61850-7-5 and 61850-7-500 - IEC61850-7-5 #7157

Use of PTRC.Op to issue trip to PIU

03/11/2025 10:24 AM - Vladan Cvejic

Status:	New	**Start date:**	02/21/2025
Priority:	Normal	**Due date:**	
Assignee:	Keith Gray	**% Done:**	0%
Category:			
Target version:			
Source:		**TF 7-5 Project document:**	-
Category:	Not yet categorized	**Related TISSUE:**	

Description

During IOP 2024, an IED do not have the DO PTRC.Tr in its data model to issue a trip to the PIU. It uses PTRC.Op.
https://redmine.ucaiug.org/issues/6960

See IEC 61850-7-4 Ed2.1 Subclause 6.11.1:
« The protection functions provide (if applicable) the data object Op (Operate) without direction information. The data object Op is conditioned by LN PTRC resulting in the data object Tr ("real" trip), that in between every protection LN and the circuit breaker node XCBR shall be a LN PTRC . »

Does the standard allow an IED that does not perform conditioning not to implement PTRC.Tr?

The IEC 61850 standard should limit the number of ways to issue a trip between different IEDs. As pDO could be used in PIU to specify the expected input, if only PTRC.Op exists, it would not match.

Related issues:

Copied from IEC 61850 User Feedback Task Force - Support #7134: Use of PTRC.O...	**Resolved**	**02/21/2025**

History

#1 - 03/11/2025 10:24 AM - Vladan Cvejic

- Copied from Support #7134: Use of PTRC.Op to issue trip to PIU added