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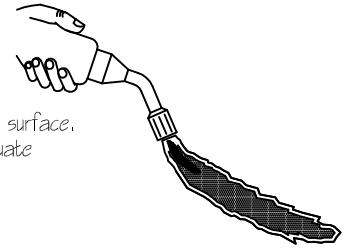
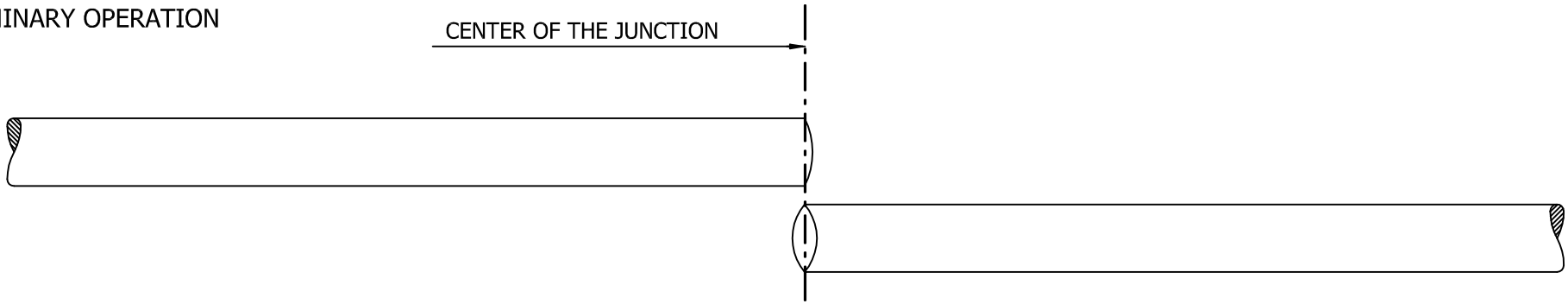
JOINTING INSTRUCTION

This product should be installed by competent personnel familiar with electrical equipment and safe operating practices. Parts contained in this kit should be visually inspected for possible damage, and installed in accordance with these instructions. These instructions are not intended as a substitute for adequate training and experience.

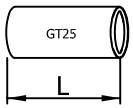
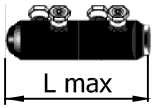
IMPORTANT: Use a propane (preferred) or butane gas torch.
Adjust torch to give a soft blue flame with yellow tip.
Heatshrink tubes uniformly avoiding wrinkles along the surface.
Keep the flame moving continously and maintain adequate distance to avoid over heating.



1. PRELIMINARY OPERATION



1.1 Straighten and set cables at the joint position. Determine the centre of the junction and cut the cables.
Clean the outer sheaths for approx. 2m.

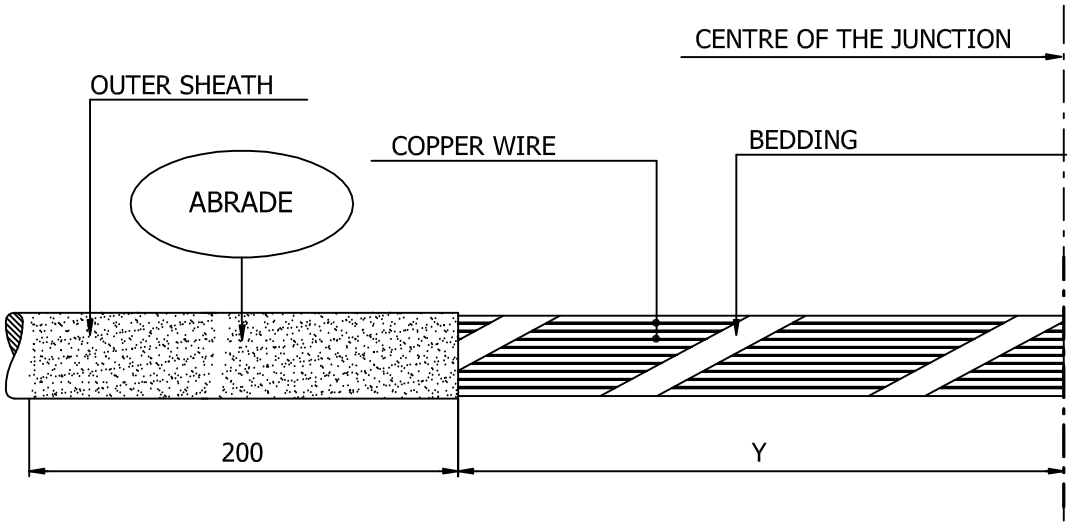
Length of "Dual wall" tube 	
	36 kV
500 mm	150 mm
600 mm	200 mm
800 mm	240 mm

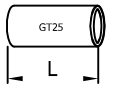
Tipo	Denominazione
36GTSIS1...	SINGLE CORE HEATSHRINKABLE STRAIGHT THROUGH SCREEN SECTIONALIZING JOINT

CABLE TYPE	Solid insulation (XLPE/HEPR)
SCREEN TYPE :	Copper wire screen
VOLTAGE :	Uo/U = 18/30 kV; Um = 36 kV
SECTIONS :	35 ÷ 1200 mm^2 Cu/Al

Nexans	Data	Rev.		IM1355BI
	11.01.17			Pagina 1/9
	Disegnato	Verificato	Approvato	
		M. Fiudello	M. Fiudello	

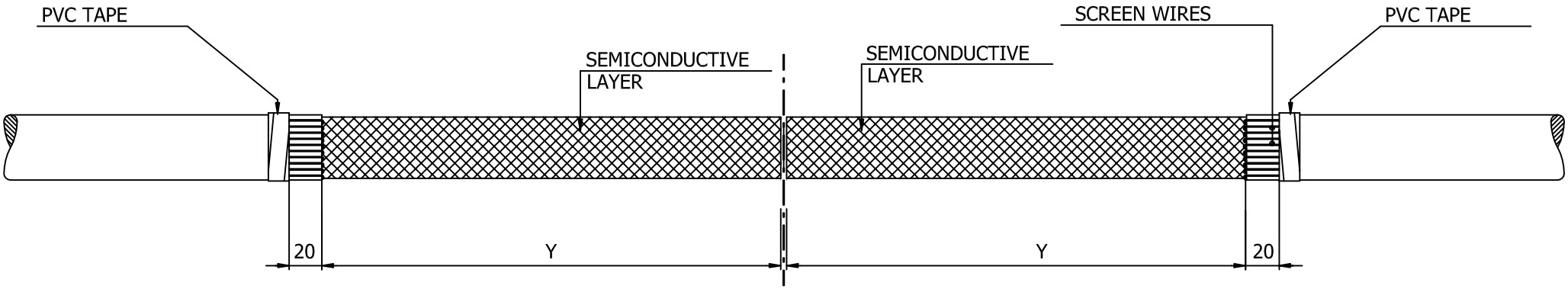
2. PREPARATION OF THE CABLE



Length of "Dual wall" tube 	Y
500 mm	290 mm
600 mm	340 mm
700 mm	390 mm
800 mm	450 mm

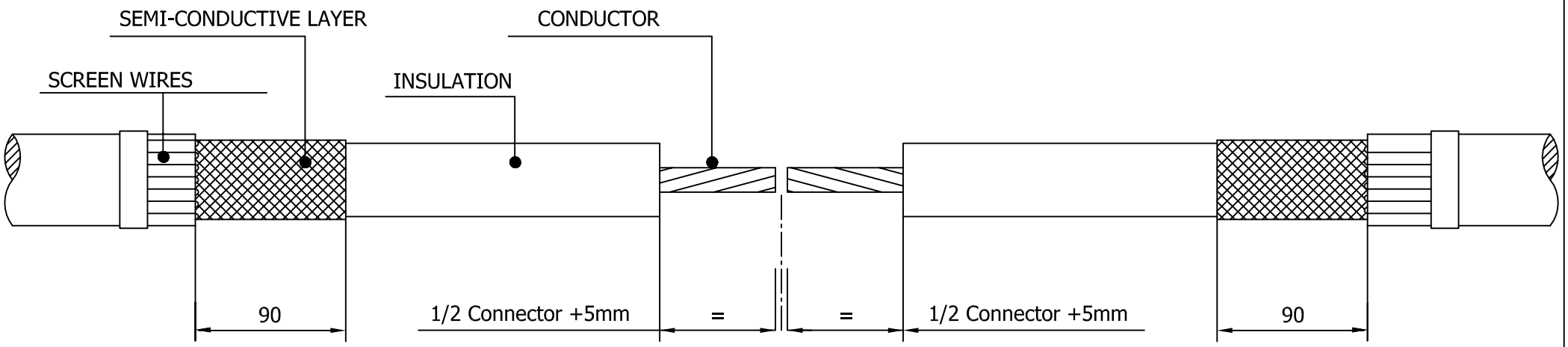
2.1 Remove the outer sheath for a length "Y" mm.

2.2 Abrade the outer sheath for 200 mm, starting from cut outer sheath. Clean the abraded area.



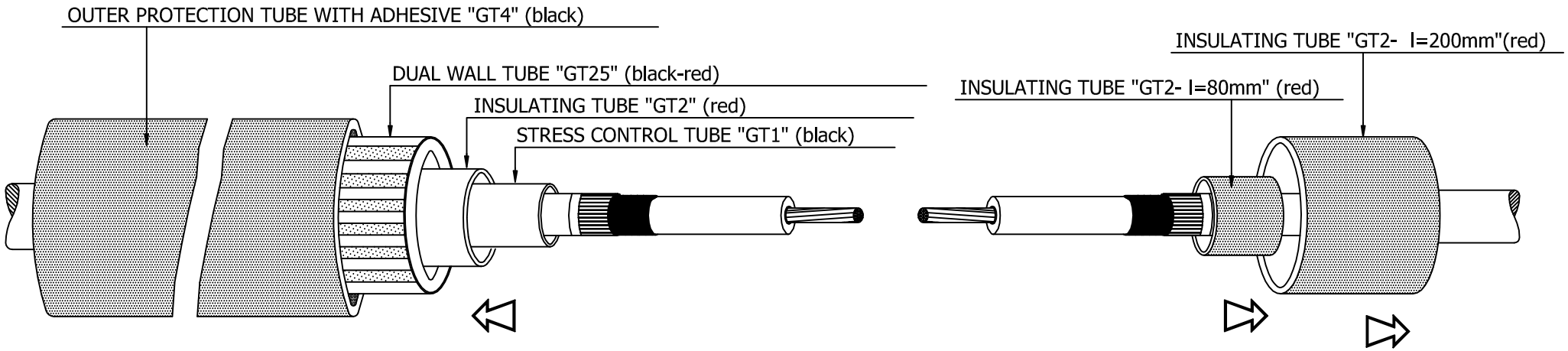
2.3 Cut the extruded bedding up to cut sheath. Fold back the screen wires and cut them at 20mm from cut outer sheath, fix with PVC tape.

2.4 Cut the cable at the lenght "Y" mm from the outer sheath.



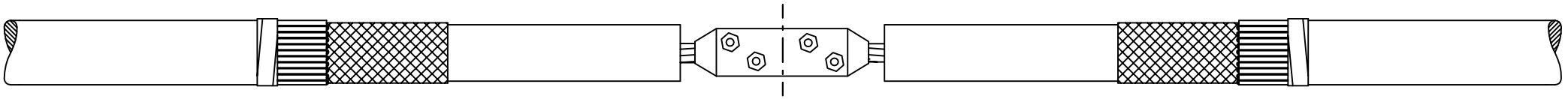
2.5 Remove the semi-conductive layer leaving out 90mm from the outer sheath taking care not to damage the insulation.

2.6 Bare the insulation for a length of half connector + 5mm.



2.7 Slide all the heatshrinking tubes onto both sides of the cable, as shown. (Before sliding the tubes apply some PVC tape around the edge of conductor wires to be removed when crimping the connector).

3. ASSEMBLY OF THE JOINT

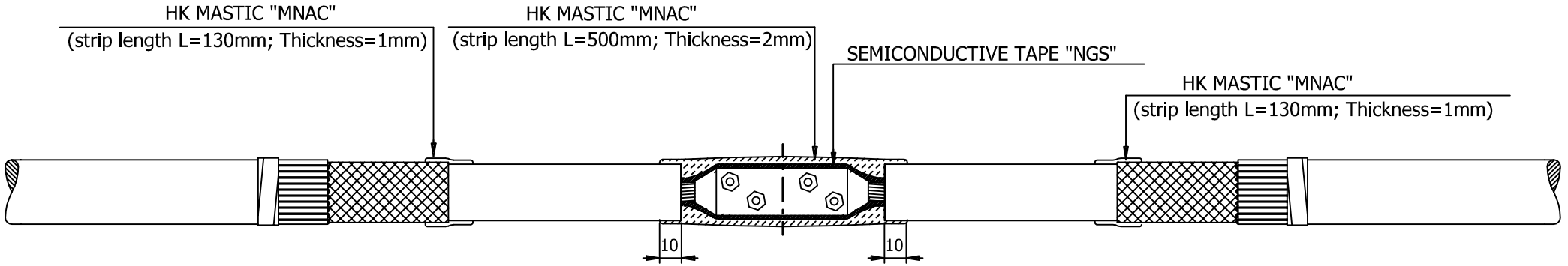


3.1 Insert the connector on the cable core and crimp using proper tools and dies. In case of indent compression fill the cavities with insulating mastic, while for circular/hexagonal compression.

3.2 In case of screw type connector follow the manufacture's instructions. Fill the cavities with insulating mastic.

3.3 Remove the eventual fins on the connector with a file or grain paper.

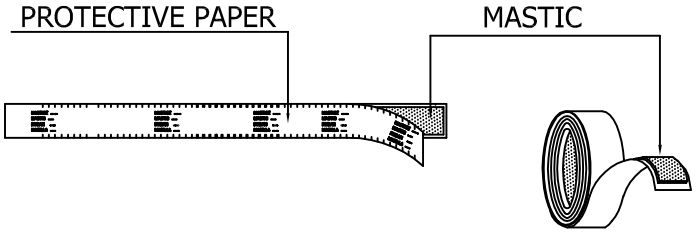
3.4 Clean the insulation.



3.5 Apply a layer of HK mastic ”MNAC” overlapping the semiconductive layer and the insulation of the cable (short mastic strip).

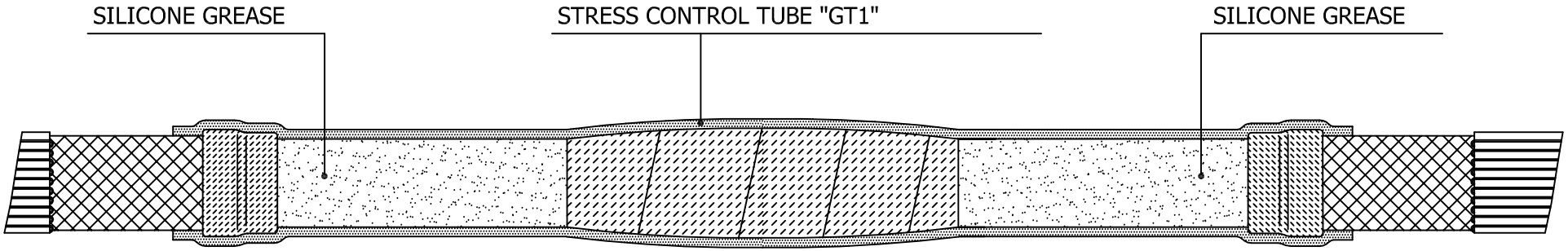
3.6 Apply a layer of "NGS" semi-conducting tape, 50% overlap, on the connector and on the bared conductor.

3.7 Fill the sloped area of the connector with HK mastic “MNAC” (strip with 500 mm length), as shown.



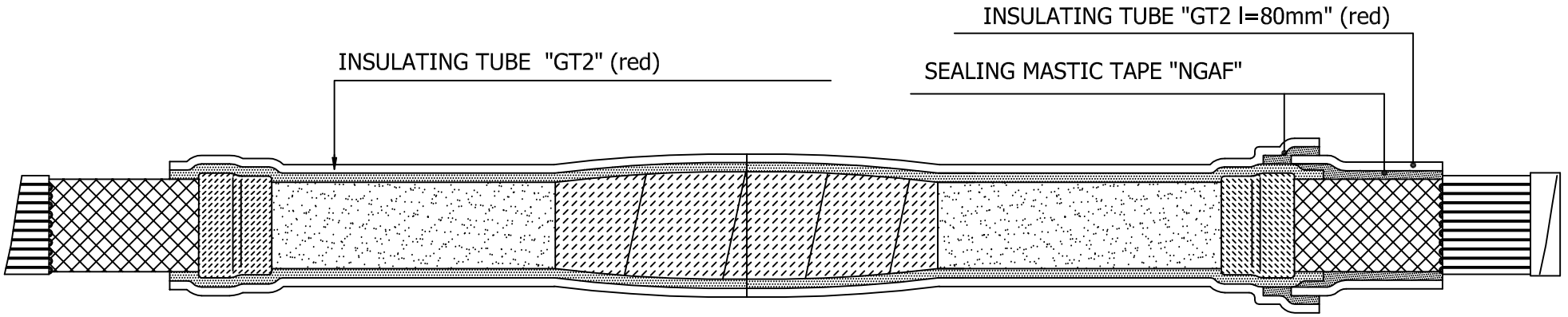
3.8 Level up the connector area with HK mastic “MNAC” (strip with 500 length) till reaching the insulation diameter plus 2 mm, covering the cable insulation for 10 mm at both sides.

3.9 Wrap the short strip of HK mastic around the cut semiconducting layer lighty stretching it.



3.10 Spread some silicone grease on the cable insulation.

3.11 Locate the stress control tube “GT1” in the centre of the junction and start heatshrinking from the centre towards the extremities.

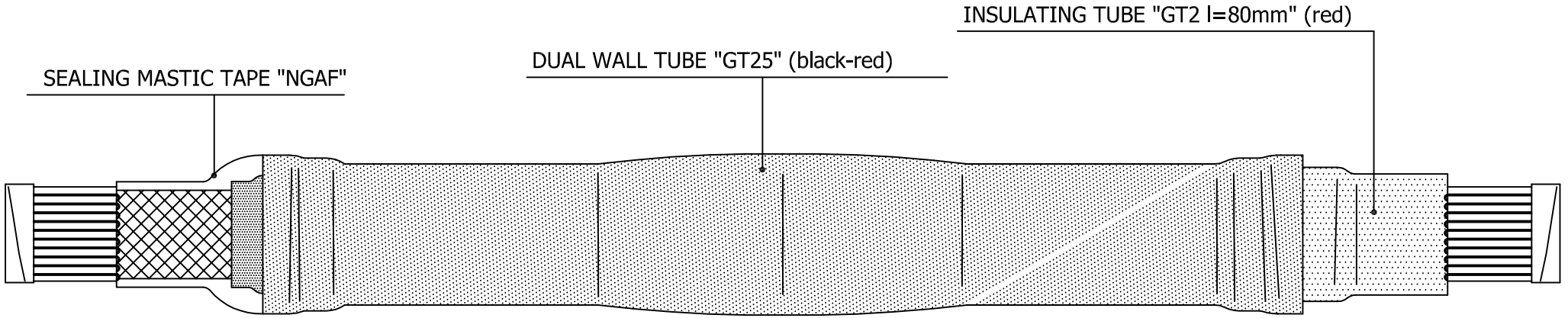


3.12 Apply a layer of sealing mastic tape "NGAF" covering the exposed semiconductive layer and the shrunk stress control tube "GT1". (50% overlap)

3.13 Locate the insulating tube "GT2 l=80mm" as shown and start heatshrink from the outer sheath towards the center of the joint.

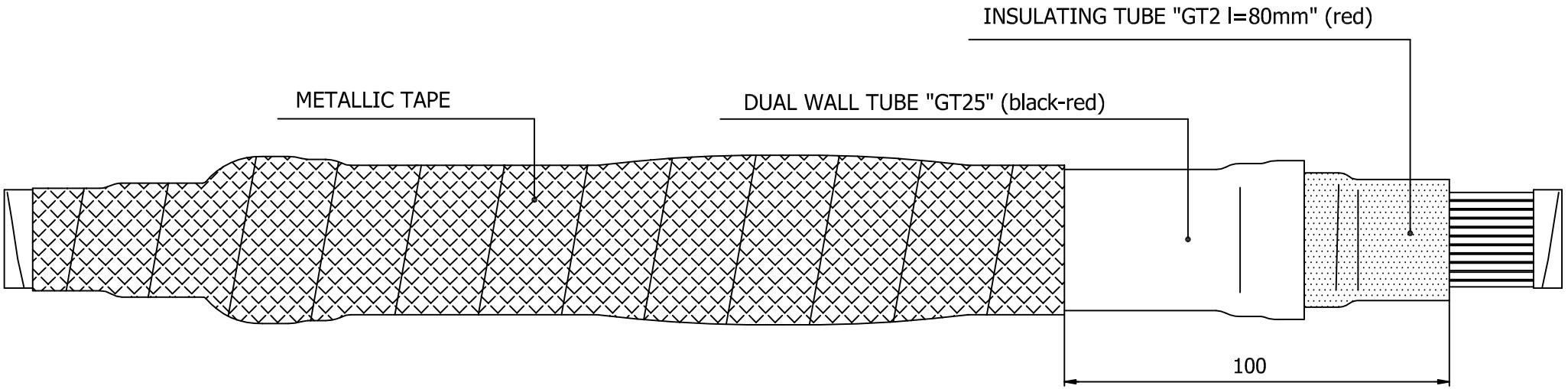
3.14 Apply one layer of sealing mastic tape "NGAF" over the edge of "GT2 tube l=80mm".

3.15 Locate the antitracking tube "GT2" in the centre of the junction and start heatshrinking from the centre towards the extremities.

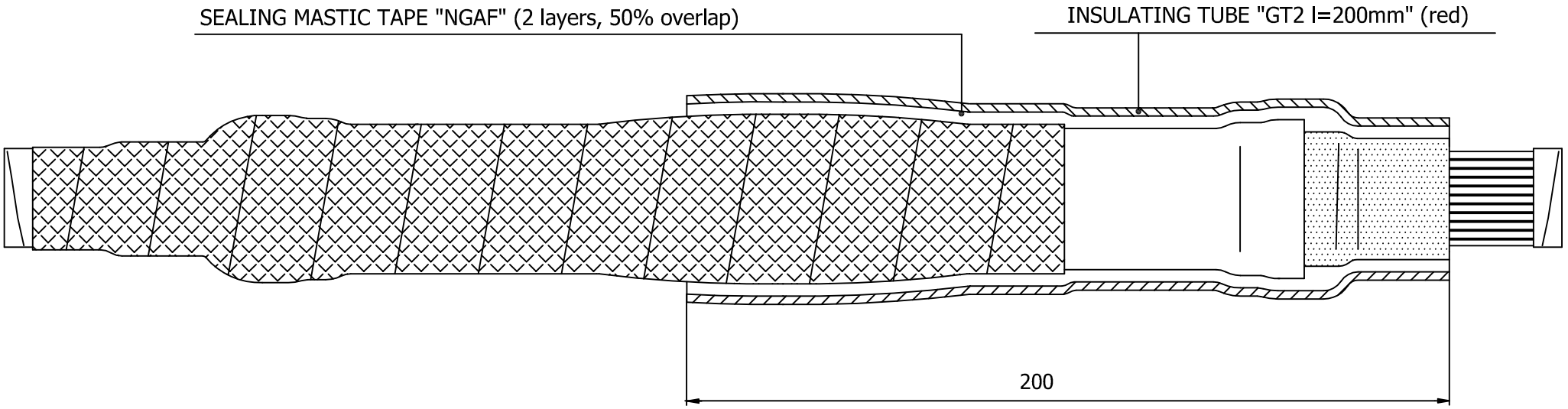


3.16 Position the dual wall tube "GT25" in the centre of the junction and start heatshrinking from the centre towards the extremities.

3.17 Apply the sealing mastic tape "NGAF" covering the exposed semiconductive layer of the cable (50% overlap.)
(Apply the tape till obtain an uniform shape covering also the edges of shrunk tubes.)

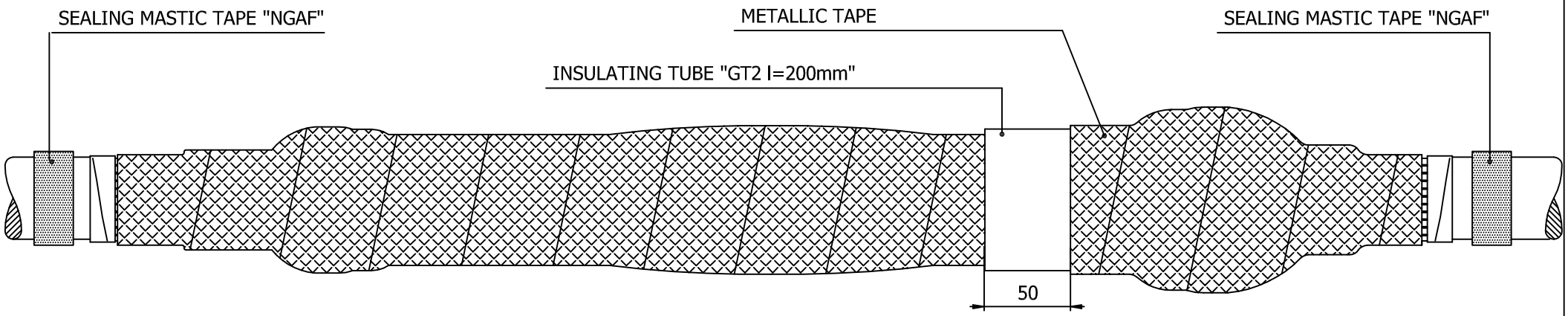


3.18 Apply a layer of metallic tape (the longer one), 30% ovelap, starting covering the copper wires for 20mm and finishing at 100mm from the outer sheath. Fix the tape with a knot.



3.19 Apply 2 layers of sealing mastic tape "NGAF" starting from cut outer sheath (50% overlap).

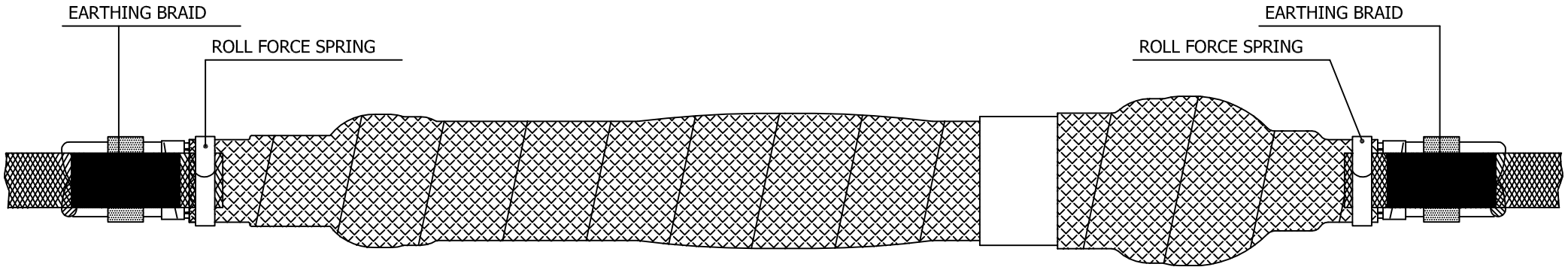
3.20 Position the insulating tube "GT2 l=200mm over the sealing mastic tape "NGAF" previously applied and start heatshrink from the outer sheat toward the center of the joint.



3.21 Apply a layer of metallic tape, 30% ovelap, starting covering the copper wires for 20mm and finishing at 50mm from the edge of shrunk insulating tube "GT2 l=200mm. Fix the tape with a knot.

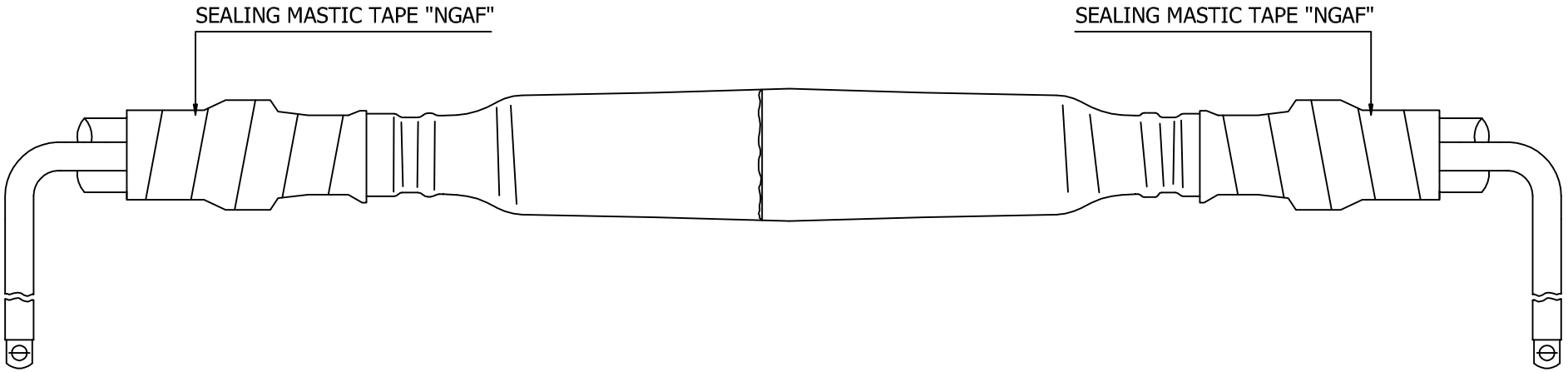
3.22 Clean the abraded area of the outer sheath.

3.23 Apply a layer of sealing mastic tape" NGAF" for 50mm on the outer sheath.

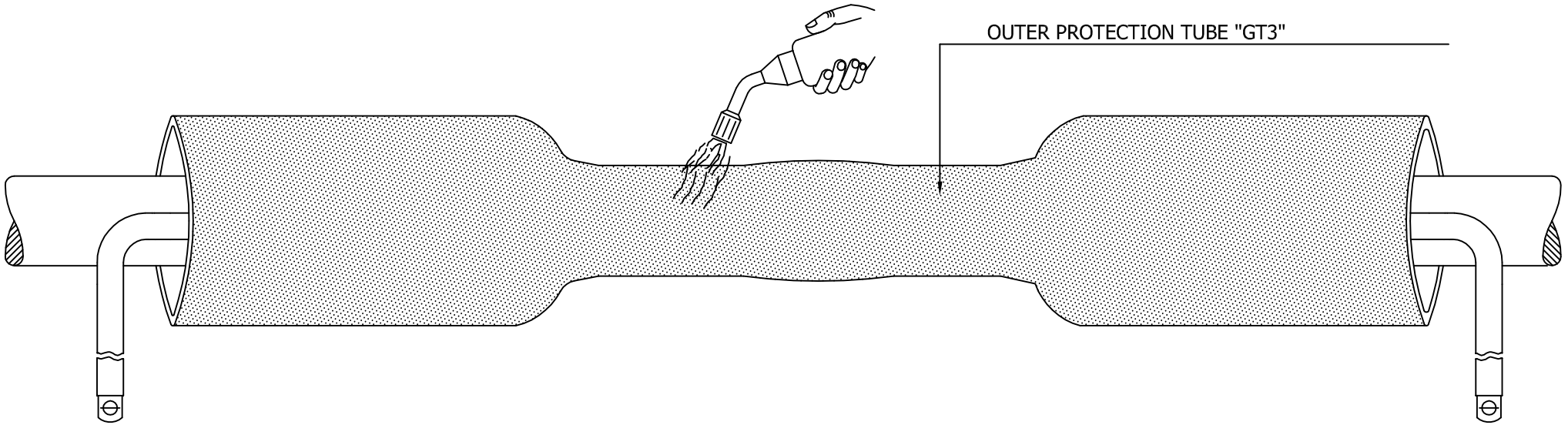


ONLY EARTHING CONNECTION OF SCREEN

3.24 Position the earthing braid on the copper wire screen and connect the braid to the wires with roll force spring. Wrap some PVC tape around the spring.



3.25 Apply one layer of sealing mastic "NGAF" on the extremities of the outer sheaths, till covering the inner protection tubes for about 10mm.(50% overlap).



3.26 Slide the outer protection tube "GT3" into position ensuring equal distance at both sides. Start heatshrinking from the centre towards the extremities.