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Data Dictionary for Advanced Traveler Information Systems (ATIS)

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1. ***Scope—***This SAE Recommended Practice provides a set of core data elements needed by information service providers for Advanced Traveler Information Systems (ATIS). The data dictionary herein provides the foundation for ATIS message sets for all stages of travel (pre-trip and en route), all types of travelers (drivers, passengers), all categories of information, and all platforms for delivery of information (in-vehicle, portable devices, kiosks, etc.).

The elements of this document are the basis for the SAE ATIS Message Set Standard J2354 and are entered into the SAE Data Registry for ITS wide coordination.

2. ***References***

2.1 **Applicable Publications—**The following publications form a part of this specification to the extent specified herein. Unless otherwise indicated, the latest issue of SAE publications shall apply.

2.1.1 SAE PUBLICATIONS—Available from SAE, 400 Commonwealth Drive, Warrendale, PA 15096-0001.

SAE J2313—On-Board Land Vehicle Mayday Reporting Interface
SAE J2354—Message Sets for Advanced Traveler Information Systems (ATIS)

2.1.2 ISO PUBLICATION—Available from ANSI, 11 West 42nd Street, New York, NY 10036-8002.

ISO 3379-1983—Standard vehicle identification numbering (VIN) system.

2.1.3 ITE PUBLICATIONS—Available from ITE, 525 School Street, SW, Suite 410, Washington, DC 20024 USA.

TCIP, Version 1.1 of the Recommended Standard for the Transit Communications Interface Profiles
TMDD, Standard for Functional Level Traffic Management Data Dictionary, Standard Number TM.01 (Proposed)

2.2 **Related Publications—**The following publications are provided for information purposes only and are not a required part of this document.

2.2.1 SAE PUBLICATION—Available from SAE, 400 Commonwealth Drive, Warrendale, PA 15096-0001.

SAE J2374—Information Report based on Location Reference Message Specification, Revision B (MDI), May 22, 1997

2.2.2 IEEE PUBLICATION—Available from IEEE, 445 Hoes Lane, P.O. Box 1331, Piscataway, NJ 08855-1331.

IEEE P1489—Draft Standard for Data Dictionary for Intelligent Transportation Systems, version. 0.1.0 (Part 1)

2.2.3 ISO PUBLICATIONS—Available from ANSI, 11 West 42nd Street, New York, NY 10036-8002.

ISO 3166-1—Codes for the representation of names of countries and their subdivisions—Part 1: Country codes

2.2.4 OTHER PUBLICATIONS

Atlanta Traveler Information Showcase, Appendixes to Final Report, Battelle, 1996.
DATEX, Task Force on Traffic and Travel Data Exchange, Technical Documents, Commission of the European Communities, RTD Transport Telematics Application Programme, December 1996.
IEEE P1488—Data Dictionary Standard, versions 1-7.
International Traveler Information Interchange Standard (ITIIS), Draft ATIS Data Dictionary, Version 1, June 20, 1996.
National ITS Architecture, Federal Highway Administration, U.S. Department of Transportation, 1996.
Priority Elements for Traveler Information, Generated from the ATIS Interoperability Summit, May 1-2, 1996.
San Antonio TransGuide In-Vehicle Navigation System High Speed FM Subcarrier Communications Protocol, Version 1.0, Texas Department of Transportation, March 26, 1997.
Towards Traveler Information Message List Standards, SAE Message List Workshop, March 21-23, 1994.
Traffic Management Data Dictionary, Sections 1 and 2, May 12, 1997.
Transcal IRTIS Interface Control Documents, February 3, 1997 and March 11, 1997.
TravelTIP Preliminary Design Report, Orange County Transportation Authority, June 21, 1996.
TravInfo Bay Area Advanced Traveler Information System, Metropolitan Transportation Commission (Oakland, CA), Detailed Design for Increment 2, January 31, 1996.
TravInfo Bay Area Advanced Traveler Information System, Metropolitan Transportation Commission (Oakland, CA), Registered Participants Technical Packet, Version 1.0, March 25, 1997.
Yosemite Area Traveler Information Project, Draft Technical Memoranda 2 and 4: Database Architecture Options and System Architecture Alternatives and Evaluation, October 24, 1994. Prepared by National Engineering Technology Corporation.
ISO/IEC 8824:1998—Abstract Syntax Notation One (ASN.1)

3. Definitions

3.1 Address Location (or matching)—Translating a user-oriented place specification (e.g., street address, intersection, vanity address, named place) to a specific object (node or link) in a database. (Schuman, 1993).

3.2 Address Range—The range of street numbers associated with a street or a particular name, usually within a given area.

3.3 Altitude—Elevation above or below a reference datum, as defined in FIPSPUB 70-1; the z-value in a spatial address. See also elevation.

3.4 Application-Specific Data Dictionary—A data dictionary specific to a particular implementation of an ITS application.

3.5 Area—A generic term for a bounded, continuous, two-dimensional object that may or may not include its boundary. (NIST, 1992).

3.6 ATIS—Advanced Traveler Information Systems.

3.7 ATMS—Advanced Transportation Management Systems.

3.8 Attribute—Any documenting characteristic of any entity.

3.9 Cartesian Coordinates—A two-dimensional x,y location of a point on a plane in relation to two intersecting straight lines (axes). If the axes are perpendicular to each other, the coordinates are rectangular; if not, they are oblique. By convention, the x-axis measures the horizontal distance and the y-axis measures the vertical distance from the origin point of intersection. An x,y coordinate (or "coordinate pair") defines every point on the plane. Relative measures of distance, area, and direction are constant throughout the Cartesian coordinate plane.

3.10 Classification Scheme—A scheme for the arrangement or division of entities into groups based on properties which the entities have in common.

3.11 Complex Intersection—The intersection of roadways involving offsets, central medians, or some combination of offsets and central medians which can generate multiple nodes for representation.

3.12 Concept—A unit of thought constituted through abstraction on the basis of characteristics common to a group of entities.

3.13 Coordinates—Pairs of numbers expressing horizontal distances along orthogonal axes; alternatively, triplets of numbers measuring horizontal and vertical distances.

3.14 Coordinate System—A reference system for the unique definition of a location of a point in n-dimensional space.

3.15 Data—Representations of static or dynamic entities in a formalized manner suitable for communication, interpretation, or processing by humans or by machines.

3.16 Database—Collection of information structured in an organized way, typically held and maintained in a computer system.

3.17 Data Concept—Any of a group of data dictionary structures defined in this document (e.g., data element, data element concept, entity type, property, value domain) referring to abstractions or things in the natural world that can be identified with explicit boundaries and meaning and whose properties and behavior all follow the same rules.

3.18 Data Dictionary—An information technology for documenting, storing, and retrieving the syntactical form (i.e., representational form) and some semantics of data elements and other data concepts.

3.19 Data Element—A syntactically formal representation of some single unit of information of interest (such as a fact, proposition, observation, etc.) with a singular instance value at any point in time, about some entity of interest (e.g., a person, place, process, property, object, concept, association, state, event). A data element is considered indivisible in a certain context.

3.20 Data Element Concept—An expression of the inherent concept embodied in a data element without regard to the value domain(s) by which it can be physically represented.

3.21 Data Registry—An advanced data dictionary that contains not only data about data elements in terms of their names, representational forms and usage in applications, but also substantial data about the semantics or meaning associated with the data elements as concepts that describe or provide information about real or abstract entities. A data registry may contain abstract data concepts that do not get directly represented as data elements in any application system, but which help in information interchange and reuse both from the perspective of human users and for machine-interpretation of data elements.

3.22 Data Representation—Methods of representing spatial objects in a spatial information system, the most common of which are vectors and tessellations.

3.23 Data Structure—Any construct (including data elements and data concepts) used to represent the contents of a data dictionary.

3.24 Data Type—A classification of the collection of letters, digits, and/or symbols used to encode values of a data element based upon the operations that can be performed on the data element.

3.25 Digital Data—Data represented in a computer-compatible format.

3.26 Digital Map Database—A structured set of digital and alphanumeric data that portray geographic locations and relationships of spatial features. Typically, such structures represent, but are not limited to the digital form of hard copy maps. For example, CAD drawings my be imported into a GIS and considered a form of digital base map.

3.27 Directed Links—Links bounded by start and end points, (i.e., ordered).

3.28 Elevation—A vertical distance below or above a reference surface. Terrain elevation is expressed with reference to mean sea level (MSL).

3.29 Entity—Anything of interest (such as a person, place, process, property, object, concept, association, state, event, etc.) within a given domain of discourse (in this case, within the ITS domain of discourse).

3.30 Entity Type—The construct used to represent an entity in the ITS data registry.

3.31 Exchange Standard—A collection of agreements between sender and receiver that enables and assures the receiver's unambiguous understanding of the geographic information that the sender intended.

3.32 Functional-Area Data Dictionary—A data dictionary that is intended to standardize data element syntax, and semantics, within and among application areas within the same functional area.

3.33 Generic Data Element—A data element supertype composed of an entity (type), property, and value domain that remains consistent across its specific application data elements.

3.34 Generic Property Domain—An expression of an approved pairing of a property and a value domain, without regard to any entity type with which it may be associated.

3.35 Geocoding—Process of assigning geographic coordinate locations to objects.

3.36 Geographic Coordinates—The quantities of latitude and longitude which define the position of a point on the Earth with respect to the reference spheroid or ellipsoid.

3.37 Geographic Information System (GIS)—A computerized system for the collection, integration, management, analysis, and display of geographic data.

3.38 Grid—A set of grid cells forming a regular, or nearly regular, tessellation of a surface. The tessellation is regular if formed by repeating the pattern of a regular polygon, such as a square, equilateral triangle, or regular hexagon. The tessellation is nearly regular if formed by repeating the pattern of an "almost" regular polygon such as a rectangle, non-square parallelogram, or non-equilateral triangle.

3.39 Grid Cell—A two-dimensional object that represents the smallest nondivisible element of a grid.

3.40 Ground Control Point—A point of known location that can be recognized on an image or a map and that can be used to calculate the transformation needed for the registration of images or maps. Ground Control Points are related to a known projection for use in geometric transformation.

3.41 Identifier—A means of designating or referring to a specific entity instance.

3.42 Information Service Provider (ISP)—A public or private entity responsible for gathering, fusing, analyzing, and reporting transportation related information to user, including vehicles and non-mobile users.

3.43 Instance—An individual occurrence of an entity which belongs to a particular type of entity.

3.44 Intelligent Transportation Systems (ITS)—Systems that apply modern technology to transportation problems. Another appropriate meaning of the ITS acronym is integrated transportation systems, which stressed that ITS systems will often integrate components and users from many domains, both public and private.

3.45 Interoperability—The ability to share information between heterogeneous applications and systems.

3.46 ITS Databus—An electronic implementation of a device layer where electronics components related to advanced vehicle functions can interoperate.

3.47 Junction—A collection of more than one node that represent a logical feature, such as a complex intersection.

3.48 Legacy Databases—Databases that exist in an organization that must be maintained and used regardless of new technology changes.

3.49 Linear Referencing—Process of identifying location(s) on a transportation network or specific link in a network by specifying a start position, direction, and distance along a particular route.

3.50 Link—A topological connection between two nodes. A link may contain additional intermediate coordinates (shapes points) to better represent the shape of curved features. A link may be direct by ordering its nodes.

3.51 Link ID—An identifier assigned to a link. Link IDs may be arbitrary, or may be assigned by convention to assure that multiple occurrences of the same ID will not occur within one network or within the universe of similar networks or databases.

3.52 Link Referencing—System which identifies a link in a network, and returns its ID value to an external application.

3.53 Location Referencing System—System of determining the position of an entity relative to other entities or to some external frame of references.

3.54 Map Database—A collection of map data, possibly in digital form, for a region, theme, or sets thereof.

3.55 Media—The physical devices used to record, store, and (or) transmit data.

3.56 Message—A grouping of data elements and message attributes, used to convey information. For the purposes of this document, a message is an abstract description using a message set template; not a specific instance.

3.57 Message Set—A collection of messages based on the ITS functional-area they pertain to.

3.58 Message Set Template—An abstract structure addressing the data and syntax used to specify the requirements and properties of ITS messages, as well as rules for producing message set standards (e.g., conformance statements).

3.59 Meta—A word denoting a description which is one level of abstraction removed from the entity being described.

3.60 Meta Attribute—In a data dictionary or data registry, a documenting characteristic of a data concept.

3.61 Meta Data—Data that defines and describes other data.

3.62 Model Deployment Initiative—One of the joint public-private programs to implement and test integrated ITS systems and infrastructure in the U.S.

3.63 Name—An indexical term used by humans as a means of identifying data elements and other data concepts.

3.64 Point of Interest—A geographic location that is of interest to the transit community.

3.65 Property—A documenting characteristic of an entity type used to group and differentiate individual entities.

3.66 Restricted Maneuver—A prohibition of movement from one roadway (link) to another roadway (link) due to a physical impediment, regional restriction, one-way flow of traffic, or a posted restriction. There may be multiple restrictions pertaining to any link and these restrictions may be limited to a specific time of day and/or day of the week.

3.67 Route—An aggregation of sequentially connected links in a network typically denoting an intended or scheduled path of a transport resource.

3.68 Route Guidance—Delivering real-time driving directions to the driver, based on a determined route and vehicle position or speed.

3.69 Routing—The problem of calculating least-time, least-cost, or other optimized paths (routes) through a road network.

3.70 Semantics—The meaning, including concept(s), associated with a given entity (i.e., any thing).

3.71 Spatial Data—information about the location, shape, relationships, and attributes of geographic features.

3.72 Syntax—The structure of expressions in a language, and the rules governing the structure of a language.

3.73 Value Domain—An expression of a specific and explicit representation of some information about something of interest within the ITS domain.

***4. Conformance*—**Conformance with this document requires that ATIS specified data elements shall be used in all cases where they are applicable to the functions in the developed system.

Conformance requires that the data elements described in this document must be used as defined and described by the meta attributes for each data element. Additional data elements, which are required, may be used; however, they should be described and defined in compliance with IEEE P1489.

5. *Entity Descriptions*

The entities used for naming ATIS data elements describe the area in which the element is used. The entity is used to group together elements with similar usage. The individual entities are described as follows:

Accesspoint is used in describing an element associated with the point where a transit vehicle is scheduled to stop.
Amenity describes elements concerning the amenities available.
ATIS entities describe elements associated with general ATIS information.
Broadcast entities include a wrapper to pass through non-ATIS data.
Device describes elements concerning the device used to transmit data.
DirectoryAppointment includes elements used to describe appointments for directory entries.
DirectoryEntry includes elements describing the directory entries available.
DirectorySearch describes elements used to search the directory entries.
Emergency entities describe elements used in emergency messages.
Error entities describe elements used in error messages.
Event entities include elements describing events that affect the roadway.
Flight entities are associated with airport flight information.
Incident includes elements that describe roadway incidents.
InformationRequest entities describe elements related to requests for information.
Link entities are associated with links on roadways.
Lot entities describe aspects of parking lots.
LotStay entities are used to describe elements related to a stay in a parking lot.
Marker entities describe information about how a transit stop is identified.
Message entities describe information about the message and it's priority and quality.
Node entities describe roadway nodes.
Pollution entities are associated with the quantity of certain pollution in the air.
Price entities describe elements associated with price schedules.
Request entities describe the status of a parking lot.
Route entities describe the route used by a transit vehicle.
Service entities describe the mode of a particular transit service.
Setting entities are used to provide additional information for use by the ISP or user.
Stop entities describe transit stop information.
TransitVehicle entities describe transit vehicle information.
Traveler entities include information directly related to the traveler.
Trigger entities describe what events or circumstances cause a traveler to be contacted.
Trip entities describe a traveler's trip request.
Vehicle entities provide information about the traveler's vehicle.
Weather entities provide information concerning the weather.

6. *Data Elements*—Data elements created within ATIS begin on the following page.

6.1 DESCRIPTIVE-NAME: DIRECTORYENTRY_Phone_number

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Phone Number for Directory Entry.
FORMULA:
SOURCE:
CLASS-NAME: Yellow Pages
DATACONCEPT-TYPE: Data Element
KEYWORD: Directory, Phone, Phone Number
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 18 - Character - Numeric String Type
ASN1-NAME: directoryentry-Phone
VALID-VALUE-RULE: (SIZE(10)), -- Valid Phone Number

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1024
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.2 DESCRIPTIVE-NAME: DIRECTORYENTRY_RestaurantSubType_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Used to describe finer information about restaurants - Directory and style.
FORMULA:
SOURCE:
CLASS-NAME: Yellow Pages
DATACONCEPT-TYPE: Data Element
KEYWORD: Directory, Search Request, Search
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: directoryentry-RestaurantSubType
VALID-VALUE-RULE: {fastFood(0),
fastFoodBurger(1),
fastFoodMexican(2),
fastFoodChicken(3),
fastFoodSeafood(4),
fastFoodEthnic(5),
fastFoodSandwich(6),
cafeteria(7),
familyDining(8),
iceCreamParlor(9),
bakery(10),
deliSandwich(11),

coffeeShop(12),
familyFrench(13),
familyItalian(14),
familyGerman(15),
familyMexican(16),
familyContinental(17),
familyAmerican(18),
familyBarbeque(19),
familyRegional(20),
familyEthnic(21),
familyCalifornian(22),
familyGreek(23),
familyMiddleEastern(24),
familySouthwestern(25),
dinnerHouse(26),
dinnerHouseSteak(27),
dinnerHouseSeafood(28),
dinnerHouseItalian(29),
dinnerHouseFrench(30),
dinnerHouseEuropean(31),
dinnerHouseAsian(32),
dinnerHouseSouthwestern(33),
dinnerHouseMiddleEastern(34),
dinnerHouseJapanese(35),
tableCloth(36),
fineFrench(37),
fineItalian(38),
fineGerman(39),
fineMexican(40),
fineContinental(41),
fineJapanese(42),
fineChinese(43),
fineThai(44),
fineAsian(45),
fineEthnic(46),
fineAmerican(47),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1025
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.3 DESCRIPTIVE-NAME: DIRECTORYENTRY_ShortDescription_text

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: A short text description of the Directory Entry.
FORMULA:
SOURCE:
CLASS-NAME: Yellow Pages
DATACONCEPT-TYPE: Data Element
KEYWORD: Directory, Business, Entry, Description, Comment
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: directoryentry-ShortDescription
VALID-VALUE-RULE: (SIZE(1..40)), -- Description of Directory Entry

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1026
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:

6.4 DESCRIPTIVE-NAME: DIRECTORYENTRY_Type_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: A Directory Classification of the Directory Entry - This Directory code will be an Industry SIC Code.
FORMULA:
SOURCE:
CLASS-NAME: Yellow Pages
DATACONCEPT-TYPE: Data Element
KEYWORD: Directory, Type, Code, Description
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS: Should this a code or a string? Can we site a doc source too.
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN: NAICS
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: directoryentry-Type
VALID-VALUE-RULE: (SIZE(6)),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1027
DATACONCEPT-VERSION: 0
VIEW:Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.5 DESCRIPTIVE-NAME: ATIS_CostPreference_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Allows the user to specify a cost preference such as; lowest cost, maximum cost, minimum cost, etc.
FORMULA:
SOURCE:
CLASS-NAME: Traveler Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Cost, Preference
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: atis-CostPreference
VALID-VALUE-RULE: {lowestCost(0),
maximumCost(1),
minimumCost(2),
targetCost(3),
reservedStandard(8),
reservedLocalization(255)} (0..255),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1001
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.6 DESCRIPTIVE-NAME: ATIS_CostPreferenceAmount_amount

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Allows the user to specify the amount to spend on an option.
FORMULA:
SOURCE:
CLASS-NAME: Traveler Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Cost, Preference
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: atis-CostPreferenceAmount
VALID-VALUE-RULE: (1..65535),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1002
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:

SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.7 DESCRIPTIVE-NAME: ATIS_Date_date

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Date for which a directory entry is being requested by a Traveler - primarily effects event information returned.
FORMULA:
SOURCE:
CLASS-NAME: Yellow Pages
DATACONCEPT-TYPE: Data Element
KEYWORD: Directory, Search Request, Radius, Search,Proximity
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN: ANSI X3.30
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: atis-Date
VALID-VALUE-RULE: (SIZE(8)),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1003
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.8 DESCRIPTIVE-NAME: ATIS_DayOfWeek_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Describes the Day of the Week, including a Holiday option.
FORMULA:
SOURCE:
CLASS-NAME: Traveler Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Day, Week, Holiday
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS: See BRM Data of week as well, conflicting use
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 3 - Bitstring Type
ASN1-NAME: atis-DayOfWeek
VALID-VALUE-RULE: {Sunday(0),
Monday(1),
Tuesday(2),
Wednesday(3),
Thursday(4),
Friday(5),
Saturday(6),
includeHolidays(7)} (SIZE(8)),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1004
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.9 DESCRIPTIVE-NAME: ATIS_LocationType_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The type of location reference being requested, including cross streets, geometry, grid, text, or address
FORMULA:
SOURCE:
CLASS-NAME: User Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Location
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
ASN1-NAME: atis-LocationType
VALID-VALUE-RULE: {crossStreets(0),
geometry(1),
grid(2),
address(3),
geographicCoordinates(4),
linearReference(5),
mdi(6),...} (0..255),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1005
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.10 DESCRIPTIVE-NAME: ATIS_SearchOperator_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Used to specify a conditional operator applying to a keyword phrase or list.
FORMULA:
SOURCE:
CLASS-NAME: Yellow Pages
DATACONCEPT-TYPE: Data Element
KEYWORD: Directory Entry, Price, Days, Business Hours, Price Schedule
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type

ASN1-NAME: atis-SearchOperator
VALID-VALUE-RULE: {mustContain(0),
shouldContain(1),
shouldNotContain(2),
mustNotContain(3)} (0..255),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1006
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.11 DESCRIPTIVE-NAME: ATIS_Time_time

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Time for which a directory entry is being requested by a Traveler - primarily affects event information returned.
FORMULA:
SOURCE:
CLASS-NAME: Yellow Pages
DATACONCEPT-TYPE: Data Element
KEYWORD: Directory, Search Request, Radius, Search, Proximity
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS: Consider changing to ASN GenerTime
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN: ANSI NCITS.310
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: atis-Time
VALID-VALUE-RULE: (SIZE(6..11)), -- Valid times using 24-hour notation. HH=00 through 23; MM=00 through 59; SS=00 through 59; ssss=0000 through 9999. HH represents hours, MM minutes, SS seconds, and ssss decimal seconds to whatever number of significant digits is required (up to four).

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1007
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.12 DESCRIPTIVE-NAME: BROADCAST_Wrapper_text

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: A wrapper to contain information which is not in an ATIS format, such as ITIIS.
FORMULA:
SOURCE:
CLASS-NAME: User Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Broadcast, Wrapper
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:

VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 3 - Bitstring Type
ASN1-NAME: broadcast-Wrapper
VALID-VALUE-RULE: BIT STRING (SIZE(1..37)), -- wrapper for a broadcast message

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1008
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.13 DESCRIPTIVE-NAME: DEVICE_Identity_text

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: An identity which defines a type of device, reserved for future use.
FORMULA:
SOURCE:
CLASS-NAME: Traveler Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Device, Identity
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS: There is no agreed way to defined “MAX” here
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 4 - Octetstring Type
ASN1-NAME: device-Identity
VALID-VALUE-RULE: (SIZE(1..MAX)),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1009
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.14 DESCRIPTIVE-NAME: DEVICE_Setting_text

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Device storage capability, operating system, graphics level, etc.
FORMULA:
SOURCE:
CLASS-NAME: Traveler Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Device
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: device-Setting
VALID-VALUE-RULE: (SIZE(1..40)), -- Description and/or codes describing the device

Administrative Meta Attributes
DATACONCEPT-IDENTIFIER: 1010
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.15 DESCRIPTIVE-NAME: DEVICE_TransferSpeed_quantity
DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Actual transfer speed, not rated speed.
FORMULA:
SOURCE:
CLASS-NAME: Traveler Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Device
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS: Committee needs to define units (bits/sec?)
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: device-TransferSpeed
VALID-VALUE-RULE: (0..99999),

Administrative Meta Attributes
DATACONCEPT-IDENTIFIER: 1011
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.16 DESCRIPTIVE-NAME: DIRECTORYAPPOINTMENT_Confirmation_code
DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: A code used to confirm an appointment.
FORMULA:
SOURCE:
CLASS-NAME: Yellow Pages
DATACONCEPT-TYPE: Data Element
KEYWORD: Appointment, Reservation,
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: directoryappointment-Confirmation
VALID-VALUE-RULE: {apptDeniedNoExplanation(0),
apptSuccessful(1),
cannotConfirm(2),
timeNotAvailable(3),
noTimeAvailable(4),

closed(5),...} (0..255),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1012
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.17 DESCRIPTIVE-NAME: DIRECTORYENTRY_BusinessHours_text

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The business hours of the Directory Entry - Can include separate representations for Days of the Week and Holidays.
FORMULA:
SOURCE:
CLASS-NAME: Yellow Pages
DATACONCEPT-TYPE: Data Element
KEYWORD: Availability, Business Hours, Open
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: directoryentry-BusinessHours
VALID-VALUE-RULE: (SIZE(1..12)), -- Business hours of the Directory Entry

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1013
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.18 DESCRIPTIVE-NAME: DIRECTORYENTRY_CapabilityCode_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: A Code used to define the capabilities of the Entry or the ISP on behalf of the Entry. Capabilities include the ability to take electronic reservations and payments.
FORMULA:
SOURCE:
CLASS-NAME: Yellow Pages
DATACONCEPT-TYPE: Data Element
KEYWORD: Directory, Entry, Capability, Transactions
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: directoryentry-CapabilityCode
VALID-VALUE-RULE: {noAdditionalCapabilities(0),
reservationsAndAppointments(1),
electronicPayments(2),...} (0..255),

Administrative Meta Attributes
DATACONCEPT-IDENTIFIER: 1014
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.19 DESCRIPTIVE-NAME: DIRECTORYENTRY_Cost_text

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Used outside of price schedules to provide text information on rates.
FORMULA:
SOURCE:
CLASS-NAME: Yellow Pages
DATACONCEPT-TYPE: Data Element
KEYWORD: Business Hours, Price Schedule
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: directoryentry-Cost
VALID-VALUE-RULE: (SIZE(1..12)), -- Description of the cost information

Administrative Meta Attributes
DATACONCEPT-IDENTIFIER: 1015
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.20 DESCRIPTIVE-NAME: DIRECTORYENTRY_Description_text

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: A text description of a Directory Entry. Can contain any information desired by the ISP.
FORMULA:
SOURCE:
CLASS-NAME: Yellow Pages
DATACONCEPT-TYPE: Data Element
KEYWORD: Description, Entry, Business, Event, Comment
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: directoryentry-Description
VALID-VALUE-RULE: (SIZE(1..200)), -- Description of the Directory Entry

Administrative Meta Attributes
DATACONCEPT-IDENTIFIER: 1016
DATACONCEPT-VERSION: 0
VIEW: Traveler Information

SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.21 DESCRIPTIVE-NAME: DIRECTORYENTRY_ExtendedInformation_text

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: A BLOB used to send extended information to the application from the ISP. May contain pictures, additional text, rich text, sound, etc.
FORMULA:
SOURCE:
CLASS-NAME: Yellow Pages
DATACONCEPT-TYPE: Data Element
KEYWORD: Extended Information, BLOB
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS: There is no agreed way to defined “MAX” here
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 4 - Octetstring Type
ASN1-NAME: directoryentry-ExtendedInformation
VALID-VALUE-RULE: (SIZE(1..MAX)),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1017
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.22 DESCRIPTIVE-NAME: DIRECTORYENTRY_ExtendedInformationAvailable_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: A Flag indicating that the ISP has additional special information about the entry. This additional information can be requested by the application.
FORMULA:
SOURCE:
CLASS-NAME: Yellow Pages
DATACONCEPT-TYPE: Data Element
KEYWORD: Information Request, Extended Information
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 1 - Boolean Type
ASN1-NAME: directoryentry-ExtendedInformationAvailable
VALID-VALUE-RULE: , -- TRUE | FALSE

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1018
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.23 DESCRIPTIVE-NAME: DIRECTORYENTRY_ExtendedInformationType_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Used by the application to inform an ISP of the Directorys of extended information it can handle. Also used by the ISP to attach to an extended information message to define the Directory returned.
FORMULA:
SOURCE:
CLASS-NAME: Yellow Pages
DATACONCEPT-TYPE: Data Element
KEYWORD: Extended Information, Type, Data type
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: directoryentry-ExtendedInformationType
VALID-VALUE-RULE: {anyTypeValidOnlyOnRequest(0),
text(1),...} (0..255),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1019
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.24 DESCRIPTIVE-NAME: DIRECTORYENTRY_GovernmentSubType_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Used to describe finer information about government and government services.
FORMULA:
SOURCE:
CLASS-NAME: Yellow Pages
DATACONCEPT-TYPE: Data Element
KEYWORD: Directory, Search Request, Radius, Search, Proximity
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: directoryentry-GovernmentSubType
VALID-VALUE-RULE: {adoption(0), agriculture(1), alcoholDrugAbusePrograms(2), animalControl(3), assessor(4),attorneysAndProsecutors(5), birthRecords(6), boards(7), permitsAndInspections(8), childAbuseReporting(9), civilService(10), coastal(11), consumerComplaintsServices(12), coroner(13), courts(14), customs(15), deathRecords(16), motorVehicles(17), disabilityServices(18), disasterPreparedness(19), discrimination(20), employmentServices(21), eneryInformationServices(22), environmentalServices(23), foodStamps(24), fosterCare(25), garbageAndTrashServices(26), hazardousMaterials(27), healthServices(28), housingServices(29), immigrationServices(30),

jailsPenalServices(31), laborServices(32), libraries(33), marriageServices(34), medicalServices(35), medicare(36), military(37), nationalGuard(38), neighborhoodWatch(39), osha(40), parksRecreation(41), passportServices(42), postalOffices(43), probationParole(44), publicDefender(45), publicUtilities(46), recyclingInformation(47), schools(48), seniorCitizensServices(49), smallBusinessAdministration(50), socalSecurity(51), streetMaintenance(52), suicidePrevention(53), taxInformation(54), unemploymentInsurance(55), utilityService(56), veteransServices(57), victimWitnessAssistance(58), voterRegistration(59), weightsAndMeasures(60), workersCompensation(61), youthInformationServices(62), zoningInformation(63), reservedStandard(128), reservedLocalization(255),...} (0..255),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1020
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.25 DESCRIPTIVE-NAME: DIRECTORYENTRY_HandicapAccess_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: A code indicating the handicap access level for a business, event, or establishment.
FORMULA:
SOURCE:
CLASS-NAME: Yellow Pages
DATACONCEPT-TYPE: Data Element
KEYWORD: Directory, Handicap, Access, Traveler Information
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS: Why is this not coded as a bool or have more defined sub types?
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: directoryentry-HandicapAccess
VALID-VALUE-RULE: {notAccessible(0), accessible(1)},

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1021
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.26 DESCRIPTIVE-NAME: DIRECTORYENTRY_Identity_number

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: A code which uniquely identifies the Directory Entry.
FORMULA:
SOURCE:
CLASS-NAME: Yellow Pages
DATACONCEPT-TYPE: Data Element
KEYWORD: Unit Number, Identity, Yellow Pages Entry
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:

SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME:directoryentry-Identity
VALID-VALUE-RULE: (SIZE(1..9)), -- Unique text identifying the Directory Entry

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1022
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.27 DESCRIPTIVE-NAME: DIRECTORYENTRY_Name_text

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The Name of the Directory Entry or its common description for purposes of describing the Directory Entry to the Traveler.
FORMULA:
SOURCE:
CLASS-NAME: Yellow Pages
DATACONCEPT-TYPE: Data Element
KEYWORD: Name, Directory Entry, Name, Business
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: directoryentry-Name
VALID-VALUE-RULE: (SIZE(1..30)), -- Name of the Directory Entry

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1023
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.28 DESCRIPTIVE-NAME: DIRECTORYSEARCH_ConstrainByProfile_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: A flag indicating whether the ISP should use the Traveler Profile to constrain the search.
FORMULA:
SOURCE:
CLASS-NAME: Yellow Pages
DATACONCEPT-TYPE: Data Element
KEYWORD: Directory Entry, Price, Days, Business Hours, Price Schedule
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:

VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 1 - Boolean Type
ASN1-NAME: directorysearch-ConstrainByProfile
VALID-VALUE-RULE: , -- TRUE | FALSE

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1028
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.29 DESCRIPTIVE-NAME: DIRECTORYSEARCH_Keywords_text

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Used to specify a list of keywords or a phrase to search on.
FORMULA:
SOURCE:
CLASS-NAME: Yellow Pages
DATACONCEPT-TYPE: Data Element
KEYWORD: Directory Entry, Price, Days, Business Hours, Price Schedule
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: directorysearch-Keywords
VALID-VALUE-RULE: (SIZE(1..40)), -- Words which may be used to search for Directory Entries

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1029
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.30 DESCRIPTIVE-NAME: DIRECTORYSEARCH_LimitEntriesReturned_quantity

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Used to set a limit on the number of Directory Entries returned by a request - the ISP may set a lower system wide limit. This limit is intended to provide a guaranteed limit on the traveler software side.
FORMULA:
SOURCE:
CLASS-NAME: Yellow Pages
DATACONCEPT-TYPE: Data Element
KEYWORD: Directory, Search Request, Radius, Search, Proximity
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type

ASN1-NAME: directorysearch-LimitEntriesReturned
VALID-VALUE-RULE: (0..65535), -- max entries to return

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1030
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.31 DESCRIPTIVE-NAME: DIRECTORYSEARCH_Location_spatial

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Location Reference for a Search.
FORMULA:
SOURCE:
CLASS-NAME: Yellow Pages
DATACONCEPT-TYPE: Data Element
KEYWORD: Location
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS: This is a 'data frame' and should be moved when the p1488 reg exists
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN: Spatial Data Interoperability Protocol for
DATA-TYPE: MESSAGE
ASN1-NAME: directorysearch-Location
VALID-VALUE-RULE: LRMS, -- Location Reference

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1031
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.32 DESCRIPTIVE-NAME: DIRECTORYSEARCH_NumericRadius_quantity

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Used to describe the permissible radius around a specified location to return Directory entries in a search request.
FORMULA:
SOURCE:
CLASS-NAME: Yellow Pages
DATACONCEPT-TYPE: Data Element
KEYWORD: Directory, Search Request, Radius, Search, Proximity
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN: 100 Meters
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: directorysearch-NumericRadius
VALID-VALUE-RULE: (0..65535), -- radius in 100 m LSBs

Administrative Meta Attributes
DATACONCEPT-IDENTIFIER: 1032
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.33 DESCRIPTIVE-NAME: DIRECTORYSEARCH_OrderEntriesBy_code
DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: A code indicating the preferred sort variable and sequence.
FORMULA:
SOURCE:
CLASS-NAME: Yellow Pages
DATACONCEPT-TYPE: Data Element
KEYWORD: Directory Entry, Price, Days, Business Hours, Price Schedule
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: directorysearch-OrderEntriesBy
VALID-VALUE-RULE: {noPreference(0), proximityAscending(1), proximityDescending(2), nameAscending(3), nameDescending(4), typeNameAscending(5), typeNameDescending(6), keywordMatch(7), preferenceEvaluation(8)} (0..255),

Administrative Meta Attributes
DATACONCEPT-IDENTIFIER: 1033
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.34 DESCRIPTIVE-NAME: ERROR_NotificationCode_code
DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The code used to identify specific error or information.
FORMULA:
SOURCE:
CLASS-NAME: Traveler Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Error, Notification
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: error-NotificationCode
VALID-VALUE-RULE: {tripGuidanceNotification(0), maydayNotification(1), parkingNotification(2), directoryServicesNotification(3), userSettingsNotification(4), travelerInformationNotification(5), generalNotification(6),

ispServices(7), officialNotifcation(8), locationReferenceError(9),
locationReferenceAmbiguous(10), contraintsCannotBeMet(11),
unknownLocalization(12), unknownCode(13), invalidIdentity(14),
serviceUnavailable(15), informationUnavailable(16),
reservedStandard(32), reservedLocalization(255)} (0..255),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1034
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.35 DESCRIPTIVE-NAME: ERROR_NotificationText_text

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The text of the error message.
FORMULA:
SOURCE:
CLASS-NAME: Traveler Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Error, Notification
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: error-NotificationText
VALID-VALUE-RULE: (SIZE(1..255)), -- Text of the Notification Message

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1035
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.36 DESCRIPTIVE-NAME: ERROR_NotificationType_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The type of error or information being sent.
FORMULA:
SOURCE:
CLASS-NAME: Traveler Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Error, Notification
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: error-NotificationType

VALID-VALUE-RULE: {error(0), notification(1), information(2), alert(3)} (0..255),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1036
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.37 DESCRIPTIVE-NAME: FLIGHT_ArrivalGate_number

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The number of the arrival gate.
FORMULA:
SOURCE:
CLASS-NAME: Airline/Rail Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Flight, Gate
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS: The character value content of this element can be either number, text, or a mixture of the two.
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: flight-ArrivalGate
VALID-VALUE-RULE: (SIZE(1..6)), -- Gate number assigned by airport

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1037
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.38 DESCRIPTIVE-NAME: FLIGHT_DepartureGate_number

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The number of the departure gate.
FORMULA:
SOURCE:
CLASS-NAME: Airline/Rail Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Flight, Gate
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: flight-DepartureGate
VALID-VALUE-RULE: (SIZE(1..6)), -- Gate number assigned by airport

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1038

DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.39 DESCRIPTIVE-NAME: FLIGHT_DestinationAirport_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The Airport Code for the Origination of a Flight.
FORMULA:
SOURCE:
CLASS-NAME: Airline/Rail Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Airline, Traveler Information
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: flight-DestinationAirport
VALID-VALUE-RULE: (SIZE(3)), -- Three character code for airport

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1039
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.40 DESCRIPTIVE-NAME: FLIGHT_GateNumber_number

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The Gate Number for a Flight.
FORMULA:
SOURCE:
CLASS-NAME: Airline/Rail Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Airline, Traveler Information
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: flight-GateNumber
VALID-VALUE-RULE: (SIZE(1..6)), -- Gate number assigned by airport

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1040
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.41 DESCRIPTIVE-NAME: FLIGHT_OriginAirport_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The Airport Code for the Origination of a Flight.
FORMULA:
SOURCE:
CLASS-NAME: Airline/Rail Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Airline, Traveler Information
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: flight-OriginAirport
VALID-VALUE-RULE: (SIZE(3)), -- Three character code for airport

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1041
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.42 DESCRIPTIVE-NAME: INFORMATIONREQUEST_Type_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The type of information being requested by the Traveler.
FORMULA:
SOURCE:
CLASS-NAME: Traveler Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Request, Travel, Type, Information
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: informationrequest-Type
VALID-VALUE-RULE: {weatherForecast(0), pollution(1), traffic(2), incidents(3), events(4), roads(5), flights(6), wideAreaTravel(7), routes(8), weatherActual(9), reservedForStandard(128), reservedForLocalUse(255)} (0..255)

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1044
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.43 DESCRIPTIVE-NAME: INFORMATIONREQUEST_SubType_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The specific item of information being requested.
FORMULA:
SOURCE:
CLASS-NAME: Traveler Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Request, Travel, Type, Information
RELATED-DATA-CONCEPT: INFORMATIONREQUEST_
RELATIONSHIP-TYPE: Qualifier of InformationRequest-Type
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: informationrequest-SubType
VALID-VALUE-RULE: {weatherTemperature(0), weatherHighTemperature(1), weatherLowTemperature(2), weatherSkyConditions(3), weatherProbability(4), weatherSpecialConditions(5), weatherVisibility(6), weatherWindSpeed(7), weatherHumidity(8), weatherPressure(9), weatherSunriseTime(10), weatherSunsetTime(11), pollutionSmogAlert(12), pollutionAirQualityIndex(13), pollutionCarbonMonoxide(14), pollutionHyrdroCarbon(15), pollutionSulfurDioxide(16), pollutionNitrousOxide(17), pollutionParticulate(18), pollutionOzone(19), linkDelay(20), linkCapacity(21), linkDensity(22), linkNumLanesOpen(23), linkOccupancyPercent(24), linkSpeed(25), linkStatus(26), linkSurfaceCondition(27), linkTravelTime(28), nodeDelay(29), nodeStatus(30), incidentType(31), incidentSeverity(32), incidentStatus(33), incidentVehiclesInvolvedCount(34), eventDescription(35), eventLanesBlockedOrClosedCount(36), eventLanesRoadwaySectionClassification(37), laneClosedList(38), eventLanesDirectionOfTravel(39), eventTimeLine(40), linkName(41), linkRoadNumber(42), linkLength(43), linkCapacity(44), linkNumLanes(45), transitVehicleOffSchedule(61), flightDepartureGate(62), flightArrivalGate(63), transitVehicleOffSchedule(64), directoryEntryCost(65), reservedStandard(128), reservedLocalization(255)} (0..255),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1043
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.44 DESCRIPTIVE-NAME: INCIDENT_Location_spatial

DESCRIPTIVE-NAME-CONTEXT: ITS
DEFINITION: Location Reference for a specific incident.
FORMULA:
SOURCE:
CLASS-NAME: Traffic Management
DATACONCEPT-TYPE: Data Element
KEYWORD: Location, Incident
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS: Relocate to data frame when they exist

SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN: Spatial Data Interoperability Protocol for
DATA-TYPE: MESSAGE
ASN1-NAME: incident-Location
VALID-VALUE-RULE: LRMS, -- Location Reference

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1042
DATACONCEPT-VERSION: 0
VIEW: Traffic Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.45 DESCRIPTIVE-NAME: LINK_Location_spatial

DESCRIPTIVE-NAME-CONTEXT: Manage Traffic
DEFINITION: Location reference for a specific link.
FORMULA:
SOURCE:
CLASS-NAME: Manage Traffic
DATACONCEPT-TYPE: Data Element
KEYWORD: Link, Location
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN: Spatial Data Interoperability Protocol for
DATA-TYPE: MESSAGE
ASN1-NAME: link-Location
VALID-VALUE-RULE: LRMS, -- Location Reference

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1045
DATACONCEPT-VERSION: 0
VIEW: Route Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.46 DESCRIPTIVE-NAME: LOT_Location_spatial

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: A Location Reference which encapsulates the full location of the Lot for the Traveler. The Location Reference can be requested in a variety of formats depending on the application needs.
FORMULA:
SOURCE:
CLASS-NAME: Parking Management
DATACONCEPT-TYPE: Data Element
KEYWORD: Location,Lot
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:

CONSTRAINTS:
VALUE-DOMAIN: Spatial Data Interoperability Protocol for
DATA-TYPE: MESSAGE
ASN1-NAME: lot-Location
VALID-VALUE-RULE: LRMS, -- Location Reference

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1047
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.47 DESCRIPTIVE-NAME: LOT_Name_text

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The name of the Lot or its common description for purposes of describing the lot to the traveler.
FORMULA:
SOURCE:
CLASS-NAME: Parking Management
DATACONCEPT-TYPE: Data Element
KEYWORD: Name, Lot, Parking
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: lot-Name
VALID-VALUE-RULE: (SIZE(1..30)), -- Name of the Parking Lot

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1048
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:

6.48 DESCRIPTIVE-NAME: LOT_Status_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The current status of the Lot in terms of occupancy - used as shorthand for broadcast and basic information.
FORMULA:
SOURCE:
CLASS-NAME: Parking Management
DATACONCEPT-TYPE: Data Element
KEYWORD: Lot, Occupancy, Spaces, Parking
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS: Don't we want to assign more value sub types here?
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type

ASN1-NAME: lot-Status
VALID-VALUE-RULE: {noEntry(0),
10%OrLess(1),
20%OrLess(2)},

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1049
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.49 DESCRIPTIVE-NAME: LOT_InformationType_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The specific lot information being requested.
FORMULA:
SOURCE:
CLASS-NAME: Parking Management
DATACONCEPT-TYPE: Data Element
KEYWORD: Lot, Information
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: lot-InformationType
VALID-VALUE-RULE: {lotCapacity(0), lotAvailableSpaces(1), lotName(2), lotBusinessHours(3),
lotParkingCost(4), lotFillTime(5)} (0..255),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1046
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.50 DESCRIPTIVE-NAME: LOTSTAY_EstimatedDuration_quantity

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Estimated duration of a Parking Lot stay.
FORMULA:
SOURCE:
CLASS-NAME: Parking Management
DATACONCEPT-TYPE: Data Element
KEYWORD: Lot, Occupancy, Spaces, Parking
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN: Unit = Minutes
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: lotstay-EstimatedDuration

VALID-VALUE-RULE: (0..65535),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1050
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.51 DESCRIPTIVE-NAME: MESSAGE_Confidence_percent

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The percentage of confidence the ISP has assessed for the message.
FORMULA:
SOURCE:
CLASS-NAME: User Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Message, Confidence
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: message-Confidence
VALID-VALUE-RULE: (0..100),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1051
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.52 DESCRIPTIVE-NAME: MESSAGE_Priority_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The priority of the message as assigned by the ISP.
FORMULA:
SOURCE:
CLASS-NAME: User Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Message, Priority
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: message-Priority
VALID-VALUE-RULE: {nonEssential(0),
lowPriority(1),
normalPriority(2),
highPriority(3),

criticalImmediate(4),
reservedStandard(10)},

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1052
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.53 DESCRIPTIVE-NAME: MESSAGE_Quality_percent

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The percentage of quality the ISP has assessed for the message.
FORMULA:
SOURCE:
CLASS-NAME: User Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Message, Quality
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: message-Quality
VALID-VALUE-RULE: (0..100),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1053
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.54 DESCRIPTIVE-NAME: MESSAGE_Version_number

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: A unique identifier of a message.
FORMULA:
SOURCE:
CLASS-NAME: User Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Message, Version
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: message-Version
VALID-VALUE-RULE: (0..255),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1054
DATACONCEPT-VERSION: 0

VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.55 DESCRIPTIVE-NAME: NODE_Location_spatial

DESCRIPTIVE-NAME-CONTEXT: Manage Traffic
DEFINITION: Location reference for a specific node.
FORMULA:
SOURCE:
CLASS-NAME: Manage Traffic
DATACONCEPT-TYPE: Data Element
KEYWORD: Node, Location
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN: Spatial Data Interoperability Protocol for
DATA-TYPE:MESSAGE
ASN1-NAME: node-Location
VALID-VALUE-RULE: LRMS, -- Location Reference

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1055
DATACONCEPT-VERSION: 0
VIEW: Route Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.56 DESCRIPTIVE-NAME: POLLUTION_AirQualityIndex_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The air quality index in a region. The pollutant level percentile compared to the National Ambient Air Quality Standard for criteria pollutants.
FORMULA:
SOURCE:
CLASS-NAME: Pollution
DATACONCEPT-TYPE: Data Element
KEYWORD: Pollution, Measure
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: pollution-AirQualityIndex
VALID-VALUE-RULE: (0..65565),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1056
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.57 DESCRIPTIVE-NAME:POLLUTION_CarbonMonoxide_quantity

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The carbon monoxide levels in a region.
FORMULA:
SOURCE:
CLASS-NAME: Pollution
DATACONCEPT-TYPE: Data Element
KEYWORD: Pollution, Measure
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN: 1/1000 ppm
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: pollution-CarbonMonoxide
VALID-VALUE-RULE: (0..255),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1057
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.58 DESCRIPTIVE-NAME: POLLUTION_Hydrocarbon_quantity

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The hydrocarbon levels in a region.
FORMULA:
SOURCE:
CLASS-NAME: Pollution
DATACONCEPT-TYPE: Data Element
KEYWORD: Pollution, Measure
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN: 1/1000 ppm
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: pollution-Hydrocarbon
VALID-VALUE-RULE: (0..255),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1058
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.59 DESCRIPTIVE-NAME: POLLUTION_NitrousOxide_quantity

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The nitrous oxide levels in a region.
FORMULA:
SOURCE:
CLASS-NAME: Pollution
DATACONCEPT-TYPE: Data Element
KEYWORD: Pollution, Measure
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN: 1/1000 ppm
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: pollution-NitrousOxide
VALID-VALUE-RULE: (0..255),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1059
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.60 DESCRIPTIVE-NAME: POLLUTION_Ozone_quantity

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The ozone levels in a region.
FORMULA:
SOURCE:
CLASS-NAME: Pollution
DATACONCEPT-TYPE: Data Element
KEYWORD: Pollution, Measure
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN: 1/1000 ppm
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: pollution-Ozone
VALID-VALUE-RULE: (0..255),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1060
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.61 DESCRIPTIVE-NAME: POLLUTION_Particulate_quantity

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The level of particulate in a region.
FORMULA:
SOURCE:
CLASS-NAME: Pollution
DATACONCEPT-TYPE: Data Element
KEYWORD: Pollution, Measure
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN: 1/1000 ppm
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: pollution-Particulate
VALID-VALUE-RULE: (0..255),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1061
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.62 DESCRIPTIVE-NAME: POLLUTION_SmogAlert_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Reflects the smog alert level, where 0=No Alert.
FORMULA:
SOURCE:
CLASS-NAME: Pollution
DATACONCEPT-TYPE: Data Element
KEYWORD: Pollution, Smog, Alert
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: pollution-SmogAlert
VALID-VALUE-RULE: {noAlert(0), increasingAlertLevel(1)},

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1062
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.63 DESCRIPTIVE-NAME: POLLUTION_SulfurDioxide_quantity

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The level of sulfur dioxide in a region.
FORMULA:
SOURCE:
CLASS-NAME: Pollution
DATACONCEPT-TYPE: Data Element
KEYWORD: Pollution, Measure
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN: 1/1000 ppm
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: pollution-SulfurDioxide
VALID-VALUE-RULE: (0..255),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1063
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.64 DESCRIPTIVE-NAME: PRICE_DayType_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Used as part of Sending a Price Schedule - The Days of Week to which the following information pertains - also includes designator “Hol” for Holiday.
FORMULA:
SOURCE:
CLASS-NAME: User Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Lot, Price, Days, Business Hours, Price Schedule
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS: See also date of week codes and TCIP int values for dates
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: price-DayType
VALID-VALUE-RULE: {all(0),
Monday(1),
Tuesday(2),
Wednesday(3),
Thursday(4),
Friday(5),
Saturday(6),
Sunday(7),
mondayToFriday(8), mondayToFridayExceptHolidays(9), weekend(10),
mondayToThursday(11),
holiday(12)},

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1064
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.65 DESCRIPTIVE-NAME: PRICE_EndTime_time

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Used as part of Sending a Price Schedule - The Ending entry time for which a price schedule applies.
FORMULA:
SOURCE:
CLASS-NAME: User Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Lot, Price, Days, Business Hours, Price Schedule
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN: ANSI NCITS.310
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: price-EndTime
VALID-VALUE-RULE: -- Valid times using 24-hour notation. HH=00 through 23; MM=00 through 59; SS=00 through 59; ssss=0000 through 9999. HH represents hours, MM minutes, SS seconds, and ssss decimal seconds to whatever number of significant digits is required.

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1065
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.66 DESCRIPTIVE-NAME: PRICE_FirstPayment_amount

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Used as part of Sending a Price Schedule - The first payment where it differs from succeeding payments or the fixed price of a stay.
FORMULA:
SOURCE:
CLASS-NAME: User Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Lot, Price, Days, Business Hours, Price Schedule
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 9 - Real Type
ASN1-NAME: price-FirstPayment

VALID-VALUE-RULE: (0..99999.99),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1066
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.67 DESCRIPTIVE-NAME: PRICE_Maximum_amount

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Used as part of Sending a Price Schedule - The Maximum amount payable regardless of stay.
FORMULA:
SOURCE:
CLASS-NAME: User Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Lot, Price, Days, Business Hours, Price Schedule
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 9 - Real Type
ASN1-NAME: price-Maximum
VALID-VALUE-RULE: (0..99999.99),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1067
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.68 DESCRIPTIVE-NAME: PRICE_TimeInterval_quantity

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Used as part of Sending a Price Schedule - The Time Interval for the Rate (such as 30 minutes) with all other qualifiers specified. Fixed Rates are specified with the First Payment field.
FORMULA:
SOURCE:
CLASS-NAME: User Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Lot, Price, Days, Business Hours, Price Schedule
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN: Minutes
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: price-TimeInterval
VALID-VALUE-RULE: (0..65535),

Administrative Meta Attributes
DATACONCEPT-IDENTIFIER: 1068
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.69 DESCRIPTIVE-NAME: PRICE_TimeValue_quantity
DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Used as part of Sending a Price Schedule - The Cost of a space for the given time interval with all other qualifiers specified.
FORMULA:
SOURCE:
CLASS-NAME: User Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Lot, Price, Days, Business Hours, Price Schedule
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 9 - Real Type
ASN1-NAME: price-TimeValue
VALID-VALUE-RULE: (0..99999.99),
Administrative Meta Attributes
DATACONCEPT-IDENTIFIER: 1069
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.70 DESCRIPTIVE-NAME: REQUEST_Type_code
DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The interval, in 10-minute increments, for status updates for parking lot information.
FORMULA:
SOURCE:
CLASS-NAME: Parking Management
DATACONCEPT-TYPE: Data Element
KEYWORD:
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: request-Type
VALID-VALUE-RULE: (0..255), -- Time in 10-minute increments.
Administrative Meta Attributes
DATACONCEPT-IDENTIFIER: 1070
DATACONCEPT-VERSION: 0

VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.71 DESCRIPTIVE-NAME: ROUTE_Description_text

DESCRIPTIVE-NAME-CONTEXT: ITS
DEFINITION: A description of the service a route provides.
FORMULA:
SOURCE:
CLASS-NAME: Transit Passenger Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Route Description
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: route-Description
VALID-VALUE-RULE: (SIZE(1..300), -- Description of the route

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1071
DATACONCEPT-VERSION: 0
VIEW: Route Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.72 DESCRIPTIVE-NAME: ROUTE_Identity_number

DESCRIPTIVE-NAME-CONTEXT: ITS
DEFINITION: A unique identifier for each route on which transit service is provided.
FORMULA:
SOURCE:
CLASS-NAME: Transit Passenger Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Route Identity
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: route-Identity
VALID-VALUE-RULE: (SIZE(1..255)), -- Unique identifier for the traveler's route

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1072
DATACONCEPT-VERSION: 0
VIEW: Route Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.73 DESCRIPTIVE-NAME: ROUTE_Name_text

DESCRIPTIVE-NAME-CONTEXT: ITS
DEFINITION: The name of a route. Usually the two end points of a route or the major street along which the route runs.
FORMULA:
SOURCE:
CLASS-NAME: Transit Passenger Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Route Name
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: route-Name
VALID-VALUE-RULE: (SIZE(1..255)), -- Name of the route

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1073
DATACONCEPT-VERSION: 0
VIEW: Route Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.74 DESCRIPTIVE-NAME: ROUTE_SpecialService_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Indicates whether the route is a special service run.
FORMULA:
SOURCE:
CLASS-NAME:
DATACONCEPT-TYPE: Data Element
KEYWORD: Route
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 1 - Boolean Type
ASN1-NAME: route-SpecialService
VALID-VALUE-RULE: , -- TRUE | FALSE

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1074
DATACONCEPT-VERSION: 0
VIEW: Route Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.75 DESCRIPTIVE-NAME: SERVICE_Mode_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The transportation mode of a particular transit service. Common modes are bus, subway (or heavy rail), light rail, commuter rail, paratransit, ferry, etc.
FORMULA:
SOURCE:
CLASS-NAME: Transit Passenger Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Service, Mode
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: service-Mode
VALID-VALUE-RULE: (SIZE(0..20)),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1075
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.76 DESCRIPTIVE-NAME: SETTING_ExtendedInformation_text

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: A binary object which allows the ISP to pass any additional setting information.
FORMULA:
SOURCE:
CLASS-NAME: Traveler Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Setting, Extended Information
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 4 - Octetstring Type
ASN1-NAME: setting-ExtendedInformation
VALID-VALUE-RULE: (SIZE(1..MAX)),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1076
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.77 DESCRIPTIVE-NAME: SETTING_Identity_number

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Unique identity for the user setting.
FORMULA:
SOURCE:
CLASS-NAME: Traveler Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Identity, Setting
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: setting-Identity
VALID-VALUE-RULE: (0..255),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1077
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.78 DESCRIPTIVE-NAME: SETTING_PreferenceSubType_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Allows the ISP to define additional settings for the user.
FORMULA:
SOURCE:
CLASS-NAME: Traveler Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Setting, Preference
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE:UNIVERSAL 2 - Integer Type
ASN1-NAME: setting-PreferenceSubType
VALID-VALUE-RULE: (0..255), -- Reserved for localization.

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1078
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.79 DESCRIPTIVE-NAME: SETTING_PreferenceType_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Allows the ISP to define additional settings for the user.
FORMULA:
SOURCE:
CLASS-NAME: Traveler Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Setting, Preference
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: setting-PreferenceType
VALID-VALUE-RULE: (0..255), -- Reserved for localization.

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1079
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.80 DESCRIPTIVE-NAME: SETTING_Type_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Allows the user to specify the type of setting, including language, directory services, etc.
FORMULA:
SOURCE:
CLASS-NAME: Traveler Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Setting, Type
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: setting-Type
VALID-VALUE-RULE: {language(0),
directoryServices(1),
tripGuidance(2),
other(3),
reservedForStandard(128), reservedForLocalUse(255)} (0..255),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1080
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.81 DESCRIPTIVE-NAME: TRAVELER_EMail_text

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: A traveler's e-mail address.
FORMULA:
SOURCE:
CLASS-NAME: User Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Traveler, email
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 4 - Octetstring Type
ASN1-NAME: traveler-EMail
VALID-VALUE-RULE: (SIZE(1..40)),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1081
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.82 DESCRIPTIVE-NAME: TRAVELER_Fax_number

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The telephone number to a traveler's fax machine.
FORMULA:
SOURCE:
CLASS-NAME: User Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Traveler, Fax
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 4 - Octetstring Type
ASN1-NAME: traveler-Fax
VALID-VALUE-RULE: (SIZE(10)),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1083
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.83 DESCRIPTIVE-NAME: TRAVELER_Identity_number

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Identifies a Traveler uniquely - can be used to drive a session and to reference a traveler profile.
FORMULA:
SOURCE:
CLASS-NAME: User Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Traveler, Identity, ID
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: traveler-Identity
VALID-VALUE-RULE: (SIZE(1..12)), -- Unique text identifying the traveler

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1085
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.84 DESCRIPTIVE-NAME: TRAVELER_Location_spatial

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Location reference describing the location of the traveler-current or future.
FORMULA:
SOURCE:
CLASS-NAME: User Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Directory Entry, Traveler Location, LRMS
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN: Spatial Data Interoperability Protocol for
DATA-TYPE: MESSAGE
ASN1-NAME: traveler-Location
VALID-VALUE-RULE: LRMS, -- Location Reference

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1088
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.85 DESCRIPTIVE-NAME: TRAVELER_Pager_number

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: A traveler's pager telephone number.
FORMULA:
SOURCE:
CLASS-NAME: User Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Traveler, pager
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 18 - Character - Numeric String Type
ASN1-NAME: traveler-Pager
VALID-VALUE-RULE: (SIZE(1..20)), -- Valid pager number

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1089
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.86 DESCRIPTIVE-NAME: TRAVELER_InternationalAccessCode_number

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: A traveler's international access code for the telephone number.
FORMULA:
SOURCE:
CLASS-NAME: User Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Traveler, Phone
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 18 - Character - Numeric String Type
ASN1-NAME: traveler-InternationalAccessCode
VALID-VALUE-RULE: (SIZE(1..3)), -- Valid International Access Code.

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1086
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.87 DESCRIPTIVE-NAME: TRAVELER_Phone_number

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: A traveler's telephone number.
FORMULA:
SOURCE:
CLASS-NAME: User Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Traveler, Phone
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 18 - Character - Numeric String Type
ASN1-NAME: traveler-Phone
VALID-VALUE-RULE: (SIZE(10)), -- Valid 10 digit telephone number.

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1090
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.88 DESCRIPTIVE-NAME: TRAVELER_Extension_number

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: A traveler's telephone extension.
FORMULA:
SOURCE:
CLASS-NAME: User Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Traveler, Phone, Extension
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 18 - Character - Numeric String Type
ASN1-NAME: traveler-Extension
VALID-VALUE-RULE: (SIZE(1..4)), -- Telephone extension number.

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1082
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.89 DESCRIPTIVE-NAME: TRAVELER_Setting_text

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Optional data element for ongoing user choices, preferences, etc.
FORMULA:
SOURCE:
CLASS-NAME: Traveler Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Traveler, Profile
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: traveler-Setting
VALID-VALUE-RULE: (SIZE(1..40)), -- Description and/or codes describing the traveler's preferences

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1091
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.90 DESCRIPTIVE-NAME: TRAVELER_FirstName_text

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The first name of the traveler.
FORMULA:
SOURCE:
CLASS-NAME: User Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Traveler, First Name
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: traveler-FirstName
VALID-VALUE-RULE: (SIZE(1..25)),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1084
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.91 DESCRIPTIVE-NAME: TRAVELER_LastName_text

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The last name of the traveler.
FORMULA:
SOURCE:
CLASS-NAME: User Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Traveler, Last Name
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: traveler-LastName
VALID-VALUE-RULE: (SIZE(1..25)),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1087
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.92 DESCRIPTIVE-NAME: TRIGGER_Event_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The event that causes the ISP to contact the traveler.
FORMULA:
SOURCE:
CLASS-NAME: User Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Trigger Event
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: trigger-Event
VALID-VALUE-RULE: {worseThanNormalTraffic(0),
specialEvent(1),
incidentInArea(2),
delaysOnRoute(3),
changeInHours(4),
changeInDirectoryEntry(5),
parkingNotAvailable(6),
weatherCondition(7),
pollutionCondition(8),
departureDelayed(9),
arrivalDelayed(10),
changeInSchedule(11),

changeInPrice(12),
changeInPublishedRoute(13),
changeInAccessibility(14),
changeInAvailability(15), reservedStandard(128),
reservedLocalization(255)} (0..255)

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1092
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.93 DESCRIPTIVE-NAME: TRIP_CompoundManeuverFlag_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Flag to indicate next two maneuvers comprise a compound maneuver.
FORMULA:
SOURCE:
CLASS-NAME: Route
DATACONCEPT-TYPE: Data Element
KEYWORD: Trip, Maneuver
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 1 - Boolean Type
ASN1-NAME: trip-CompoundManeuverFlag
VALID-VALUE-RULE: , -- TRUE | FALSE

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1094
DATACONCEPT-VERSION: 0
VIEW: Route Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.94 DESCRIPTIVE-NAME: TRIP_ConstraintSubType_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Values to describe constraints (as required).
FORMULA:
SOURCE:
CLASS-NAME: Trip Guidance
DATACONCEPT-TYPE: Data Element
KEYWORD: Trip, Constraint
RELATED-DATA-CONCEPT: TRIP_ConstraintType_code
RELATIONSHIP-TYPE: Qualifier of ConstraintType
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: trip-ConstraintSubType

VALID-VALUE-RULE: {hOVFullVehicle(0),
hOV2Persons(1),
hOV3Persons(2),
aDAAccessRequired(3),
elevatorRequired(4),
escalatorRequired(5),
reservedForStandard(31)} (0..31),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1095
DATACONCEPT-VERSION: 0
VIEW: Route Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.95 DESCRIPTIVE-NAME: TRIP_ConstraintType_code

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Traveler constraints affecting route selection.
FORMULA:
SOURCE:
CLASS-NAME: Trip Guidance
DATACONCEPT-TYPE: Data Element
KEYWORD: Trip, Constraint
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: trip-ConstraintType
VALID-VALUE-RULE: {numberOfModeChanges(0), aHS(1), hOVLane(2), specialNeeds(3),
reservedForStandard(31)} (0..31),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1096
VIEW: Route Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.96 DESCRIPTIVE-NAME: TRIGGER_Location_spatial

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The location reference for the trigger event.
FORMULA:
SOURCE:
CLASS-NAME: User Information
DATACONCEPT-TYPE: Data Element
KEYWORD: Trigger, Location
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN: Spatial Data Interoperability Protocol for

DATA-TYPE: MESSAGE
ASN1-NAME: trigger-Location
VALID-VALUE-RULE: LRMS, -- Location Reference

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1093
DATACONCEPT-VERSION: 0
VIEW: Traveler Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.97 DESCRIPTIVE-NAME: TRIP_DestinationLocation_spatial

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Location reference for destination.
FORMULA:
SOURCE:
CLASS-NAME: Route
DATACONCEPT-TYPE: Data Element
KEYWORD: Trip, Location
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN: Spatial Data Interoperability Protocol for
DATA-TYPE: MESSAGE
ASN1-NAME: trip-DestinationLocation
VALID-VALUE-RULE: LRMS, -- Location Reference

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1097
DATACONCEPT-VERSION: 0
VIEW: Route Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.98 DESCRIPTIVE-NAME: TRIP_EstimatedRouteCost_amount

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Estimated cost for route (tolls + transit).
FORMULA:
SOURCE:
CLASS-NAME: Route
DATACONCEPT-TYPE: Data Element
KEYWORD: Trip, Cost
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: trip-EstimatedRouteCost
VALID-VALUE-RULE: (1..65535),

Administrative Meta Attributes
DATACONCEPT-IDENTIFIER: 1098
DATACONCEPT-VERSION: 0
VIEW: Route Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.99 DESCRIPTIVE-NAME: TRIP_EstimatedTravelTime_quantity
DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Estimate of travel time returned to the traveler based upon route.
FORMULA:
SOURCE:
CLASS-NAME: Route
DATACONCEPT-TYPE: Data Element
KEYWORD: Trip
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: trip-EstimatedTravelTime
VALID-VALUE-RULE: (0..65535), -- Amount of time in seconds.
Administrative Meta Attributes
DATACONCEPT-IDENTIFIER: 1099
DATACONCEPT-VERSION: 0
VIEW: Route Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.100 DESCRIPTIVE-NAME: TRIP_EstimatedWayPointTravelTime_time
DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Estimate of travel time between way points or from/to origin/destination and way point.
FORMULA:
CLASS-NAME: Route
SOURCE:
DATACONCEPT-TYPE: Data Element
KEYWORD: Trip, WayPoint
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS: Consider using GenTime
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN: ANSI NCITS.310
DATA-TYPE: UNIVERSAL 22 - Character - IA5 String Type
ASN1-NAME: trip-EstimatedWayPointTravelTime
VALID-VALUE-RULE: -- Valid times using 24-hour notation. HH=00 through 23; MM=00 through 59; SS=00 through 59; ssss=0000 through 9999. HH represents hours, MM minutes, SS seconds, and ssss decimal seconds to whatever number of significant digits is required.

Administrative Meta Attributes
DATACONCEPT-IDENTIFIER: 1100
DATACONCEPT-VERSION: 0
VIEW: Route Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.101 DESCRIPTIVE-NAME: TRIP_GuidanceLevel_code
DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: A code to describe the amount of information to be returned to the user, such as; maneuvers only, connected links, etc.
FORMULA:
SOURCE:
CLASS-NAME: Trip Guidance
DATACONCEPT-TYPE: Data Element
KEYWORD: Trip, Guidance Level
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 10 - Enumerated Type
ASN1-NAME: trip-GuidanceLevel
VALID-VALUE-RULE: {maneuversOnly(0), linksBetweenManeuvers(1), connectedLinks(2)}, (0..31)
Administrative Meta Attributes
DATACONCEPT-IDENTIFIER: 1101
DATACONCEPT-VERSION: 0
VIEW: Route Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.102 DESCRIPTIVE-NAME: TRIP_LinkLocation_spatial
DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The location reference for a specified link.
FORMULA:
SOURCE:
CLASS-NAME: Trip Guidance
DATACONCEPT-TYPE: Data Element
KEYWORD: Trip, Links
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN: Spatial Data Interoperability Protocol for
DATA-TYPE: MESSAGE
ASN1-NAME: trip-LinkLocation
VALID-VALUE-RULE: LRMS, -- Location Reference
Administrative Meta Attributes
DATACONCEPT-IDENTIFIER: 1102
DATACONCEPT-VERSION: 0

VIEW: Route Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.103 DESCRIPTIVE-NAME: TRIP_ManeuverAngle_code
DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Angle of turn calculated by ISP or Route Guidance Provider.
FORMULA:
SOURCE:
CLASS-NAME: Route
DATACONCEPT-TYPE: Data Element
KEYWORD: Trip, maneuver
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: trip-ManeuverAngle
VALID-VALUE-RULE: (0..359), -- Angle measured in degrees from 0-359 with 1 being slight right (east) of north

Administrative Meta Attributes
DATACONCEPT-IDENTIFIER: 1103
DATACONCEPT-VERSION: 0
VIEW: Route Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.104 DESCRIPTIVE-NAME: TRIP_ManeuverCode_code
DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Code describing maneuver required to maintain route.
FORMULA:
SOURCE:
CLASS-NAME: Route
DATACONCEPT-TYPE: Data Element
KEYWORD: Trip Maneuver
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: trip-ManeuverCode
VALID-VALUE-RULE: {continueStraightThroughIntersection(0), turnRight(1), turnSoftRight(2), turnHardRight(3),turnLeft(4), turnSoftLeft(5), turnHardLeft(6), uturnAtIntersection(7), uturnPastIntersection(8), uturn(9), goNorth(10), goNortheast(11), goEast(12), goSoutheast(13), goSouth(14), goSouthwest(15), goWest(16), goNorthwest(17), enterTrafficCircleOrRoundabout(18), exit1stRight(19), exit2ndRight(20), exit3rdRight(21),exit4thRight(22), enterFreeway(23), exitFreeway(24), exitFreewayLeft(25),

exitFreewayCenter(26), branchRight(27), branchLeft(28), mergeRight(29), mergeLeft(30),stopAhead(31), payToll(32), walkAcrossPlazaOrSquare(33), walkUpStairs(34), walkDownStairs(35), takeEscalatorUp(36), takeEscalatorDown(37), takeElevatorUp(38), takeElevatorDown(39), board(40), alight(41)} (0..255),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1104
DATACONCEPT-VERSION: 0
VIEW: Route Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.105 DESCRIPTIVE-NAME: TRIP_ManeuverLocation_spatial

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: Location reference where maneuver takes place.
FORMULA:
SOURCE:
CLASS-NAME: Route
DATACONCEPT-TYPE: Data Element
KEYWORD: Trip, Maneuver, Location
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN: Spatial Data Interoperability Protocol for
DATA-TYPE:MESSAGE
ASN1-NAME: trip-ManeuverLocation
VALID-VALUE-RULE: LRMS, -- Location Reference

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1105
DATACONCEPT-VERSION: 0
VIEW: Route Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.106 DESCRIPTIVE-NAME: TRIP_MaximumConnectedLinks_quantity

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The maximum number of connected links to return to the user.
FORMULA:
SOURCE:
CLASS-NAME: Trip Guidance
DATACONCEPT-TYPE: Data Element
KEYWORD: Trip, Links
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE:UNIVERSAL 2 - Integer Type
ASN1-NAME: trip-MaximumConnectedLinks

VALID-VALUE-RULE: (0..255),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1106
DATACONCEPT-VERSION: 0
VIEW: Route Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.107 DESCRIPTIVE-NAME: TRIP_MaximumLinks_quantity

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The maximum number of links to return to the user.
FORMULA:
SOURCE:
CLASS-NAME: Trip Guidance
DATACONCEPT-TYPE: Data Element
KEYWORD: Trip, Links
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: trip-MaximumLinks
VALID-VALUE-RULE: (0..255),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1107
DATACONCEPT-VERSION: 0
VIEW: Route Information
SYNONYMOUS-DESCRIPTIVE-NAME:
SYNONYMOUS-DESCRIPTIVE-NAME-CONTEXT:

6.108 DESCRIPTIVE-NAME: TRIP_MaximumManeuvers_quantity

DESCRIPTIVE-NAME-CONTEXT: Provide Driver and Traveler Services
DEFINITION: The maximum number of maneuvers to return to the user.
FORMULA:
SOURCE:
CLASS-NAME: Trip Guidance
DATACONCEPT-TYPE: Data Element
KEYWORD: Trip, Maneuvers
RELATED-DATA-CONCEPT:
RELATIONSHIP-TYPE:
REMARKS:
SYMBOLIC-NAME:
SYMBOLIC-NAME-USAGE:
CONSTRAINTS:
VALUE-DOMAIN:
DATA-TYPE: UNIVERSAL 2 - Integer Type
ASN1-NAME: trip-MaximumManeuvers
VALID-VALUE-RULE: (0..255),

Administrative Meta Attributes

DATACONCEPT-IDENTIFIER: 1108
DATACONCEPT-VERSION: 0