Dear Reader,

A new version of IED Connectivity Package for the Relion® 650 series products has been released. The designation of this IED Connectivity Package is 2.1.

The 650 series covers a complete set of applications from generator protection, transformer protection and control to busbar protection, line protection, breaker protection and bay control. With the introduction of version 2.1 of the 650 series, we further expand the application areas, enhancing the system functionality and flexibility. Key system features like support for central account management for integration with a centralized authentication infrastructure offers a secure and efficient solution for access control to the IEDs. In the Relion 650 series version 2.1, we have added a line differential protection to the portfolio, RED650.

New features and benefits
This new version of the IED Connectivity Package (IED ConnPack) for Relion 650 series enables the interaction between the 650 series version 2.1 IEDs for IEC and ANSI applications and the Protection and control IED manager PCM600 version 2.7 or later.

The new IED ConnPack enables handling of centralized account management, certificate management, forcing of binary inputs and outputs, composite function blocks, IEC 61850 Ed 2 support, read of serial number and firmware version, configuration mode support and flexible product naming from the 650 series version 2.1.

The new connectivity package enables support for the following new features in PCM600 version 2.7:

- Batch read/write of configurations
- Account Management Tool (support for Centralized Account Management and Certificate Management)
- Windows 8 and 10, with native 32 and 64 bit
- IED Summary display provides summary of most important IED properties
- Complete read of IEC 61850 data from IED (including GOOSE)
- Synchronization of SNTP server addresses between SCL and PCM600

For detailed information on what is new in the 650 series version 2.1 IEDs for IEC and ANSI applications, please refer to the release note 1MRG022616.
**Supported products**

The IED ConnPack version 2.1 for 670 series is compatible with, and supports, the following products:

- 650 series IEDs version 2.1 for IEC and ANSI applications
- 650 series IEDs version 1.3 for IEC and ANSI applications
- 650 series IEDs version 1.2.1 for IEC and ANSI applications
- 650 series IEDs version 1.2.0 for ANSI applications
- 650 series IEDs version 1.1 for IEC and ANSI applications
- 650 series IEDs version 1.0 for IEC applications
- Protection and Control IED Manager PCM600 version 2.7 or later

**Installation of this IED Connectivity Package**

To install the IED ConnPack for 650 series, please follow the instruction below:

1. Ensure that PCM600 version 2.7 or later has been installed
2. Install the IED Connectivity Package version 2.1 for 650 series
3. Install required IED modules

The Connectivity Package and IED modules can be installed from the DVD or from the PCM600 version 2.7 Update Manager. Please note that this IED Connectivity Package must be installed to be able to interact with the 650 series IEDs via PCM600 tool.

**Support for PCM600 version 2.7**

The Connectivity Package for 650 series IEDs contains object types and methods for PCM600 tool. Modules for REB650, REC650, RED650, REG650, REL650, REQ650 and RET650 provide support for the following functionalities:

- Application configuration
- Parameter setting with graphical support
- Signal matrix
- Graphical display editor
- Signal monitoring
- Disturbance handling
- Event viewer (internal, process and security events)
- Communication management
- User Management (IEDUM and Account Management)
- IED Configuration Migration
- IED Summary
- Flexible Product Naming

**IED Configuration Migration**

This revision of the IED Connectivity Package for 650 series products features IED Configuration Migration tool component for migrating a 650 release to any later 650 release but version 2.1. There is no migration possible for version 1.0, 1.1, 1.2 or 1.3 to version 2.1.

**NOTE:** We highly recommend making a back-up of the project or configuration prior any migration activity.

Details regarding the migration process are available in the document “Configuration Migration for 650 series in PCM600 Ver. 2.7 and later”, 1MRG022338.
Known issues and limitations
There are known issues and limitations related to the new IED Connectivity Package and the data migration. For more information please refer to the “Read Me” file, 1MRG022590.

IED Connect - a unique concept
The IED Connect provides you an IED specific connectivity package that contains a complete description of the protection and control IEDs you have ordered. This description consists, for instance, of data signals, parameters, addresses and IED documentation.

The signal data is configured based on the information provided by the connectivity package, which allows you to efficiently establish connection between the IED and the IED tools (e.g. Protection and control IED manager PCM600). Additionally the IED Connect simplifies the system engineering and minimizes the risk of errors in integration of the IEDs in ABB’s system products and tools (e.g. MicroSCADA Pro, SDM600 and COM600 Station Automation series).

Ordering and delivery
The IED Connect DVD containing the IED Connectivity Package version 2.1 for 650 series is automatically included in the product delivery. The IED Connectivity Package on the IED Connect DVD contains the complete technical documentation of the 650 series version 1.1 (IEC and ANSI), version 1.3 (IEC and ANSI) and version 2.1 (IEC and ANSI).

The new version of the IED Connectivity Package can also be downloaded via the PCM600 Update manager, together with the required IED modules for the above mentioned product releases.

Kind regards,

Krister Hagman
Global Product Manager
Substation Automation Products