

*A User Comment Draft Amendment of AASHTO, ITE, and NEMA*

# NTCIP 1406 v01.03

## Amendment 1 b

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### Transit Communications Interface Profiles

Part of the NTCIP

### Standard on On-Board (OB) Objects

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**October 2002**

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## **Section 1 GENERAL**

### **1.2.1 Normative References**

-- Updated the publications information for Normative References

draft NTCIP 1400:2002 Amendment 1, *Transit Communications Interface Profile Framework*, version 1.05 Amendment 1.

draft NTCIP 1401:2002 Amendment 1, *Transit Communications Interface Profile, Standard on Common Public Transportation Objects*, version 1.03 Amendment 1, August, 2002.

draft NTCIP 1404:2002 Amendment 1, *Transit Communications Interface Profile, Standard on Scheduling and Runcutting Objects*, version 1.03 Amendment 1, August, 2002.

draft NTCIP 1405:2002 Amendment 1, *Transit Communications Interface Profile, Standard on Spatial Representation Objects*, version 1.03 Amendment 1, August, 2002.

draft NTCIP 1407:2002 Amendment 1, *Transit Communications Interface Profile, Standard on Control Center Objects*, version 1.03 Amendment 1, August, 2002.

ISO/IEC 8824:1998, *Abstract Syntax Notation One (ASN.1)*

SAE J1587 – Joint SAE/TMC Recommended Practice for Electronic Data Interchange Between Microcomputer Systems in Heavy Duty Vehicle Applications, February 2002.

### **1.2.2 Informative References**

-- Updated the publications information for Informative References

IEEE Std 1489-1999, *IEEE Standard for Data Dictionaries for Intelligent Transportation Systems*. 27 October 1999.

IEEE Std 1488-2000, *IEEE Trial-Use Standard for Message Set Template for Intelligent Transportation Systems*. 13 July 2000.



## Section 2 TERMINOLOGY

### 2.3 ACRONYMS

-- *Added acronym for PTV*

**PTV**            Public Transportation Vehicle





**Section 3**  
**CONCEPT OF OPERATIONS**

*-- Modified Section title to Concept of Operations*



## Section 4 REQUIREMENTS

-- Corrected reference from SP to OB in last sentence.

“The objects are presented in the order of their appearance on the OB classification tree.”

### 4.1 ON-BOARD BUS DATA DICTIONARY

#### **OB\_ScheduleAdherenceOffset\_tm/SI 10-1997 [time]**

(1) *Corrected typo in the ASN.1 Name*

**ASN1 name** OB-ScheduleAdherenceOffset

#### **OB\_HeadingDelta\_rt/ SI-10 1997**

(1) *The definition was modified.*

(2) *The language in Valid value rules was modified.*

**Definition** This object indicates that a heading change during a specified time interval measured by degrees/second. The object is used to trigger event recording equipment that records actual path traveled.

**Valid value rule** 0 to -180 Heading change in the clockwise direction  
0 to 180 Heading change in the counter clockwise direction.

#### **OB\_MID\_id/SAE J1708**

(1) *The Representative class term (in descriptive name and field) was modified to identifier (id).*

**Descriptive Name** OB\_MID\_id/SAE J1708

**Representation class term** identifier

#### **OB\_PID\_id**

(1) *The Representative class term (in descriptive name and field) was modified to identifier (id).*

**Descriptive Name** OB\_PID\_id

**Representation class term** identifier

## 4.2 ON-BOARD BUS MESSAGE SET

### ObDoorRecord\_message

(1) *Message body: message body shall change as follows:*  
*-- changed Type Reference of fare-transaction to FcFareTransaction*  
*-- added new field: offsetFromStop SP-Offset OPTIONAL*

#### Message body

```
ObDoorRecord ::=SEQUENCE {  
  doorNo OB-MID, -- related MID or address for door or lift  
  open-time OB-DoorOpenTime,  
  close-time OB-DoorCloseTime OPTIONAL,  
  boarding SEQUENCE OF OB-PassengerBoarding OPTIONAL,  
  alighting SEQUENCE OF OB-PassengerAlighting OPTIONAL,  
  fare-transaction SEQUENCE OF FcFareTransaction OPTIONAL,  
  offsetFromStop SP-Offset OPTIONAL  
  -- when a PTV stops to open/close a door in the same stop point zone more  
  -- than once  
}
```

**Annex D**  
**ASN.1 Script**

**(Informative)**

*-- removed from document*