### **BACnet Protocol Implementation Conformance Statement**

Date: Nov 21, 2014 (updated November 25, 2016) Vendor Name: Honeywell International, Inc Product Name: a1 series BACnet controller

Product Model Numbers: UC5533, UC6002, PUC5533, PUC6002

Application Software Version: Application xxxx Firmware Revision: HIMA 00.09.13 BACnet Protocol Revision: 4

#### **Product Description:**

The a1 series BACnet controller is a Pre-programmed and Configurable controller working with the portable HMI tool and designed for common used HVAC applications. The controller may be used in stand alone or networked applications where a BACnet network is required.

### **BACnet Standardized Device Profile (Annex L):**

□ BACnet	Operator	Workstation (	(B-OWS)
	D 11.11	C 4 11 (D	D(C)

☐ BACnet Building Controller (B-BC)

☐ BACnet Advanced Application Controller (B-AAC)

X BACnet Application Specific Controller (B-ASC)

☐ BACnet Smart Sensor (B-SS)

☐ BACnet Smart Actuator (B-SA)

## List all BACnet Interoperability Building Blocks Supported (Annex K):

BIBB	Service	Initiates	Responds to
DS-RP-A/B	ReadProperty	X	X
DS-RPM-B	ReadPropertyMultiple		X
DS-WP-A/B	WriteProperty	X	X
DS-WPM-B	WritePropertyMultiple		X
DS-COV-B	SubscribeCOV		X
DS-COV-B	ConfirmedCOVNotification	X	
DS-COV-B	UnconfirmedCOVNotification	X	
DM-DDB-A/B	Who-Is	X	X
DM-DDB-A/B	I-Am	X	X
DM-DOB-B	Who-Has		X
DM-DOB-B	I-Have	X	
DM-DCC-B	DeviceCommunicationControl		X
DM-TS-B	TimeSynchronization		X
DM-UTC-B	UTCTimeSynchronization		X

Segmentation Capability:		
☐ Segmented requests supported	Window Size	
☐ Segmented responses supported	Window Size	

### **Standard Object Types Supported:**

An object type is supported if it may be present in the device. For each standard Object Type supported provide the following data:

- 1) Whether objects of this type are dynamically creatable using the CreateObject service
- 2) Whether objects of this type are dynamically deletable using the DeleteObject service
- 3) List of the optional properties supported
- 4) List of all properties that are writable where not otherwise required by this standard
- 5) List of proprietary properties and for each its property identifier, datatype, and meaning
- 6) List of any property range restrictions

Note: none of the object types listed in this section is dynamically creatable or dynamically deletable.

Note: the BACnet conformance codes are as follows:

- O Optional (may be required under some conditions)
- R Required, but not required to be writable (may be required to be writable under some conditions)
- W Not only required, but also required to be writable

The following codes are used in this document to describe how the properties are implemented:

R/W - Read/write R/O - Read-only

R/O=value - Implemented as a read-only with the indicated value

**Device Object** 

Property	BACnet Conf Code	Implementation
Object Identifier	R	R/W
Object Name	R	R/W
Object_Type	R	R/O="device"
System_Status	R	R/O="operational"
Vendor_Name	R	R/O
Vendor_Identifier	R	R/O
Model_Name	R	R/O
Firmware_Revision	R	R/O
Application_Software_Version	R	R/O
Protocol_Version	R	R/O=1
Protocol_Revision	R	R/O=4
Protocol_Services_Supported	R	R/O
Protocol_Object_Types_Supported	R	R/O
Object_List	R	R/O
Max_APDU_Length_Accepted	R	R/O=206
Segmentation_Supported	R	R/O="none"
Local_Time	О	R/O
Local_Date	О	R/O
UTC_Offset	О	R/W
Daylight_Savings_Status	О	R/O
APDU_Timeout	R	R/W
Number_Of_APDU_Retries	R	R/W
Device_Address_Binding	R	R/O=empty list
Database_Revision	R	R/O=0
Max_Master	О	R/W
Max_Info_Frames	О	R/W
location	О	R/W
description	О	R/W
Active_COV_Subscriptions	О	R/O

**Program Object** 

Property	BACnet Conf Code	Implementation
Object_Identifier	R	R/O
Object_Name	R	R/O
Object_Type	R	R/O="program"
Description	О	R/O
Program_Change	W	R/W
Program_State	R	R/O
Status_Flags	R	R/O="all normal"
Out_Of_Service	R	R/O=FALSE

File Object

Property	BACnet Conf Code	Implementation
Object_Identifier	R	R/O
Object_Name	R	R/O
Object_Type	R	R/O="file"
Description	О	R/O
File_Type	R	R/O="" (empty string)
File_Size	R	R/O
Modification_Date	R	R/O
Archive	W	R/O=FALSE
Read_Only	R	R/O
File_Access_Method	R	R/O=stream access

**Analog Input** 

Property	BACnet Conf Code	Implementation
Object_Identifier	R	R/O
Object_Name	R	R/O
Object_Type	R	R/O="analog-input"
Present_Value	R	R/O
Status_Flags	R	R/O="all normal"
Event_State	R	R/O="normal"
Out_Of_Service	R	R/O=FALSE
Units	R	R/O

**Analog Output** 

Property	BACnet Conf Code	Implementation
Object_Identifier	R	R/O
Object_Name	R	R/O
Object_Type	R	R/O="analog-output"
Present_Value	W	R/W
Status_Flags	R	R/O="all normal"
Event_State	R	R/O="normal"
Out_Of_Service	R	R/O=FALSE
Units	R	R/O
Priority_Array	R	R/O
Relinquish_Default	R	R/W

**Analog Value** 

Property	BACnet Conf Code	Implementation
Object_Identifier	R	R/O
Object_Name	R	R/O
Object_Type	R	R/O="analog-value"
Present Value	R	R/W
Status_Flags	R	R/O="all normal"

Event_State	R	R/O="normal"
Out_Of_Service	R	R/O=FALSE
Units	R	R/O

**Binary Input** 

Property	BACnet Conf Code	Implementation
Object_Identifier	R	R/O
Object_Name	R	R/O
Object_Type	R	R/O="binary-input"
Present_Value	R	R/O
Status_Flags	R	R/O="all normal"
Event_State	R	R/O="normal"
Out_Of_Service	R	R/O=FALSE
Polarity	R	R/O

**Binary Output** 

Property	BACnet Conf Code	Implementation
Object_Identifier	R	R/O
Object_Name	R	R/O
Object_Type	R	R/O="binary-output"
Present_Value	W	R/W
Status_Flags	R	R/O="all normal"
Event_State	R	R/O="normal"
Out_Of_Service	R	R/O=FALSE
Polarity	R	R/O
Priority_Array	R	R/O
Relinquish_Default	R	R/W

**Binary Value** 

Property	BACnet Conf Code	Implementation
Object_Identifier	R	R/O
Object_Name	R	R/O
Object_Type	R	R/O="binary-value"
Present_Value	R	R/W
Status_Flags	R	R/O="all normal"
Event_State	R	R/O="normal"
Out_Of_Service	R	R/O=FALSE

# Multi-state Value

Property	BACnet Conf Co	de Implementation
Object_Identifier	R	R/O
Object_Name	R	R/O
Object_Type	R	R/O="multi-state-
		value"
Present_Value	R	R/W
Status_Flags	R	R/O="all normal"
Event_State	R	R/O="normal"
Out_Of_Service	R	R/O=FALSE
Number Of States	R	R/O

Data Link Layer Options:				
X MS/TP master (Clause 9), b ☐ MS/TP slave (Clause 9), ba ☐ Point-To-Point, EIA 232 (C	ARCNET (Clause 8) ARCNET (Clause 8), baud rate(s) aud rate(s): 9600, 19200, 38400, 76800, ud rate(s): Clause 10), baud rate(s): lause 10), baud rate(s): lause 10), baud rate(s):	, 115200		
Device Address Binding:				
Is static device binding support other devices.) □Yes X?	`	o-way communication with MS/TP slaves and certain		
Networking Options:				
□ Router, Clause 6 - List all routing configurations, e.g., ARCNET-Ethernet, Ethernet-MS/TP, etc. □ Annex H, BACnet Tunneling Router over IP □ BACnet/IP Broadcast Management Device (BBMD) Does the BBMD support registrations by Foreign Devices? □ Yes □ No				
Character Sets Supported:				
Indicating support for multiple	e character sets does not imply that they	can all be supported simultaneously.		
X ANSI X3.4 X ISO 10646 (UCS-2)	☐ IBM-/Microsoft- DBCS ☐ ISO 10646 (UCS-4)			
If this product is a communi gateway supports:	cation gateway, describe the types of	non-BACnet equipment/networks(s) that the		