



# ADDENDA

**ANSI/ASHRAE Addendum bq to  
ANSI/ASHRAE Standard 135-2016**



# A Data Communication Protocol for Building Automation and Control Networks

Approved by ASHRAE on June 15, 2018, and by the American National Standards Institute on June 15, 2018.

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**[This foreword and the “rationales” on the following pages are not part of this standard. They are merely informative and do not contain requirements necessary for conformance to the standard.]**

## FOREWORD

*The purpose of this addendum is to present changes to ANSI/ASHRAE Standard 135-2016. These modifications are the result of change proposals made pursuant to the ASHRAE continuous maintenance procedures and of deliberations within Standing Standard Project Committee 135. The changes are summarized below.*

**135-2016bq-1. Fix the Absentee\_Limit property of the Access Credential object type, p. 2.**

**135-2016bq-2. Ensure that the denied or granted access event is generated last, p. 3.**

In the following document, language to be added to existing clauses of ANSI/ASHRAE Standard 135-2016 is indicated through the use of *italics*, while deletions are indicated by ~~strike through~~. Where entirely new subclauses are added, plain type is used throughout.

The use of placeholders like X, Y, Z, X1, X2, etc., should not be interpreted as literal values of the final standard. These placeholders will be assigned actual numbers/letters only with incorporation of this addendum into the standard for republication.

**135-2016bq-1. Fix the Absentee\_Limit property of the Access Credential object type.**

**Rationale**

For the Absentee\_Limit property, it is not clear if zero is a valid value for the Absentee\_Limit property. The calculation of the absentee limit should be based on date only, not time and date. If the Absentee\_Limit property exists in the Access Credential object but there is no absentee limit, then it is ambiguous as to what value it should be set to.

The following changes correct and clarify the Absentee\_Limit property accordingly.

[Change **Table 12-40**, p. 382]

**Table 12-40.** Properties of the Access Credential Object Type

Property Identifier	Property Datatype	Conformance Code
...		
Absentee_Limit	<del>Unsigned</del> Unsigned16	O <sup>1</sup>
...		

<sup>1</sup> If this property is present, then the property Last\_Use\_Time shall also be present.

[Change **Clause 12.35.16**, p. 387]

**12.35.16 Absentee\_Limit**

This property, of type ~~Unsigned~~ Unsigned16, specifies the maximum number of consecutive days *during which the credential this object represents is unused for which the credential can remain inactive (i.e., unused)* before it becomes disabled. The calculation of *consecutive days inactivity duration* is based on the ~~time~~ date of last use as indicated by the property Last\_Use\_Time. If Last\_Use\_Time does not have a valid time and date, then the absentee limit shall be considered to not be exceeded.

*An Absentee\_Limit of 0 specifies that the credential this object represents must be used every day to avoid being disabled due to inactivity.*

When the absentee limit is exceeded, the Access Credential shall be disabled and the value DISABLED\_INACTIVITY shall be added to the Reason\_For\_Disable list. The value DISABLED\_INACTIVITY shall be removed from the list when this condition no longer applies.

*If this property is present and has the value 65535, then the credential this object represents shall never be disabled due to inactivity.*

If Absentee\_Limit is present, Last\_Use\_Time shall also be present.

**135-2016bq-2. Ensure that the denied or granted access event is generated last.**

**Rationale**

A single access transaction may generate multiple access events. For example, a person presenting a credential at a door may generate the following events:

GRANTED  
PASSBACK\_DETECTED ("soft passback" only reports but does not deny access)  
TRACE

Currently, BACnet does not mandate the order in which the events are generated. If the previous events were generated in the order shown above, the last event is the TRACE event. This is the event that remains indicated by the Access Point object until the next transaction takes place. However, this does not give the operator a useful indication of what happened during the last transaction. It is preferable that the GRANTED event is the last event generated in a transaction.

The following change mandates that when multiple events are generated within a single access transaction then the denied or granted event shall be generated last.

[Change **Clause 12.31.27.1**, p. 359]

**12.31.27.1 Operations for setting the Access\_Event property**

When a new event occurs at the access point, the following series of operations shall be performed atomically:

The value written to Access\_Event shall be stored in the Access\_Event property,

- (1) If this event is the start of a new access transaction, the value of the Access\_Event\_Tag property shall be incremented.
- (2) The current date and time shall be stored in the Access\_Event\_Time property.
- (3) The reference to the Access Credential object that is associated with this event shall be stored in the Access\_Event\_Credential property. See Clause 12.31.30 for other conditions.
- (4) The value of the authentication factor that is associated with this event shall be stored in the Access\_Event\_Authentication\_Factor property. See Clause 12.31.31 for other conditions.

*When a single access transaction causes multiple access events to be generated, then the granted event or the denied event shall be the final event generated. If none of the multiple events are granted or denied events, then the resulting events can be generated in any order.*

[Add a new entry to **History of Revisions**, p. 1364]

**(This History of Revisions is not part of this standard. It is merely informative and does not contain requirements necessary for conformance to the standard.)**

#### HISTORY OF REVISIONS

...	...	...
1	20	<b>Addendum <i>bq</i> to ANSI/ASHRAE 135-2016</b> Approved by ASHRAE on June 15, 2018; and by the American National Standards Institute on June 15, 2018.  <ol style="list-style-type: none"><li>1. Fix the Absentee_Limit property of the Access Credential object type.</li><li>2. Ensure that the denied or granted access event is generated last.</li></ol>

## **POLICY STATEMENT DEFINING ASHRAE'S CONCERN FOR THE ENVIRONMENTAL IMPACT OF ITS ACTIVITIES**

ASHRAE is concerned with the impact of its members' activities on both the indoor and outdoor environment. ASHRAE's members will strive to minimize any possible deleterious effect on the indoor and outdoor environment of the systems and components in their responsibility while maximizing the beneficial effects these systems provide, consistent with accepted Standards and the practical state of the art.

ASHRAE's short-range goal is to ensure that the systems and components within its scope do not impact the indoor and outdoor environment to a greater extent than specified by the Standards and Guidelines as established by itself and other responsible bodies.

As an ongoing goal, ASHRAE will, through its Standards Committee and extensive Technical Committee structure, continue to generate up-to-date Standards and Guidelines where appropriate and adopt, recommend, and promote those new and revised Standards developed by other responsible organizations.

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