

A Working Group Draft Standard of the Joint Committee

NTCIP 1406 v. 1.03

-- DRAFT Amendment 1

Transit Communications Interface Profiles

**Part of the National Transportation Communications for
ITS Protocol**

Standard on On-Board (OB) Objects

DRAFT August, 2002

Also referenced as TCIP-OB

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Section 1 GENERAL

1.2.1 Normative References

-- *Updated the publications information for Normative References*

draft NTCIP 1400:200x Amendment 1, *Transit Communications Interface Profile Framework*, version 1.05 Amendment 1.

draft NTCIP 1401:200x Amendment 1, *Transit Communications Interface Profile, Standard on Common Public Transportation Objects*, version 1.03 Amendment 1, August, 2002.

draft NTCIP 1404:200x Amendment 1, *Transit Communications Interface Profile, Standard on Scheduling and Runcutting Objects*, version 1.03 Amendment 1, August, 2002.

draft NTCIP 1405:200x Amendment 1, *Transit Communications Interface Profile, Standard on Spatial Representation Objects*, version 1.03 Amendment 1, August, 2002.

draft NTCIP 1406:200x Amendment 1, *Transit Communications Interface Profile, Standard on On-Board 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

-- Add acronym for PTV

PTV Public Transportation Vehicle

Section 3
CONCEPT OF OPERATIONS

-- Modify Section title to Concept of Operations

Section 4 REQUIREMENTS

-- Correct 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) shall be 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) shall be 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*

-- *add 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)

TBD