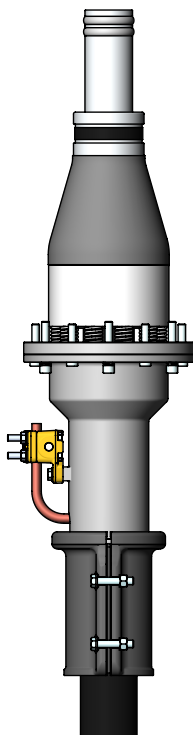


# Technical Data Sheet

## CD20 Plug 123-170kV

Dry plug-in cable termination for CD20 Socket

### CD20 Plug Termination kit



#### Use

Suitable for cable installations in a gas-insulated switchgear or an oil-filled transformer box.

#### Design

The cable termination consists of:

- Plug-in connector including contact springs and a locking device.
- The field control component is a premolded stress relief cone.
- Pre-loaded spring assembly.
- Box body and cable clamps.
- Screen connection clamp.

#### Installation

Fits CD20 Socket.

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Product Overview

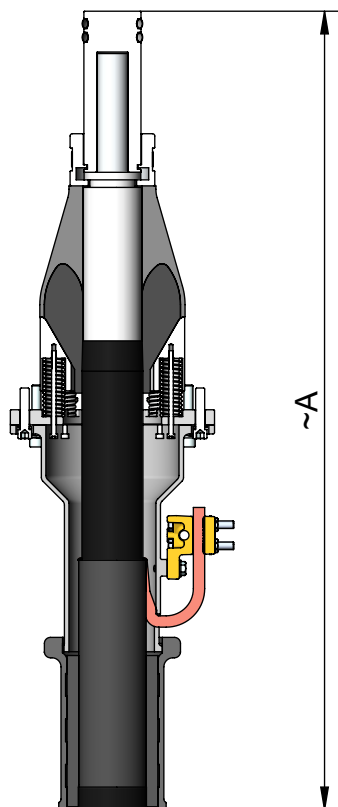
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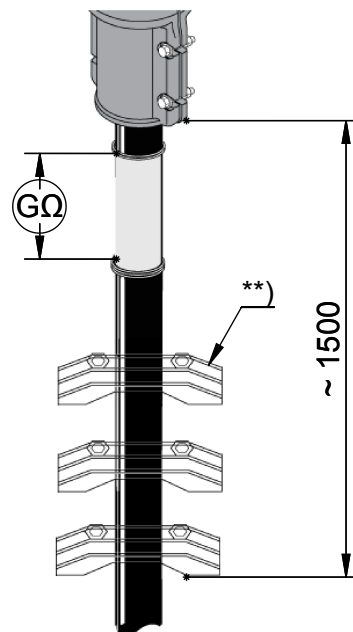
Optokit.  
Not included in  
standard supply

Cable overshoot  $\phi$   
- Small cable clamp Max  $\phi$  110 \*)  
- Large cable clamp Max  $\phi$  150 \*)

\*) If earthing kit, JSA or SCK is used,  
the maximum overshooth diameter (range)  
must be reduced with 20mm

Type	kV	Dimension
		~A
CD20 Plug	123-170	1050

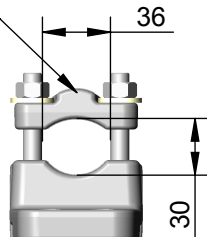
All measurements in mm



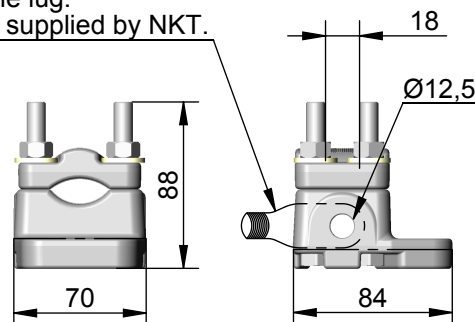
- The cable must be secured after installation.  
Recommendation is 3 clamps within 1.5m from the termination.  
E.g. the UKR system.  
NB! If cable has conductive layer it shall be removed and resistance checked acc. installation instructions.  
First clamp must always be positioned below removed area \*\*).

## Screen connection clamp

Reversible clamps for  
screen with areas between  
55 and 1050mm<sup>2</sup>.



Possibility to connect  
cable lug.  
Not supplied by NKT.



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Dimension diagram

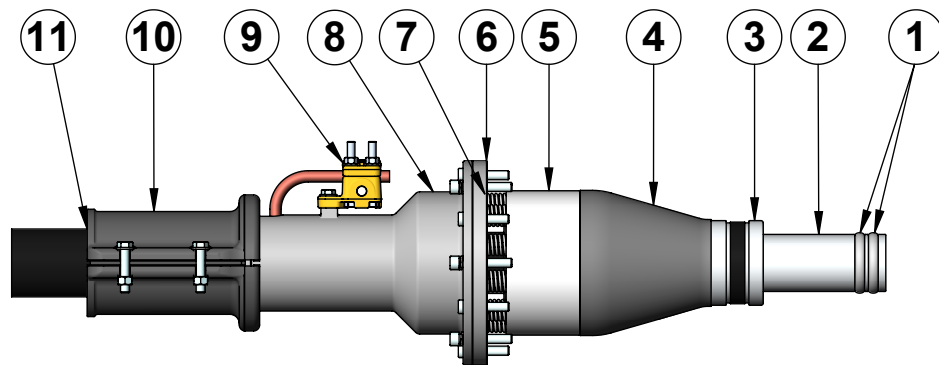
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Exposed screws, nuts and washers are of stainless steel.

11	Fitting winding	Bitumized paper
10	Cable clamp	Aluminium
9	Screen connection clamp	Brass, tin coated
8	Box body	Aluminium
7	Spring	Stainless steel
6	Spring ring	Aluminium
5	Pressure ring	Aluminium
4	Stress relief cone	EPDM rubber
3	Locking device	Aluminium
2	Plug-in connector	Copper or aluminium
1	Contact spring	Copperchromium-zirconium, CuCr1Zr
Item No.	Name of Item	Material

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Cutaway drawing

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# Technical Data of CD20 Plug 123-170kV

## Dry plug-in cable termination for CD20 Socket

Manufacturer	NKT		
Country	Sweden		
Type designation	CD20 Plug		
Application	Indoor and outdoor		
Applicable standard	IEC 60840		
<b>Electrical data</b>			
Plug type	CD20 Plug		
Highest voltage for equipment U <sub>m</sub> (kV)	123	145	170
Rated voltage U (kV)	110-115	132-138	150-161
Rated frequency (Hz)	50/60	50/60	50/60
Lightning impulse voltage withstand BIL (kV)	± 550	± 650	± 750
Switching impulse voltage withstand SIL (kV)	-	-	-
<b>Weight</b>			
Net weight, complete CD20 Plug termination kit (kg)	33		
<b>Stress control</b>			
Field control method	Stress relief cone		
Type	Premolded		
Material	EPDM rubber		
<b>Plug-in connector</b>			
Type / Material	Bolt / Al or Cu		
<b>Cable type</b>			
Type	Extruded insulation		
Conductor	Al or Cu, stranded or solid		
Screen / Sheath	Cu wire / lead, corrugated Al&Cu		
<b>Cable range</b>			
Prepared insulation diameter (mm)	44-96		
Conductor, cross sectional area (mm²)	300-2000		
Outer diameter (max diameter as standard) (mm)	150 CUW 1) 130 PAL 2), 130 MET 3)		
1) CUW = Copper wire screen. 2) PAL = Poly aluminium laminate 3) MET = Metal sheath (lead, aluminium or copper)			
<b>Optional equipment</b>			
Screen connection kit for copper wire and poly aluminium laminate	SCK		
Screen connection kit for corrugated aluminium sheath	JSA AL		
Screen connection kit for lead or corrugated copper sheath	JSA Pb		
Optical fiber kit for optofiber in screen	OKT		
Installation tool	RKM 170		
<b>Routine test</b>			
All parts of the termination	Visual inspection		
Stress relief cone routine tested	According to IEC 60840		

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# Technical Data of CD20 Plug 123-170kV

Dry plug-in cable termination for CD20 Socket

## Storage conditions

When stored dry in original, unopened packaging at temperatures in the range of  
-30°C to 30°C:

Stress relief cone	10 years
Tapes and grease	5 years
Metal hardwares	No limit

## Installation requirements

Aproximate recommended ambient temperature during installation (°C)	+5 to +30
Maximum installation angle from vertical position (°)	No limitatons

## Operation conditions

Expected servicelife after installation (years)	>30
Maintenance	Free