DEH-41387

Instruction sheet

Gebrauchsanleitung

Instrukcja arkuza

-NEUTRAL SENSOR (ROGOWSKI COIL)

-NEUTRALWANDLER (ROGOWSKI SPULE)

DEH-41387 R02 R1213642 8/30/13

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4.4.9 Neutral Rogowski Coil:

- When an EntelliGuard device in a 3 pole configuration is used in a 4 wire network a fourth sensor needs to be placed in the Neutral. It also must be connected to the Trip Unit input as indicated elsewhere in the User Manual.
- The external neutral rogowski mounting kit comes with three mounting brackets, two fixing screws, two cable ties, one 2m long twisted pair extension lead and one neutral rogowski coil
- The mounting bracket has been designed so to fit a multiple number of standard neutral bar arrangement as illustrated on figures A, B and C
- As standard frame 1 breakers are provided with frame 1 external neutral rogowski coils. Likewise fame 2 breakers are provided with frame 2 external rogowski coils and frame 3 breakers with the frame 3 Rogowski coils.
- The neutral rogowski coil should be fitted in the correct location with respect to the neutral earth connection (restricted or unrestricted neutral). For further details consult application notes and drawings provided.
- The neutral rogowski coil should be positioned with the arrow facing the main bus bars as illustrated on figure A, B & C and shown diagrammatically on figures D and E.
- The 2m extension lead should next be plugged into the neutral rogowski coil flying lead and routed back to the breaker. The end connectors marked +ve and -ve should be terminated at the secondary disconnect in-line with connections shown on figure D and E. Using a longer extension lead than that provided may result in EMI affecting the performance of the trip unit
- **Important Note:**
  a. If no neutral sensor is in use, then a shorting jumper must be installed between the NRC+ and NRC- terminals
  b. If a neutral sensor is in use, it must be wired to these two terminals, and the shorting jumper must be removed.

Envelope 1	
Cat No	**Rating**
G04HNRC	400A
G07HNRC	630A
G08HNRC	800A
G10HNRC	1000A
G13HNRC	1250A
G16HNRC	1600A
G20HNRC	2000A

Envelope 2	
Cat No	**Rating**
G04MNRC	400A
G07MNRC	630A
G08MNRC	800A
G10MNRC	1000A
G13MNRC	1250A
G16MNRC	1600A
G20MNRC	2000A
G25MNRC	2500A
G32MNRC	3200A
G40MNRC	4000A

Envelope 3	
Cat No	**Rating**
G32LNRC	3200A
G40LNRC	4000A
G50LNRC	5000A
G64LNRC	6400A

Fig A: Frame 1 Rogowski

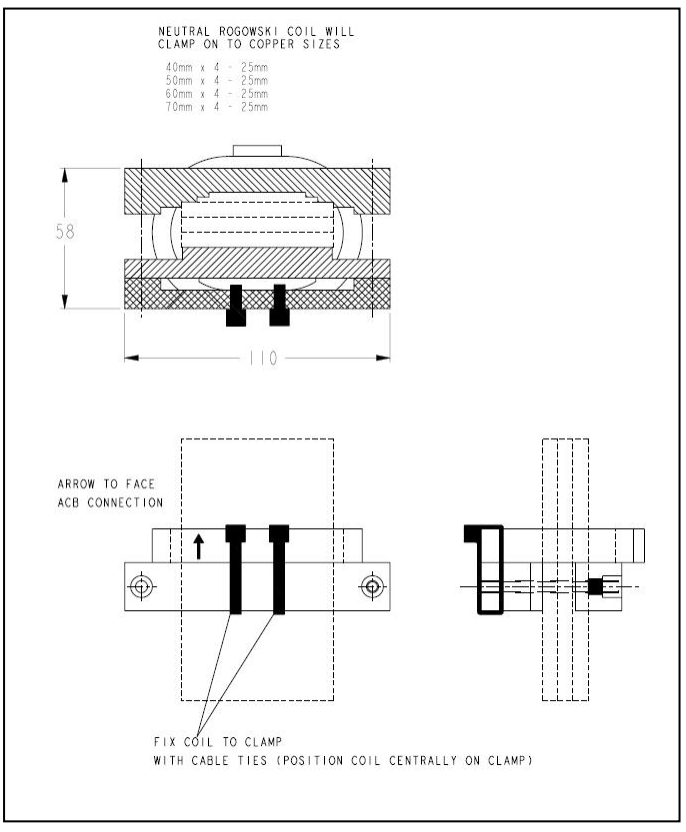

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Fig B: Frame 2 Rogowski

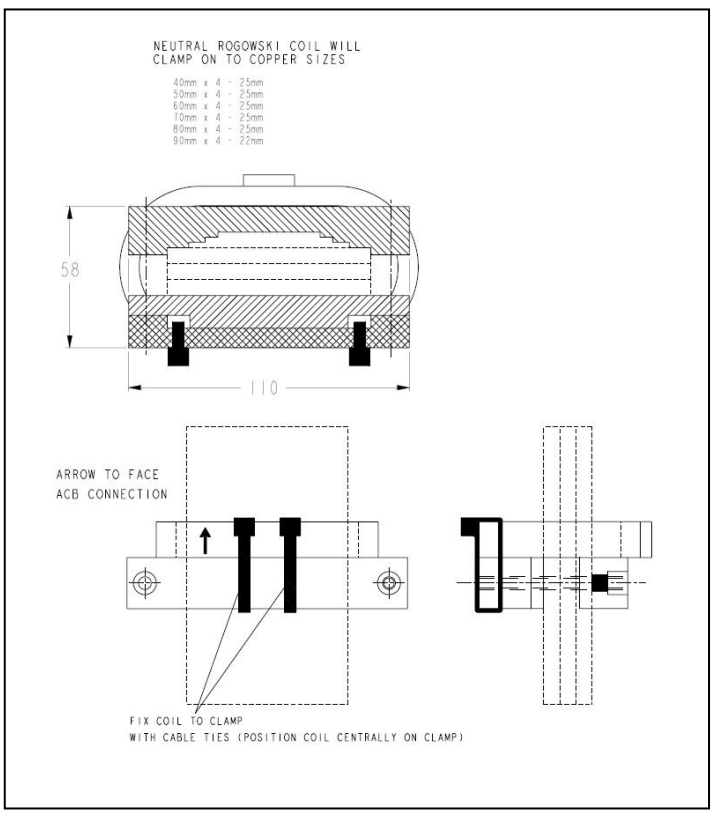

Fig C: Frame 3 Rogowski

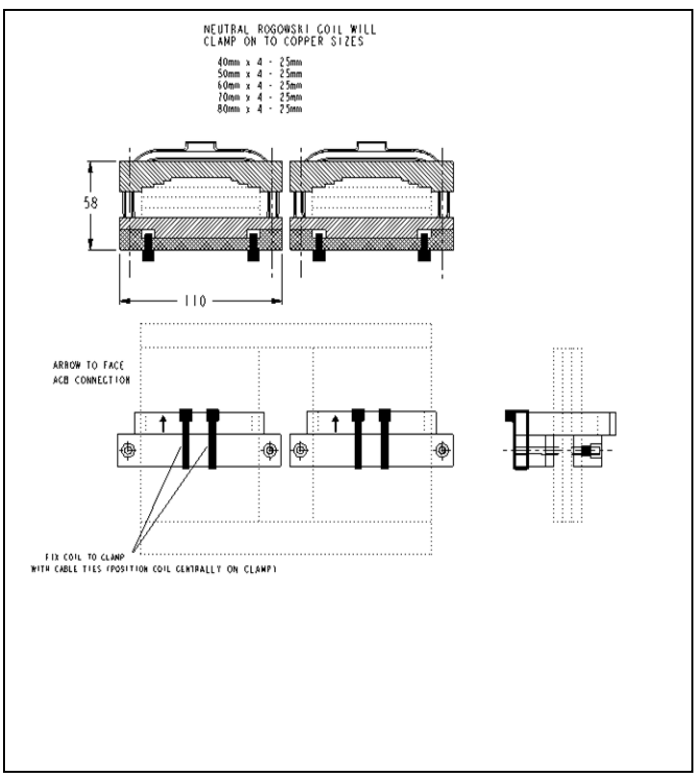

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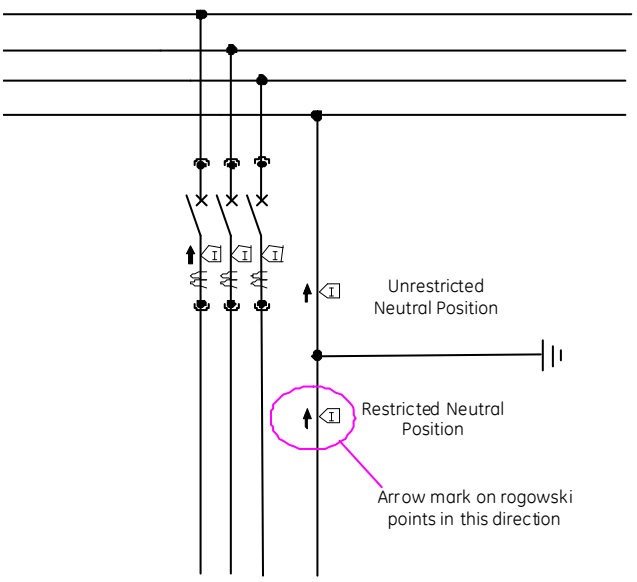
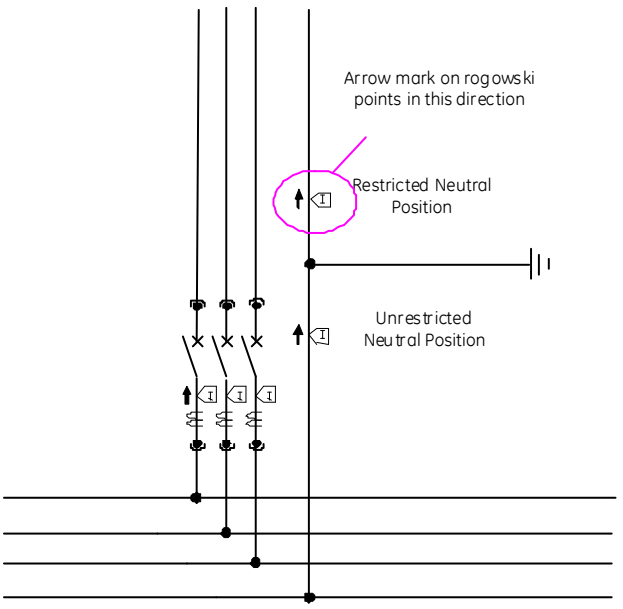
Figure D.
Diagram illustrating neutral rogowski coil fixing position and directions for applications where busbars connected to top terminals and cables connected to bottom terminal of ACB.



Termination at Secondary
disconnect terminals
+ve to A37 & -ve to A36

Figure E.
Diagram illustrating neutral rogowski coil fixing position and direction for applications where bus bars connected to bottom terminals and cables connected to top terminals of ACB.



Termination at Secondary
disconnect terminals
+ve to A37 & -ve to A36