Platform MX6
Software option S101
CODESYS BACnet

1   Identification

Identification	
Option ID	S101
Order number	S-05000302-0000
Short name	CODESYS BACnet
Brief description	With the help of this software option, it is possible to integrate the control in a BACnet network for building automation.
Revision ID document	V3.0

2   System requirements and restrictions

System requirements and restrictions	
Supported platforms and devices	Berghof PLC devices of the MX6 platform (e.g.: MCs, CCs, DCs). Additional information regarding availability and compatibility can be found in options section of the product catalog.
Firmware	MX6-PLC from version 1.3.1, CODESYS from 3.5 SP5 Patch 4
Additional requirements	— IP network connection
Restrictions	—

3　Product description

BACnet is a worldwide standardized protocol for communication of building management system components. It is standardized by the organizations ASHRAE, ANSI and ISO 16484-5. The aim of BACnet is the high interoperability of building management systems across manufacturer borders.

With this extension it is possible to operate the control in a BACnet network.
The BACnet extension is based on the BACnet implementation of 3S for CODESYS.

The extension consists of a BACnet runtime component in the firmware, which provides the BACnet stack. The corresponding BACnet package for the CODESSYS programming environment contains the BACnet configurator, the interface library and the device descriptions of supported BACnet objects. Properties of BACnet objects can be made available for reading or writing via the interface library. In simple cases (e.g. Read Property or Write Property) no code has to be written. More complex functionalities are implemented by hooks in the user program.

For full documentation of the BACnet configuration menus please check the CODESYS Online help under:
https://help.codesys.com/webapp/_bacnet_overview;product=codesys_bacnet;version=1.5.1.0

4　Technical data

Technical data	
Protocol	BACnet/IP
BACnet objects	Analog Input, Analog Output, Analog Value, Binary Input, Binary Output, Binary Value, Calendar, Command, Multi-Stat Input, Event Enrollment, File, Loop, Multi-State Output, Multi-State Value, Notification Class, Pulse Converter, Schedule, Structured View, Trend Log, Trend Log Multiple, Event Log, Accumulator, Averaging, Program
BACnet services	Read Property, Read Property Multiple, Write Property, Write Property Multiple, Read Range, Remove List Element, Add List Element, Subscribe COV, Subscribe COV Property, Read File, Write File, Create Object, Delete Object, Device Comm Control, Reinitialize Device, Time Synchronization, UTC Time Synchronization, Acknowledge Alarm, Get Alarm Summary, Get Enrollment Summary, Get Event Info