

# IEC 61850 Certificate Level A<sup>1</sup>

No. 10069557-INC 18-2205

**Issued to:**

SELESOFT  
Via De Marini 1  
16149 Genova  
Italy

**For the client system:**

MP48 E+++ Remote Terminal Unit  
Software version: IEC61850-client 2.0.1  
CPU board: VDX-6356RD  
Hardware version: FB1-000012-BA  
S/N: 015

The client system has not been shown to be non-conforming to:

## IEC 61850 First Edition Parts 6, 7-1, 7-2, 7-3, 7-4 and 8-1

Communication networks and systems in substations

The conformance test has been performed according to IEC 61850-10 and UCAIug Conformance Test Procedures for Client System with IEC 61850-8-1 interface, revision 1.1 with TPCL<sup>2</sup> version 1.2 with client system's protocol, model and technical issue implementation conformance statements: "MP48 - IEC 61850 Ed. 1 Client/Server PICS, HA1-000007-AA-DS", "Model Implementation Conformance Statement for the IEC 61850 interface in SELESOFT MP48 IEC 61850 Ed.1 Client, HA1-000011-AA-DS" and "Tissues Implementation Conformance Statement for the IEC 61850 Ed1 interface in SELESOFT MP48, HA1-000010-AA-DS" and the extra information for testing: "SELESOFT MP48 IEC61850 Ed.1 Client PIXIT, HA1-000012-AA-DS".

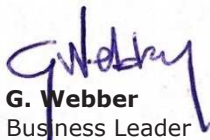
The following IEC 61850 conformance blocks have been tested with a positive result (number of relevant and executed test cases / total number of test cases):

1 Basic Exchange (15/22)	12a Direct Control (5/7)
4 Setting Group Selection (2/4)	12b SBO Control (6/9)
5 Unbuffered Reporting (13/18)	12c Enhanced Direct Control (5/7)
6 Buffered Reporting (17/22)	12d Enhanced SBO Control (6/9)
	13 Time Synchronization (2/4)

This certificate includes a summary of the test results as carried out at DNV GL in the Netherlands with UniCA IED Simulator version 6.1 and UniCA 61850 Analyzer version 5.34. This document has been issued for information purposes only, and the original paper copy of the DNV GL report No. 10069557-INC 18-2204 will prevail.

The test has been carried out on one single specimen of the product as referred above and submitted to DNV GL by SELESOFT. The manufacturer's production process has not been assessed. This certificate does not imply that DNV GL has approved any product other than the specimen tested.

Arnhem, February 27, 2018



**G. Webber**  
Business Leader  
Interoperability of Smart Power Systems

**Issued by:**



**DNV-GL**  
DNV KEMA is now DNV GL



**R. Schimmel**  
Verification Manager

<sup>1</sup> Level A - Independent test lab with certified ISO 9001 Quality System

<sup>2</sup> TPCL - Test procedures change list

Copyright © DNV GL Netherlands B.V. Arnhem, the Netherlands. All rights reserved. It is prohibited to update or change this certificate in any manner whatsoever, including but not limited to dividing it into parts.



Applicable Test Procedures from the UCAIug Conformance Test Procedures for Client System with IEC 61850-8-1 interface, revision 1.1 with TPCL version 1.2

<b>Conformance Block</b>	<b>Mandatory</b>	<b>Conditional</b>
1: Basic Exchange	cAss1, cAss2, cAss3, cAss4, cAssN1, cAssN4, cAssN5, cAssN6	cAssN7, cSrv4, cSrv5, cSrvN1, cSrvN3, cSrvN5, cSrvN6
4: Setting Group Selection	cSg2, cSgN1	
5: Unbuffered Reporting	cRp3, cRp4, cRp5, cRp8, cRp9, cRp10, cRpN2, cRpN3, cRpN7, cRpN8	cRp7, cRpN4, cRpN6
6: Buffered Reporting	cBr3, cBr4, cBr5, cBr8, cBr9, cBr10, cBr11, cBr12, cBrN2, cBrN3, cBrN7, cBrN8, cBrN9	cBr7, cBr13, cBrN4, cBrN6
12a: Direct Control	cCtl4, cCtlN1, cDOns1, cDOns2	cCtl2
12b: SBO Control	cCtl4, cCtlN1, cSBOns1, cSBOns2, cSBOns3	cCtl2
12c: Enhanced Direct Control	cCtl4, cCtlN1, cDOes1, cDOes2	cCtl2
12d: Enhanced SBO Control	cCtl4, cCtlN1, cSBOes1, cSBOes2, cSBOes3	cCtl2
13: Time sync	cTm1	cTm2