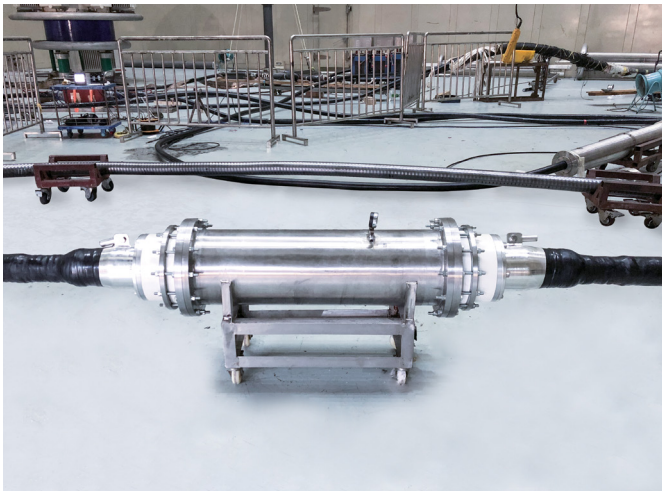
NOTE:

* Please contact Hitachi Energy in case of aluminum conductor cable.

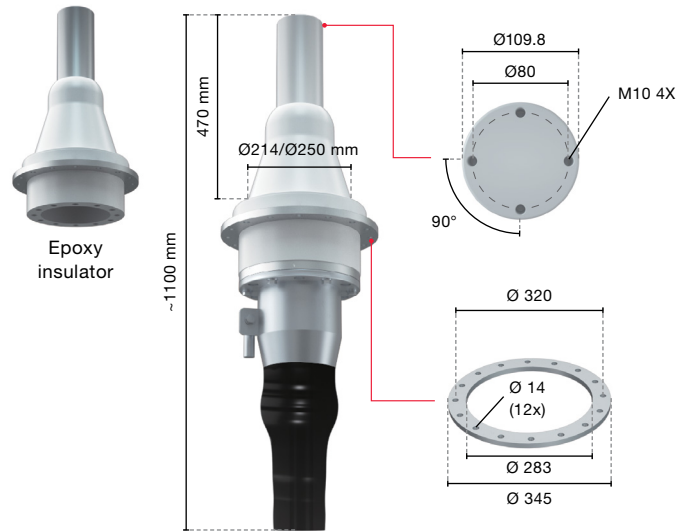
** All stress cone pass the routine test.

Technical specification

Dry plug-in GIS/transformer termination TP145



High-voltage test



Cable range applicable

Cable type	126 kV	145 kV
XLPE Ø (mm)	57-82	57-82
Conductor (mm ²)	240-1200	240-1200
Oversheath Ø (mm)	≤120	≤120

Packaging information

Type	Weight (kg)	Dimensions (mm)
TP145	~100	~1600 × 900 × 700*

*For further information, please contact Hitachi Energy.

Options:



Extension rod



Shielding cover



Storage

When stored in original, unopened status at normal and dry conditions:

- The stress cone has a shelf life of five years from the date of manufacture
- Tape and grease have a shelf life of three years
- Metal parts have no shelf life limit

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