PROGRAMME & DEVELOPMENT SERVICES

XML Services

Ver. 6.3

Reference Document – Tracking Service

Contents

1 Introduction

This document describes the XML public interface for the Shipment Tracking service with Piece Enablement. The document specifies the service functions that are offered by the Shipment Tracking service, the XML message document used to invoke these service functions, and the response XML message document from the service.

In this document are the Shipment Tracking Request and Shipment Tracking Response schema. Tables describe the data elements to be found in each schema. Following each set of tables is a sample message.

Note: These schema conform to the May 2, 2001 XML Schema recommendation of the W3C. For more information see the XML Schema page of the W3C Web site at http://www.w3c.org/XML/Schema.

1.1 Implementation of the Service

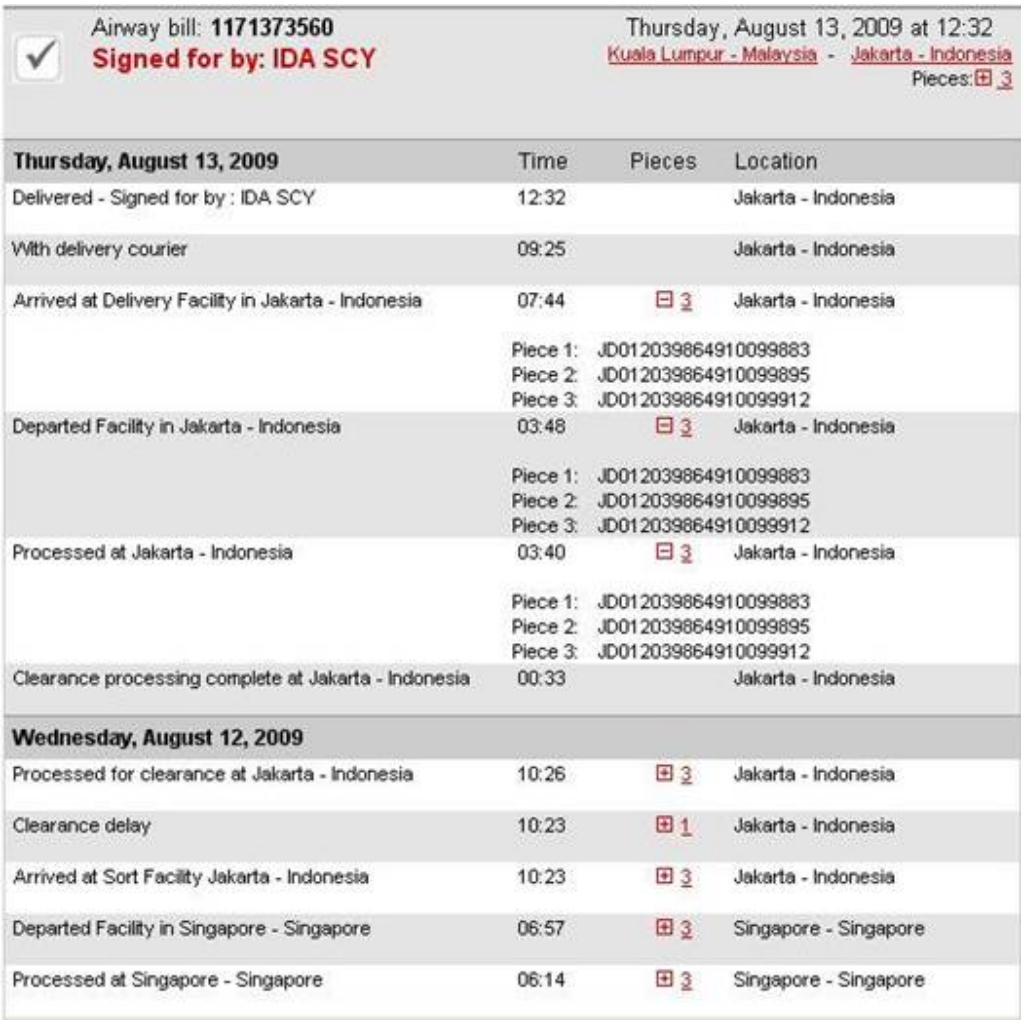
This service is implemented using XML messaging. The customer/partner is responsible for sending an XML message in the format displayed in the Request schema in this document. The customer/partner is responsible for implementing the capability to receive XML messages in the format displayed in the Response schema in this document.

1.2 About the Tracking Service

The Shipment Tracking service is used to inform customers about the status of their shipment in transit, using either a known query (using a valid DHL Waybill number and License Plate Number) or an unknown query (using the following fields – Shipper‘s Reference Number, Account Number and Shipment date)

Note that XML Services tracking results are not to be directly presented to the users. Please refer to the screenshot below and consider following ideas to format the tracking results –

- Present the Shipment and Piece events in chronological order of the events
- Don’t group Shipment and Piece events separately because depending on the type of event and processing facility, only piece data or only shipment data or both shipment and piece data can be returned.



Airway bill: **1171373560**
Signed for by: IDA SCY

Thursday, August 13, 2009 at 12:32
Kuala Lumpur - Malaysia - Jakarta - Indonesia
Pieces: 3

Thursday, August 13, 2009	Time	Pieces	Location
Delivered - Signed for by : IDA SCY	12:32		Jakarta - Indonesia
With delivery courier	09:25		Jakarta - Indonesia
Arrived at Delivery Facility in Jakarta - Indonesia	07:44	3	Jakarta - Indonesia
		Piece 1: JD012039864910099883 Piece 2: JD012039864910099895 Piece 3: JD012039864910099912	
Departed Facility in Jakarta - Indonesia	03:48	3	Jakarta - Indonesia
		Piece 1: JD012039864910099883 Piece 2: JD012039864910099895 Piece 3: JD012039864910099912	
Processed at Jakarta - Indonesia	03:40	3	Jakarta - Indonesia
		Piece 1: JD012039864910099883 Piece 2: JD012039864910099895 Piece 3: JD012039864910099912	
Clearance processing complete at Jakarta - Indonesia	00:33		Jakarta - Indonesia
Wednesday, August 12, 2009			
Processed for clearance at Jakarta - Indonesia	10:26	3	Jakarta - Indonesia
Clearance delay	10:23	1	Jakarta - Indonesia
Arrived at Sort Facility Jakarta - Indonesia	10:23	3	Jakarta - Indonesia
Departed Facility in Singapore - Singapore	06:57	3	Singapore - Singapore
Processed at Singapore - Singapore	06:14	3	Singapore - Singapore

1.3 About the Data Element Definition Tables

The following tables describe the elements found in the Shipment Tracking service Request and Response messages. In the tables:

Element Name is the data element‘s name within the XML document.

Datatype/Format indicates the data element‘s type or format if no specific datatype is listed (for example, text strings). To view the complete set of the datatypes for all XML Shipping Services, see the document entitled *XML Shipping Services: Datatype Definitions*.

Definition is a short description of the data element.

(Required) indicates whether an element is required and the number of times the element can occur in the message. Each element occurs only once, unless otherwise specified. If the element can occur more than once, the maximum number of occurrences is indicated in parentheses.

M indicates that the segment is mandatory. O indicates that the segment is optional.

C indicates that segment is conditional. The condition that triggers the requirement of the segment is indicated in **Definition**.

Type indicates the value type—either numeric, alphanumeric (indicated in the table as

A/N), date, or integer.
Length indicates the length of the value. Any special format of the field value is indicated in parentheses.

Valid Values indicates required values, if any. Where specific values are expected, the value passed in the message is indicated in **bold text**, followed by the literal meaning in parentheses.

Shipment Tracking Request:

The following are the Shipment Tracking request schemas. The schema has been defined based on Known AWB Query and Unknown AWB Query. Following the schema is a table outlining the data elements found in the schema. Each element in the schema is defined in brief wherever it occurs.

2 Shipment Known Tracking Request Schema

The following is the Shipment Tracking request schema. The schema has been defined based on a known AWB query. Following the schema is a table outlining the data elements found in the schema. All the Known Query xmls must adhere to the following schema files.

```
<?xml version="1.0" encoding="UTF-8"?>
<xsd:schema targetNamespace="http://www.dhl.com" xmlns:xsd="http://www.w3.org/2001/XMLSchema"
xmlns="http://www.dhl.com" xmlns:dhl="http://www.dhl.com/datatypes" elementFormDefault="unqualified">
<xsd:import namespace="http://www.dhl.com/datatypes" schemaLocation="datatypes_global_v62.xsd"/>
        <xsd:element name="KnownTrackingRequest">
                <xsd:annotation>
                        <xsd:documentation>Root element for known shipment tracking request
                        </xsd:documentation>
                </xsd:annotation>
        <xsd:complexType>
                <xsd:sequence>
                        <xsd:element name="Request" type="dhl:Request"/>
                        <xsd:element name="LanguageCode" type="dhl:LanguageCode"/>
                                <xsd:choice>
                                <xsd:element name="AWBNumber" type="dhl:AWBNumber" maxOccurs="10"/>
                                <xsd:element name="LPNumber" type="dhl:TrackingPieceID" minOccurs="1"
                                        maxOccurs="10" />
                                </xsd:choice>
                        <xsd:element name="LevelOfDetails" type="dhl:LevelOfDetails"/>
                        <xsd:element name="PiecesEnabled" minOccurs="0">
                        <xsd:simpleType>
                                <xsd:annotation>
                                        <xsd:documentation>S for Only shipment Details,B for Both Shipment
                                                and Piece Details,P for only PieceDetails
                                        </xsd:documentation>
                                </xsd:annotation>
                        <xsd:restriction base="xsd:string">
                                <xsd:enumeration value="S"/>
                                <xsd:enumeration value="B"/>
                                <xsd:enumeration value="P"/>
                        </xsd:restriction>
                        </xsd:simpleType>
                        </xsd:element>
                        <xsd:element name="CountryCode" type="dhl:CountryCode" minOccurs="0"/>
                </xsd:sequence>
        <xsd:attribute name="schemaVersion" type="xsd:decimal" use="required" fixed="1.0"/>
        </xsd:complexType>
    </xsd:element>
</xsd:schema>
```

Shipment Known Tracking Request Data Element Definitions

All the name fields shouldn‘t contain the special characters directly as it is.

For e.g. the ‘&‘should be represented as ‘&

The following table describes the data elements found in the Shipment Known Tracking Request Schema.

Element Name	Datatype/Format	Req	Definition	Valid Values
KnownTrackingRequest	dhl:KnownTrackingRequest	M	Root element of known tracking request	
Request	dhl:Request	M	Identifies the message as a request message	
LanguageCode	dhl:LanguageCode	M	Code identifying language used by requestor	Default is en (English) if no value supplied
AWBNumber	dhl:AWBnumber	C	Waybill Number is mandatory for query by Waybill. DHL-defined 10 digits waybill number.	Note: Only one AWBNumber option or LPNumber option on each request Maximum waybill number’s Occurrences are 10.

Element Name	Datatype/Format	Req	Definition	Valid Values
LPNumber	dhl:TrackingPieceID	C	License Plate Number is mandatory for query by License Plate Number. DHL-defined maximum length of 35-digit License Plate number.	Note: Only one AWBNumber option or LPNumber option on each request. Please suppress the Data/Application Identifiers present as the prefix for the License Plate Numbers. Example (J), (00) etc. should be removed before sending request to DHL. Maximum License Plate Number's Occurrences are 10.
LevelOfDetails	dhl:LevelofDetails	M	Checkpoint details selection flag	LAST_CHECK_POINT_ONLY ALL_CHECK_POINTS
PiecesEnabled		O	Value that indicates for getting the tracking details with the additional piece details and its respective Piece Details, Piece checkpoints along with Shipment Details if queried.	S-Only Shipment Details B-Both Shipment & Piece Details P-Only Piece Details Default is 'S'
CountryCode	dhl:CountryCode	O	Country/Region code that will be used to derive specific country's or region's language code translation file	

2.1 Request Element

The element contains the header information for the message. It is present in both the request and response XML message. The request element contains a complex datatype ServiceHeader.

```
<xsd:complexType name="Request">
    <xsd:annotation>
        <xsd:documentation>Generic request header</xsd:documentation>
    </xsd:annotation>
    <xsd:sequence>
        <xsd:element name="ServiceHeader" type="ServiceHeader"/>
    </xsd:sequence>
</xsd:complexType>
```

2.1.1 ServiceHeader Element

The Service Header element contains the header information about the request message. This element must be declared only once in the Request element.

```
<xsd:complexType name="ServiceHeader"> <xsd:annotation>
<xsd:documentation>Standard routing header</xsd:documentation>
</xsd:annotation>
    <xsd:sequence>
        <xsd:element name="MessageTime" type="xsd:dateTime" minOccurs="0">
            <xsd:annotation>
                <xsd:documentation>Time this message is sent</xsd:documentation>
            </xsd:annotation>
        </xsd:element>
        <xsd:element name="MessageReference" type="MessageReference" minOccurs="0">
            <xsd:annotation>
```

```
                    <xsd:documentation>A string, peferably number, to uniquely identify individual
                    messages. Minimum length must be 28 and maximum length is
                    32</xsd:documentation>
                </xsd:annotation>
            </xsd:element>
            <xsd:element name="SiteID" type="SiteID"/>
            <xsd:element name="Password" type="Password"/>
        </xsd:sequence>
    </xsd:complexType>
```

Element Name	Datatype/Format	Req	Definition	Valid Values
MessageTime	xsd:dateTime	O	Identifies the message time. It is a mandatory field in request message	
MessageReference	MessageReference	O	Message reference number.	
SiteID	SiteID	M	Identifies the sender of the request message. It is a mandatory field in the request message.	
Password	Password	M	Authenticates the sender of the message. It is a mandatory field in request message.	

2.1.1.1. MessageTime Element

The MessageTime element contains the time at which the message was send by the requestor. The format of the should be YYYY-MM-DD(T)hh-mm-ss-Time Zone where —T is the separator between date and time.

e.g. 2002-12-02T13:23:18-07:00

```
<xsd:element name="MessageTime" type="xsd:dateTime" minOccurs="0">
    <xsd:annotation>
        <xsd:documentation>Time this message is sent</xsd:documentation>
    </xsd:annotation>
</xsd:element>
```

2.1.1.2. MessageReference Element

The MessageReference element contains the unique reference to the message, so that trace of a particular message can be easily carried out. It must be of minimum length of 28 and maximum 32.

```
<xsd:simpleType name="MessageReference">
    <xsd:annotation>
        <xsd:documentation>Reference to the requested Message</xsd:documentation>
        </xsd:annotation>
    <xsd:restriction base="xsd:string">
        <xsd:minLength value="28"/>
        <xsd:maxLength value="32"/>
        </xsd:restriction>
</xsd:simpleType>
```

2.1.1.3. SiteID Element

The site id element is used to identify the requestor of the message. Each partner/customer is provided with the site id and password. Each request message received is validated with this before proceeding forward.

```
<xsd:simpleType name="SiteID">
    <xsd:annotation>
        <xsd:documentation>Site ID used for verifying the sender</xsd:documentation>
    </xsd:annotation>
    <xsd:restriction base="xsd:string">
        <xsd:minLength value="6"/>
        <xsd:maxLength value="20"/>
    </xsd:restriction>
</xsd:simpleType>
```

2.1.1.4. Password Element

The password element is used to verify the identity the requestor of the message. Each partner/customer is provided with the site id and password. Each request message received is validated with this before proceeding forward.

```
<xsd:simpleType name="Password">
    <xsd:annotation>
        <xsd:documentation>Password used for verifying the sender</xsd:documentation>
    </xsd:annotation>
    <xsd:restriction base="xsd:string">
        <xsd:minLength value="8"/>
        <xsd:maxLength value="20"/>
    </xsd:restriction>
</xsd:simpleType>
```

2.2 LanguageCode Element

LanguageCode element contains the DHL language code used by the requestor. This element should be declared once in the Known Query Shipment Tracking Request message. The default is **en** (English).

```
<xsd:simpleType name="LanguageCode">
    <xsd:annotation>
        <xsd:documentation>DHL Language Code</xsd:documentation>
    </xsd:annotation>
        <xsd:restriction base="xsd:string"/>
</xsd:simpleType>
```

2.3 AWBNumber Element

AWBNumber element contains the waybill number with the maximum length should be 10. This element should be declared at least once in the Known Query Tracking Request message if the License Plate Number is absent. The maximum number of times this element can be repeated is 10 times.

```
<xsd:simpleType name="AWBNumber">
    <xsd:annotation>
        <xsd:documentation>Airway bill number</xsd:documentation>
    </xsd:annotation>
    <xsd:restriction base="xsd:string">
        <xsd:maxLength value="10"/>
    </xsd:restriction>
</xsd:simpleType>
```

2.4 LPNumber Element

LPNumber element contains the License Plate number with the maximum length should be 35. This element should be declared at least once in the Known Query Tracking Request message if the Waybill Number is absent. The maximum number of times this element can be repeated is 10 times.

```
<xsd:simpleType name="TrackingPieceID">
    <xsd:annotation>
        <xsd:documentation>Piece ID</xsd:documentation>
    </xsd:annotation>
    <xsd:restriction base="xsd:string">
        <xsd:minLength value="20"/>
        <xsd:maxLength value="35"/>
    </xsd:restriction>
</xsd:simpleType>
```

Note:
AWBNumber is mandatory for tracking query by Waybill Number and LPNumber is mandatory for query by License Plate Number. User can either track by Waybill Number or by License Plate Number only at one time but not Both.

2.5 LevelOfDetails Element

The LevelOfDetails element contains the checkpoint details selection flag. It must be declared once in the request message. The valid values are

1. LAST_CHECK_POINT_ONLY
2. ALL_CHECK_POINTS

```
<xsd:simpleType name="LevelOfDetails">
    <xsd:annotation>
        <xsd:documentation>Checkpoint details selection flag</xsd:documentation>
    </xsd:annotation>
    <xsd:restriction base="xsd:string">
        <xsd:enumeration value="LAST_CHECK_POINT_ONLY"/>
        <xsd:enumeration value="ALL_CHECK_POINTS"/>
    </xsd:restriction>
</xsd:simpleType>
```

2.6 PiecesEnabled Element

New tracking request structure is modified with new flag ‘PiecesEnabled’ for getting the tracking details with the additional piece details and its respective piece level checkpoints.

The valid values are:

1. S for Only Shipment Details
2. B for both Shipment & Piece Details
3. P for Only Piece Details.

```
<xsd:element name="PiecesEnabled" minOccurs="0">
<xsd:simpleType>
    <xsd:annotation>
        <xsd:documentation>S for Only shipment Details, B for Both Shipment and Piece Details, P for only
        Piece Details
        </xsd:documentation>
    </xsd:annotation>
```

```
            <xsd:restriction base="xsd:string">
                <xsd:enumeration value="S"/>
                <xsd:enumeration value="B"/>
                <xsd:enumeration value="P"/>
            </xsd:restriction>
        </xsd:simpleType>
        </xsd:element>
```

2.7 CountryCode Element

CountryCode element contains the country/region code that associated with language code if any that required for retrieving the respective country/region specific checkpoint translation.

```
<xsd:simpleType name="CountryCode">
<xsd:annotation>
    <xsd:documentation>DHL country/region codes</xsd:documentation>
</xsd:annotation>
    <xsd:restriction base="xsd:string">
        <xsd:length value="2"/>
    </xsd:restriction>
</xsd:simpleType>
```

3 Shipment Unknown Tracking Request Schema

The Shipment Tracking Unknown Query request schema (tracking query with shipper reference number and without a waybill number) is stated below. Following the schema is a table outlining the data elements found in this schema. All the Unknown Query xmls must adhere to the following schema files.

```
<?xml version="1.0" encoding="UTF-8"?>
<xsd:schema targetNamespace="http://www.dhl.com" xmlns:dhl="http://www.dhl.com/datatypes"
xmlns="http://www.dhl.com" xmlns:xsd="http://www.w3.org/2001/XMLSchema" elementFormDefault="unqualified">
<xsd:import namespace="http://www.dhl.com/datatypes" schemaLocation=" datatypes_global_v62.xsd"/>
  <xsd:element name="UnknownTrackingRequest">
    <xsd:annotation>
        <xsd:documentation>Comment describing your root element</xsd:documentation>
  </xsd:annotation>
    <xsd:complexType>
      <xsd:sequence>
        <xsd:element name="Request" type="dhl:Request"/>
         <xsd:element name="LanguageCode" type="dhl:LanguageCode"/>
        <xsd:element name="AccountNumber" type="dhl:AccountNumber"/>
        <xsd:element name="ShipperReference" type="dhl:Reference" maxOccurs="unbounded"/>
        <xsd:element name="ShipmentDate" type="dhl:ShipmentDate" minOccurs="0"/>
        <xsd:element name="CountryCode" type="dhl:CountryCode" minOccurs="0"/>
      </xsd:sequence>
        <xsd:attribute name="schemaVersion" type="xsd:decimal" use="required" fixed="1.0"/>
    </xsd:complexType>
     </xsd:element>
</xsd:schema>
```

All the name fields shouldn‘t contain the special characters directly as it is.

For e.g. the ‘&‘should be represented as ‘& ‘

Element Name	Datatype/Format	Req	Definition	Valid Values
UnknownTrackingRequest	dhl:UnknownTrackingRequest	M	Identifies the message type as an unknown tracking request	
Request	dhl: Request	M	Identifies the message as a request message	
LanguageCode	dhl: LanguageCode	M	Code identifying language used by requestor	Default is —**en** (English) if no value supplied
AccountNumber	dhl: AccountNumber	M	9 or 10 digit numbers	
ShipperReference	dhl: Reference	M	Customer-defined data field	
ShipmentDate	dhl: ShipmentDate	M	Date of shipment origin	Any value specified in a YYYY-MM-DD format
CountryCode	dhl:CountryCode	O	Country/Region code that will be used to derive specific country's or region's language code translation file	

3.1 Request Element

The element contains the header information for the message. It is present in both the request and response XML message. The request element contains a complex datatype ServiceHeader.

```
<xsd:complexType name="Request">
    <xsd:annotation>
        <xsd:documentation>Generic request header</xsd:documentation>
    </xsd:annotation>
    <xsd:sequence>
        <xsd:element name="ServiceHeader" type="ServiceHeader"/>
    </xsd:sequence>
</xsd:complexType>
```

3.1.1 ServiceHeader Element

The Service Header element contains the header information about the request message. This element must be declared only once in the Request element.

```
<xsd:complexType name="ServiceHeader">
    <xsd:annotation>
        <xsd:documentation>Standard routing header</xsd:documentation>
    </xsd:annotation>
    <xsd:sequence>
        <xsd:element name="MessageTime" type="xsd:dateTime" minOccurs="0">
            <xsd:annotation>
                <xsd:documentation>Time this message is sent</xsd:documentation>
            </xsd:annotation>
        </xsd:element>
        <xsd:element name="MessageReference" type="MessageReference"
            minOccurs="0"> <xsd:annotation>
                <xsd:documentation>A string, peferably number, to uniquely identify individual
                messages. Minimum length must be 28 and maximum length is
                32</xsd:documentation>
            </xsd:annotation>
```

```
            </xsd:element>
            <xsd:element name="SiteID" type="SiteID" minOccurs="0"/>
            <xsd:element name="Password" type="Password" minOccurs="0"/>
        </xsd:sequence>
</xsd:complexType>
```

Element Name	Datatype/Format	Req	Definition	Valid Values
MessageTime	xsd:dateTime	O	Identifies the message time. It is a mandatory field in request message	
MessageReference	MessageReference	O	Message reference number.	
SiteID	SiteID	O	Identifies the sender of the request message. It is a mandatory field in the request message.	
Password	Password	O	Authenticates the sender of the message. It is a mandatory field in request message.	

3.1.1.1. MessageTime Element

The Message Time element contains the time at which the message was send by the requestor. The format of the should be YYYY-MM-DD(T)hh-mm-ss-Time Zone where —T is the separator between date and time.

e.g. 2002-12-02T13:23:18-07:00

```
<xsd:element name="MessageTime" type="xsd:dateTime" minOccurs="0">
<xsd:annotation>
        <xsd:documentation>Time this message is sent</xsd:documentation>
    </xsd:annotation>
</xsd:element>
```

3.1.1.2. MessageReference Element

The MessageReference element contains the unique reference to the message, so that trace of a particular message can be easily carried out. It must be of minimum length of 28 and maximum 32.

```
<xsd:simpleType name="MessageReference">
    <xsd:annotation>
        <xsd:documentation>Reference to the requested Message</xsd:documentation>
    </xsd:annotation>
    <xsd:restriction base="xsd:string">
        <xsd:minLength value="28"/>
        <xsd:maxLength value="32"/>
    </xsd:restriction>
</xsd:simpleType>
```

3.1.1.3. SiteID Element

The site id element is used to identify the requestor of the message. Each partner/customer is provided with the site id and password. Each request message received is validated with this before proceeding forward.

```
<xsd:simpleType name="SiteID">
    <xsd:annotation>
```

```
            <xsd:documentation>Site ID used for verifying the sender</xsd:documentation>
        </xsd:annotation>
        <xsd:restriction base="xsd:string">
            <xsd:minLength value="6"/>
            <xsd:maxLength value="20"/>
        </xsd:restriction>
</xsd:simpleType>
```

3.1.1.4. Password Element

The password element is used to verify the identify the requestor of the message. Each partner/customer is provided with the site id and password. Each request message received is validated with this before proceeding forward.

```
<xsd:simpleType name="Password">
    <xsd:annotation>
        <xsd:documentation>Password used for verifying the sender</xsd:documentation>
    </xsd:annotation>
    <xsd:restriction base="xsd:string">
        <xsd:minLength value="8"/>
        <xsd:maxLength value="20"/>
    </xsd:restriction>
</xsd:simpleType>
```

3.2 LanguageCode Element

LanguageCode element contains the DHL language code used by the requestor. This element should be declared once in the Known Query Shipment Tracking Request message. The default is **en** (English).

```
<xsd:simpleType name="LanguageCode">
    <xsd:annotation>
        <xsd:documentation>DHL Language Code</xsd:documentation>
    </xsd:annotation>
    <xsd:restriction base="xsd:string"/>
</xsd:simpleType>
```

3.3 AccountNumber Element

The Account Number element contains the DHL account number. Following is the schema for the account number

```
<xsd:simpleType name="AccountNumber">
    <xsd:annotation>
        <xsd:documentation>DHL Account Number</xsd:documentation>
    </xsd:annotation>
    <xsd:restriction base="xsd:positiveInteger">
        <xsd:maxInclusive value="9999999999"/>
        <xsd:minInclusive value="100000000"/>
    </xsd:restriction>
</xsd:simpleType>
```

3.4 ShipperReference Element

The Shipper Reference element is the reference Id of the shipper. Following is the schema of the Shipper Reference element.

```
<xsd:simpleType name="ReferenceID">
    <xsd:annotation>
        <xsd:documentation>Shipper reference ID</xsd:documentation>
    </xsd:annotation>
    <xsd:restriction base="xsd:string">
        <xsd:maxLength value="35"/>
    </xsd:restriction>
</xsd:simpleType>
```

3.5 ShipmentDate Element

The ShipmentDate element is a complex element which contains the shipment date. It contains the following elements —ShipmentDateFrom and —ShipmentDateTo .

```
<xsd:complexType name="ShipmentDate"> <xsd:sequence>
        <xsd:element name="ShipmentDateFrom" type="Date"/>
        <xsd:element name="ShipmentDateTo" type="Date"/>
    </xsd:sequence> </xsd:complexType>
```

Element Name	Datatype/Format	Req	Definition	Valid Values
ShipmentDateFrom	Date	M	From Date of Shipment	
ShipmentDateTo	Date	M	To Date of the Shipment	

3.5.1 ShipmentDateFrom Element

The ShipmentDateFrom element contains the date from which the shipment should be queried. The format of the date should be YYYY-MM-DD.

```
<xsd:simpleType name="Date"> <xsd:annotation>
        <xsd:documentation>Date only</xsd:documentation>
    </xsd:annotation>
    <xsd:restriction base="xsd:date"/>
</xsd:simpleType>
```

3.5.2 ShipmentToDate Element

The ShipmentToDate element contains the date to which the shipment should be queried. The format of the date should be YYYY-MM-DD.

```
<xsd:simpleType name="Date"> <xsd:annotation>
        <xsd:documentation>Date only</xsd:documentation> </xsd:annotation>
    <xsd:restriction base="xsd:date"/>
</xsd:simpleType>
```

3.6 CountryCode Element

CountryCode element contains the country/region code that associated with language code if any that required for retrieving the respective country/region specific checkpoint translation.

```
<xsd:simpleType name="CountryCode">
<xsd:annotation>
    <xsd:documentation>DHL country/region codes</xsd:documentation>
</xsd:annotation>
```

```
        <xsd:restriction base="xsd:string">
            <xsd:length value="2"/>
        </xsd:restriction>
    </xsd:simpleType>
```

4 Shipment Tracking Response Schema

Following is the schema of tracking response. All successful tracking response confirm to the following schema file.

```
<?xml version="1.0" encoding="UTF-8"?>
<xsd:schema targetNamespace="http://www.dhl.com" xmlns:dhl="http://www.dhl.com/datatypes"
xmlns="http://www.dhl.com" xmlns:xsd="http://www.w3.org/2001/XMLSchema"
elementFormDefault="unqualified">
<xsd:import namespace="http://www.dhl.com/datatypes"schemaLocation=" datatypes_global_v62.xsd "/>
    <xsd:element name="TrackingResponse">
        <xsd:annotation>
            <xsd:documentation>Comment describing your root element</xsd:documentation>
        </xsd:annotation>
        <xsd:complexType>
        <xsd:sequence>
                <xsd:element name="Response" type="dhl:Response"/>
                <xsd:element name="AWBInfo" type="dhl:AWBInfo" maxOccurs="unbounded"/>
                <xsd:element name="Fault" type="dhl:Fault" minOccurs="0"/>
                <xsd:element name="LanguageCode" type="dhl:LanguageCode"/>
         </xsd:sequence>
        </xsd:complexType>
         </xsd:element>
</xsd:schema>
```

Tracking Response Data Element Definitions

The Tracking Response schema contains the following elements.

Element Name	Datatype/Format	Req	Definition	Valid Values
Response	dhl_Response	M	Response for the tracking request	
AWBInfo	dhl:AWBInfo	M	Information about the Shipment Info and Piece Info related to the Waybill Number or License Plate Number.	
Fault	dhl:Fault	O	Contains the information about failure License Plate Numbers.	
LanguageCode	dhl:LanguageCode	O	Code identifying language used by requestor	Default is en (English) if no value supplied

4.1 Response Element

The Response element contains the header and error information for the message. The response element contains following complex datatypes.

```
<xsd:complexType name="Response"> <xsd:annotation>
        <xsd:documentation>Generic response header</xsd:documentation>
    </xsd:annotation>
    <xsd:sequence>
        <xsd:element name="ServiceHeader" type="ServiceHeader"/>
    </xsd:sequence>
</xsd:complexType>
```

4.1.1 ServiceHeader Element

The Service Header element contains the header information about the request message.

This element must be declared only once in the Request element.

```
<xsd:complexType name="ServiceHeader"> <xsd:annotation>
        <xsd:documentation>Standard routing header</xsd:documentation> </xsd:annotation>
    <xsd:sequence>
        <xsd:element name="MessageTime" type="xsd:dateTime" minOccurs="0">
        <xsd:annotation>
                <xsd:documentation>Time this message is sent</xsd:documentation>
            </xsd:annotation>
        </xsd:element>

        <xsd:element name="MessageReference" type="MessageReference" minOccurs="0">
            <xsd:annotation>
                <xsd:documentation>A string, peferably number, to uniquely identify individual
                messages. Minimum length must be 28 and maximum length is
                32</xsd:documentation>
            </xsd:annotation>
        </xsd:element>
        <xsd:element name="SiteID" type="SiteID" minOccurs="0"/>
        <xsd:element name="Password" type="Password" minOccurs="0"/>
    </xsd:sequence>
    </xsd:complexType>
```

Element Name	Datatype/Format	Req	Definition	Valid Values
MessageTime	xsd:dateTime	O	Identifies the message time. It is a mandatory field in request message	
MessageReference	MessageReference	O	Message reference number.	
SiteID	SiteID	O	Identifies the sender of the request message. It is a mandatory field in the request message.	

4.1.1.1. MessageTime Element

The Message Time element contains the time at which the message was send by the requestor. The format of the should be YYYY-MM-DD(T)hh-mm-ss-Time Zone where —T is the separator between date and time.

e.g. 2002-12-02T13:23:18-07:00

```
<xsd:element name="MessageTime" type="xsd:dateTime" minOccurs="0">
<xsd:annotation>
        <xsd:documentation>Time this message is sent</xsd:documentation>
    </xsd:annotation>
</xsd:element>
```

4.1.1.2. MessageReference Element

The Message Reference element contains the unique reference to the message, so that trace of a particular message can be easily carried out. It must be of minimum length of 28 and maximum 32.

```
<xsd:simpleType name="MessageReference">
    <xsd:annotation>
        <xsd:documentation>Reference to the requested Message</xsd:documentation>
    </xsd:annotation>
    <xsd:restriction base="xsd:string">
        <xsd:minLength value="28"/>
        <xsd:maxLength value="32"/>
</xsd:restriction>
</xsd:simpleType>
```

4.1.1.3. SiteID Element

The site id element is used to identify the requestor of the message. Each partner/customer is provided with the site id and password. Each request message received is validated with this before proceeding forward.

```
<xsd:simpleType name="SiteID"> <xsd:annotation>
        <xsd:documentation>Site ID used for verifying the sender</xsd:documentation>
    </xsd:annotation>
    <xsd:restriction base="xsd:string">
        <xsd:minLength value="6"/>
        <xsd:maxLength value="20"/>
    </xsd:restriction>
</xsd:simpleType>
```

4.2 AWBInfo Element

The AWBInfo element is complex element which consists of four children elements:

- AWBNumber
- TrackedBy
- Status
- ShipmentInfo
- Pieces

Element Name	Datatype/Format	Req	Definition	Valid Values
AWBNumber	xsd:string	M		
TrackedBy	String	O	Reference to the track Piece ID number in request xml file. Note: This is only applicable to track by Piece ID only.	
Status	Status	M	Status of the response message	
Pieces	PieceInfo	O	Information about the pieces belongs to the respective shipment. Note: This is only applicable to track by	

			Piece ID only.	

The AWBInfo element is returned by GQSX while processing the tracking request. The element is a mandatory element.

```
<xsd:complexType name="AWBInfo">
    <xsd:sequence>
        <xsd:element name="AWBNumber" type="AWBNumber"/>
        <xsd:element name="TrackedBy" minOccurs="0" />
        <xsd:element name="Status" type="Status"/>
        <xsd:element name="ShipmentInfo" type="ShipmentInfo" minOccurs="0"/>
        <xsd:element name=" Pieces " type=" PieceInfo " minOccurs="0" maxOccurs="unbounded"/>
        </xsd:sequence>
</xsd:complexType>
```

4.2.1 AWBNumber Element

The Waybill Number note is returned by the GQS-X in response to the Tracking Request send to it. It is a mandatory field in the AWBInfo Segment.

```
<xsd:simpleType name="AWBNumber">
    <xsd:annotation>
        <xsd:documentation>Airway bill number</xsd:documentation>
    </xsd:annotation>
    <xsd:restriction base="xsd:string">
        <xsd:maxLength value="10"/>
    </xsd:restriction>
</xsd:simpleType>
```

4.2.2 TrackedBy Element

The TrackedBy element indicates the reference mapped to the Piece ID(s) in request xml file.
Note: It is applicable to track by Piece ID option only.

4.2.3 Status Element

The Status element is a complex element which consists of two child elements —ActionStatus and —Condition element. The Status element is returned by GQSX while processing the tracking request. The element is a mandatory element.

```
<xsd:complexType name="Status"> <xsd:annotation>
        <xsd:documentation>Status/Exception signal element</xsd:documentation>
    </xsd:annotation>
    <xsd:sequence>
        <xsd:element name="ActionStatus" type="xsd:string"/>
        <xsd:element name="Condition" type="Condition" minOccurs="0" maxOccurs="unbounded"/>
    </xsd:sequence>
</xsd:complexType>
```

Element Name	Datatype/Format	Req	Definition	Valid Values
ActionStatus	xsd:string	M	Response for the Tracking request	
Condition	dhl:Condition	O	Note for the Tracking Response	

4.2.2.1 ActionStatus Element

The Action status is returned by the GGA-X in error response to the Tracking Request send to it. It is a mandatory field in the Status Segment.

```
<xsd:element name="ActionNote" type="xsd:string"/>
```

4.2.2.2 Condition Element

The Condition element is an optional field. It is a complex element which consists of Condition Code and Condition Data.

```
<xsd:complexType
    name="Condition">
    <xsd:sequence>
        <xsd:element name="ConditionCode" type="xsd:string"/>
        <xsd:element name="ConditionData" type="xsd:string" minOccurs="0"/> </xsd:sequence>
</xsd:complexType>
```

Element Name	Datatype/Format	Req	Definition	Valid Values
ConditionCode	xsd:string	M	Code for the condition	Please refer to Tracking Service error codes
ConditionData	xsd:string	O	Data for the condition	

4.2.2.2.1 ConditionCode Element

The ConditionCode element contains the code for the condition. It is a mandatory field in the Condition segment.

```
<xsd:element name="ConditionCode" type="xsd:string"/>
```

4.2.2.2.2 ConditionData Element

The ConditionData element contains the data for the condition. It is an optional field in the Condition segment.

```
<xsd:element name="ConditionData" type="xsd:string" minOccurs="0"/>
```

4.2.3 ShipmentInfo Element

The shipmentInfo element is a complex element which consists of the following elements. It is an optional field in the AWBInfo segment.

```
<xsd:complexType name="ShipmentInfo">
    <xsd:sequence>
        <xsd:element name="OriginServiceArea" type="ServiceArea"/>
        <xsd:element name="DestinationServiceArea" type="ServiceArea"/>
        <xsd:element name="ShipperName" type="PersonName"/>
        <xsd:element name="ShipperAccountNumber" type="AccountNumber" minOccurs="0"/>
        <xsd:element name="ConsigneeName" type="PersonName"/>
        <xsd:element name="ShipmentDate" type="xsd:dateTime"/>
        <xsd:element name="Pieces" minOccurs="0"/>
        <xsd:element name="Weight" type="xsd:string" minOccurs="0"/>
```

```
<xsd:element name="WeightUnit" minOccurs="0">
    <xsd:simpleType>
        <xsd:restriction base="xsd:string">
            <xsd:enumeration value="L"/>
            <xsd:enumeration value="K"/>
            <xsd:enumeration value="G"/>
        </xsd:restriction>
    </xsd:simpleType>
</xsd:element>
<xsd:element name="EstDlvyDate" type="xsd:dateTime" minOccurs="0"/>
<xsd:element name="EstDlvyDateUTC" type="xsd:dateTime" minOccurs="0"/>
<xsd:element name="GlobalProductCode" type="GlobalProductCode" minOccurs="0"/>
<xsd:element name="ShipmentDesc" type="xsd:string" minOccurs="0"/>
<xsd:element name="DlvyNotificationFlag" minOccurs="0">
<xsd:simpleType>
        <xsd:restriction base="xsd:string">
            <xsd:length value="1"/>
            <xsd:enumeration value="Y"/>
            <xsd:enumeration value="N"/>
        </xsd:restriction>
</xsd:simpleType>
</xsd:element>
<xsd:element name="Shipper" type="Shipper" minOccurs="0"/>
<xsd:element name="Consignee" type="Consignee" minOccurs="0"/>
<xsd:choice>
        <xsd:element name="ShipperReference" type="Reference"/>
        <xsd:element name="ShipmentEvent" type="ShipmentEvent" maxOccurs="unbounded"/>
</xsd:choice> </xsd:sequence>
</xsd:complexType>
```

Element Name	Datatype/Format	Req	Definition	Valid Values
OriginServiceArea	ServiceArea	M	Service Area of origin	
DestinationServiceArea	ServiceArea	M	Service Area of destination	
ShipperName	PersonName	M	Name of the Shipper	
ShipperAccoutNumber	AccountNumber	M	Account number of the shipper	
ConsigneeName	Person Name	M	Name of the Consignee	
ShipmentDate	xsd:datetime	M	Date of the shipment	
Pieces	Pieces	O	Number of pieces	
Weight	xsd:string	O	Weight of each piece	
WeightUnit	xsd:string	O	Unit of measurement of the weight	L – Pounds K – Kilograms G - Grams
EstDlvyDate	xsd:datetime	O	Estimated Delivery Date	yyyy-MM-dd HH:mm:ss GMTOffset
EstDlvyDateUTC	xsd:datetime	O	Estimated Delivery Date in Universal Time Converted format	yyyy-MM-dd HH:mm:ss
GlobalProductCode	GlobalProductCode	O	Global or Network product code	
ShipmentDesc	xsd:string	O	Shipment description	

DlvyNotificationFlag	xsd:string	O	Delivery notification flag Note: If shipment is not delivered, it will default to 'Y', else it will be 'N'.	Y – Yes N – No
Shipper	Shipper	O	Shipper or origin city, division code, postal code and country/region code of the shipment	
Consignee	Consignee	O	Consignee or destination city, division code, postal code and country/region code of the shipment	
ShipperReference	Reference	M	Reference of the shipper	
ShipmentEvent	ShipmentEvent	M	Events checkpoint of the shipment	

4.2.3.1 OriginServiceArea Element

The Origin Service Area Element is a complex element which consists of two child elements _ServiceAreaCode and _Description. It is a mandatory element.

```
<xsd:complexType name="ServiceArea">
    <xsd:sequence>
        <xsd:element name="ServiceAreaCode" type="ServiceAreaCode" minOccurs="0">
            <xsd:annotation>
                <xsd:documentation>three letter service area code</xsd:documentation>
            </xsd:annotation>
        </xsd:element>
        <xsd:element name="Description" type="xsd:string" minOccurs="0"> <xsd:annotation>
                    <xsd:documentation>Detailed description for the Area code such as city,
                    state,country/region etc</xsd:documentation>
            </xsd:annotation>
        </xsd:element>
    </xsd:sequence>
</xsd:complexType>
```

Element Name	Datatype/Format	Req	Definition	Valid Values
ServiceAreaCode	ServiceAreaCode	O	3 letters Service Area Code of origin	
Description	xsd:string	O	Detailed description for the Area code such as city, state, country/region etc.	

4.2.3.1.1 ServiceAreaCode

The service area code element contains the three letter code for the origin service area. It is an optional field.

```
<xsd:simpleType name="ServiceAreaCode"> <xsd:annotation>
        <xsd:documentation>DHL service area code</xsd:documentation> </xsd:annotation>
            <xsd:restriction base="xsd:string">
            <xsd:length value="3"/>
    </xsd:restriction>
</xsd:simpleType>
```

4.2.3.1.2 Description

The description element contains the detailed description of origin service area code.

```
<xsd:element name="Description" type="xsd:string" minOccurs="0"> <xsd:annotation>
        <xsd:documentation>Detailed description for the Area code such as city, state, country etc.
        </xsd:documentation>
    </xsd:annotation>
</xsd:element>
```

4.2.3.2 DestinationServiceArea Element

The Destination Service Area Element is a complex element which consists of two child elements —ServiceAreaCode and —Description. It is a mandatory element.

Element Name	Datatype/Format	Req	Definition	Valid Values
ServiceAreaCode	ServiceAreaCode	O	3 letters Service Area Code of origin	
Description	xsd:string	O	Detailed description for the Area code such as city, state, country/region etc.	

```
<xsd:complexType name="ServiceArea">
<xsd:sequence>
        <xsd:element name="ServiceAreaCode" type="ServiceAreaCode" minOccurs="0">
            <xsd:annotation>
                <xsd:documentation>three letter service area code</xsd:documentation> </xsd:annotation>
        </xsd:element>
        <xsd:element name="Description" type="xsd:string" minOccurs="0">
            <xsd:annotation>
                    <xsd:documentation>Detailed description for the Area code such as city,
                                state, country/region etc.
                    </xsd:documentation>
            </xsd:annotation> </xsd:element>
    </xsd:sequence>
</xsd:complexType>
```

4.2.3.2.1 ServiceAreaCode

The service area code element contains the three letter code for the destination service area. It is an optional field.

```
<xsd:simpleType name="ServiceAreaCode">
    <xsd:annotation>
        <xsd:documentation>DHL service area code</xsd:documentation>
    </xsd:annotation>
    <xsd:restriction base="xsd:string">
        <xsd:length value="3"/>
    </xsd:restriction>
</xsd:simpleType>
```

4.2.3.2.2 Description

The description element contains the detailed description of destination service area code.

```
<xsd:element name="Description" type="xsd:string" minOccurs="0">
    <xsd:annotation>
        <xsd:documentation>Detailed description for the Area code such as city, state,
        country/region etc.</xsd:documentation>
    </xsd:annotation>
</xsd:element>
```

4.2.3.3 ShipperName element

The Shipper Name element contains the name of the person who is the shipper. It is a mandatory simple element.

```
<xsd:simpleType name="PersonName">
    <xsd:annotation>
        <xsd:documentation>Name</xsd:documentation>
    </xsd:annotation>
    <xsd:restriction base="xsd:string">
        <xsd:maxLength value="35"/>
    </xsd:restriction>
</xsd:simpleType>
```

4.2.3.4 ShipperAccountNumber Element

The Shipper Account number is an optional element which contains the shipper account number. The number must be a DHL account number.

```
<xsd:simpleType name="AccountNumber">
    <xsd:annotation>
        <xsd:documentation>DHL Account Number</xsd:documentation>
    </xsd:annotation>
    <xsd:restriction base="xsd:positiveInteger">
        <xsd:maxInclusive value="9999999999"/>
        <xsd:minInclusive value="100000000"/>
    </xsd:restriction>
</xsd:simpleType>
```

4.2.3.5 ConsigneeName Element

The consignee element is a mandatory element which contains the name of the person who is the consignee.

```
<xsd:simpleType name="PersonName">
    <xsd:annotation>
        <xsd:documentation>Name</xsd:documentation>
    </xsd:annotation>
    <xsd:restriction base="xsd:string">
        <xsd:maxLength value="35"/>
    </xsd:restriction>
</xsd:simpleType>
```

4.2.3.6 ShipmentDate Element

The shipment date element is a mandatory element which contains the date at which the shipement had been made.

```
<xsd:element name="ShipmentDate" type="xsd:dateTime"/>
```

4.2.3.7 Pieces Element

The pieces element is an optional field which contains the number of pieces in the shipment.

```
<xsd:element name="Pieces" minOccurs="0"/>
```

Note: This is not available for Unknown Tracking response.

4.2.3.8 Weight Element

The weight element is an optional field which contains the weight of each individual piece or of the shipment.

```
<xsd:element name="Weight" type="xsd:string" minOccurs="0"/>
```

Note: This is not available for Unknown Tracking response.

4.2.3.9 WeightUnit Element

The weight unit element is an optional field which contains the unit for measuring the weight of the pieces.

```
<xsd:element name="WeightUnit" minOccurs="0">
    <xsd:simpleType>
        <xsd:restriction base="xsd:string">
        <xsd:enumeration value="L"/>
        <xsd:enumeration value="K"/>
        <xsd:enumeration value="G"/>
        </xsd:restriction>
    </xsd:simpleType>
</xsd:element>
```

Note: This is not available for Unknown Tracking response.

4.2.3.10 EstDlvyDate Element

The EstDlvyDate element is an optional element which contains the estimated delivery date of the shipment.

```
<xsd:element name="EstDlvyDate" type="xsd:dateTime" minOccurs="0"/>
```

Note: This is not available for Unknown Tracking response.
XMLPI Tracking EDD Rules recap:
1. Filter EDD when shipment is in transit and EDD has passed current date
2. Filter EDD for shipment completion
    a. Shipment completion status will be BR, CS, DD, DS, OK, RT, SS, WC and TP checkpoints.
3. Filter EDD for shipment partial delivered (PD)
4. Filter EDD for shipment with no prior checkpoints of PU or PL or SA or CI or RW

4.2.3.11 EstDlvyDateUTC Element

The EstDlvyDateUTC element is an optional element which contains the estimated delivery date in UTC format of the shipment.

<xsd:element name=" EstDlvyDateUTC " type="xsd:dateTime" minOccurs="0"/>

Note: This is not available for Unknown Tracking response.
XMLPI Tracking EDD Rules recap:
1. Filter EDD when shipment is in transit and EDD has passed current date
2. Filter EDD for shipment completion
   a. Shipment completion status will be BR, CS, DD, DS, OK, RT, SS, WC and TP checkpoints.
3. Filter EDD for shipment partial delivered (PD)
4. Filter EDD for shipment with no prior checkpoints of PU or PL or SA or CI or RW

4.2.3.12 GlobalProductCode Element

The GlobalProductCode element is an optional element which contains the global or network product code of the shipment.

<xsd:element name="GlobalProductCode" type="GlobalProductCode" minOccurs="0"/>

Note: This is not available for Unknown Tracking response.

4.2.3.13 ShipmentDesc Element

The ShipmentDesc element is an optional element which contains the description of the shipment.

<xsd:element name="ShipmentDesc" type="xsd:string" minOccurs="0"/>

Note: This is not available for Unknown Tracking response.

4.2.3.14 DlvyNotificationFlag Element

The DlvyNotificationFlag element is an optional element which indicates whether delivery notification is required for the shipment. Default value is 'Y'. For shipment that already delivered (checkpoint of 'OK') , it will be 'N'.

```
<xsd:element name="DlvyNotificationFlag" minOccurs="0">
<xsd:simpleType>
        <xsd:restriction base="xsd:string">
                <xsd:length value="1"/>
                <xsd:enumeration value="Y"/>
                <xsd:enumeration value="N"/>
        </xsd:restriction>
</xsd:simpleType>
</xsd:element>
```

4.2.3.15 Shipper Element

The Shipper element is a complex element which contains the shipper or origin city, division code, postal code and country/region code of the shipment.

<xsd:element name="Shipper" type="Shipper" minOccurs="0"/>

Element Name	Datatype/Format	Req	Definition	Valid Values
City	City	O	Origin city	
DivisionCode	xsd:string	O	Origin division code	
PostalCode	PostalCode	O	Origin postal code	
CountryCode	CountryCode	O	Origin country/region code	

```
<xsd:complexType name="Shipper">
<xsd:sequence>
        <xsd:element name="City" type="City" />
        <xsd:element name="DivisionCode" minOccurs="0">
        <xsd:simpleType>
                <xsd:restriction base="xsd:string">
                <xsd:maxLength value="2" />
                </xsd:restriction>
        </xsd:simpleType>
        </xsd:element>
        <xsd:element name="PostalCode" type="PostalCode" />
        <xsd:element name="CountryCode" type="CountryCode" />
</xsd:sequence>
</xsd:complexType>
```

Note: This is not available for Unknown Tracking response.

4.2.3.15.1 City Element

The City element contains the shipper or origin city of the shipment.

```
<xsd:element name="City" type="City" />
```

4.2.3.15.2 DivisionCode Element

The DivisionCode element contains the shipper or origin division code of the shipment.

```
<xsd:element name="DivisionCode" minOccurs="0">
<xsd:simpleType>
        <xsd:restriction base="xsd:string">
        <xsd:maxLength value="2" />
        </xsd:restriction>
</xsd:simpleType>
</xsd:element>
```

4.2.3.15.3 PostalCode Element

The PostalCode element contains the shipper or origin postal code of the shipment.

```
<xsd:element name="PostalCode" type="PostalCode" />
```

4.2.3.15.4 CountryCode Element

The CountryCode element contains the shipper or origin country/region code of the shipment.

```
<xsd:element name="CountryCode" type="CountryCode" />
```

4.2.3.16 Consignee Element

The Consignee element is a complex element which contains the consignee or destination city, division code, postal code and country/region code of the shipment.

```
<xsd:element name="Consignee" type="Consignee" minOccurs="0"/>
```

Element Name	Datatype/Format	Req	Definition	Valid Values
City	City	O	Origin city	
DivisionCode	xsd:string	O	Origin division code	
PostalCode	PostalCode	O	Origin postal code	
CountryCode	CountryCode	O	Origin country/region code	

```
<xsd:complexType name="Consignee">
<xsd:sequence>
        <xsd:element name="City" type="City" />
        <xsd:element name="DivisionCode" minOccurs="0">
        <xsd:simpleType>
                <xsd:restriction base="xsd:string">
                <xsd:maxLength value="2" />
                </xsd:restriction>
        </xsd:simpleType>
        </xsd:element>
        <xsd:element name="PostalCode" type="PostalCode" />
        <xsd:element name="CountryCode" type="CountryCode" />
</xsd:sequence>
</xsd:complexType>
```

Note: This is not available for Unknown Tracking response.

4.2.3.16.1 City Element

The City element contains the consignee or destination city of the shipment.

```
<xsd:element name="City" type="City" />
```

4.2.3.16.2 DivisionCode Element

The DivisionCode element contains the consignee or destination division code of the shipment.

```
<xsd:element name="DivisionCode" minOccurs="0">
<xsd:simpleType>
        <xsd:restriction base="xsd:string">
        <xsd:maxLength value="2" />
```

```
                </xsd:restriction>
            </xsd:simpleType>
            </xsd:element>
```

4.2.3.16.3 PostalCode Element

The PostalCode element contains the consignee or destination postal code of the shipment.

```
<xsd:element name="PostalCode" type="PostalCode" />
```

4.2.3.16.4 CountryCode Element

The CountryCode element contains the consignee or destination country/region code of the shipment.

```
<xsd:element name="CountryCode" type="CountryCode" />

<xsd:element name="ShipperReference" type="Reference"/>
```

4.2.3.17 ShipmentEvent Element

The shipment event element is a complex element which contains the following five elements. The element contains the checkpoint information.

Note: This is not available for Unknown Tracking response.

```
<xsd:complexType name="ShipmentEvent">
    <xsd:annotation>
        <xsd:documentation>Describes the checkpoint information</xsd:documentation>
    </xsd:annotation>
    <xsd:sequence>
        <xsd:element name="Date" type="xsd:date"/>
        <xsd:element name="Time" type="xsd:time"/>
        <xsd:element name="ServiceEvent" type="ServiceEvent"/>
        <xsd:element name="Signatory" minOccurs="0">
            <xsd:annotation>
                <xsd:documentation>Signatory</xsd:documentation>
            </xsd:annotation>
             <xsd:simpleType>
                <xsd:restriction  base="xsd:string"/>
            </xsd:simpleType>
        </xsd:element>
        <xsd:element name="ServiceArea" type="ServiceArea"/>
    </xsd:sequence>
</xsd:complexType>
```

Element Name	Datatype/Format	Req	Definition	Valid Values
Date	Xsd:date	M	Date	
Time	Xsd:time	M	Time	
ServiceEvent	Service event	M	Event of the service	
Signatory	Signatory	O	Signatory	
Service area	Service area	M	Service area	

ShipperReference	ShipperReference	M	Reference of the shipper	

4.2.3.17.1 Date element

The Date element is a mandatory field in the Shipment Event segment.

```
<xsd:element name="Date" type="xsd:date"/>
```

4.2.3.17.2 Time Element

The time element is a mandatory field in the Shipment Event segment.

```
<xsd:element name="Time" type="xsd:time"/>
```

4.2.3.17.3 ServiceEvent Element

The serviceEvent element is a complex element which contains two child elements —EventCode and —Description. The elements contain the description of a service event.

```
<xsd:complexType name="ServiceEvent"> <xsd:annotation>
        <xsd:documentation>Complex type to describe a service event. Eg Pickup,
        Delivery</xsd:documentation> </xsd:annotation>
        <xsd:sequence>
        <xsd:element name="EventCode">
            <xsd:annotation>
                <xsd:documentation>Two letter Code denoting a specific service event</xsd:documentation>
            </xsd:annotation>
            <xsd:simpleType>
                <xsd:restriction base="xsd:string">
                    <xsd:length value="2"/>
                </xsd:restriction>
            </xsd:simpleType>
        </xsd:element>
        <xsd:element name="Description" type="xsd:string" minOccurs="0">
            <xsd:annotation>
                <xsd:documentation>Description of the service event code</xsd:documentation>
            </xsd:annotation>
        </xsd:element> </xsd:sequence>
</xsd:complexType>
```

Element Name	Datatype/Format	Req	Definition	Valid Values
EventCode	xsd:string	M	2 letters code defining a specific service	Please refer to the Reference Data (Tracking Event Codes).
Description	xsd:string	O	Description of the service event code.	

4.2.3.17.3.1 EventCode

The event code element contains the two letter code defining a specific service. It is a mandatory field.

```
<xsd:element name="EventCode"> <xsd:annotation>
        <xsd:documentation>Two letter Code denoting a specific service event</xsd:documentation>
    </xsd:annotation>
    <xsd:simpleType>
        <xsd:restriction base="xsd:string">
            <xsd:length value="2"/>
        </xsd:restriction>
     </xsd:simpleType>
</xsd:element>
```

4.2.3.17.3.2 Description

The description element contains the detailed description specific service.

```
<xsd:element name="Description" type="xsd:string" minOccurs="0">
    <xsd:annotation>
        <xsd:documentation>Description of the service event code</xsd:documentation>
    </xsd:annotation>
</xsd:element>
```

4.2.3.17.4 Signatory Element

The signatory element is an optional field which contains the signatory.

```
<xsd:element name="Signatory" minOccurs="0"> <xsd:annotation>
        <xsd:documentation>Signatory</xsd:documentation> </xsd:annotation>
    <xsd:simpleType>
        <xsd:restriction base="xsd:string"/>
    </xsd:simpleType>
</xsd:element>
```

4.2.3.17.5 ServiceArea Element

The service area element is a mandatory complex element which consists of two child elements — ServiceAreaCode and — Description .

Element Name	Datatype/Format	Req	Definition	Valid Values
ServiceAreaCode	ServiceAreaCode	O	3 letters Service Area Code of origin	
Description	xsd:string	O	Detailed description for the Area code such as city, state, country/region etc.	

```
<xsd:complexType name="ServiceArea">
    <xsd:sequence>
        <xsd:element name="ServiceAreaCode" type="ServiceAreaCode" minOccurs="0">
            <xsd:annotation>
                <xsd:documentation>three letter service area code</xsd:documentation>
            </xsd:annotation>
        </xsd:element>
        <xsd:element name="Description" type="xsd:string" minOccurs="0"> <xsd:annotation>
                        <xsd:documentation>Detailed description for the Area code such as city, state,
                        country/region etc.</xsd:documentation>
            </xsd:annotation>
        </xsd:element>
    </xsd:sequence> </xsd:complexType>
```

4.2.3.17.5.1 ServiceAreaCode

The service area code element contains the three letter code for the service area. It is an optional field.

```
<xsd:simpleType name="ServiceAreaCode">
<xsd:annotation>
        <xsd:documentation>DHL service area code</xsd:documentation>
</xsd:annotation>
        <xsd:restriction base="xsd:string">
         <xsd:length value="3"/>
</xsd:restriction>
</xsd:simpleType>
```

4.2.3.17.5.2 Description

The description element contains the detailed description of service area code.

```
<xsd:element name="Description" type="xsd:string" minOccurs="0">
    <xsd:annotation>
        <xsd:documentation>Detailed description for the Area code such as city, state,
        country/region etc.</xsd:documentation>
    </xsd:annotation>
</xsd:element>
```

4.2.3.18 ShipperReference Element

The shipper reference element is a complex element which contains two child elements —ReferenceID and —Reference Type .

Note: This is only available for Unknown Tracking response.

```
<xsd:complexType name="Reference">
    <xsd:sequence>
        <xsd:element name="ReferenceID" type="ReferenceID"/>
        <xsd:element name="ReferenceType" type="ReferenceType" minOccurs="0"/>
    </xsd:sequence>
</xsd:complexType>
```

Element Name	Datatype/Format	Req	Definition	Valid Values
ReferenceID	ServiceAreaCode	M	Shipper reference id	
ReferenceType	xsd:string	O	Shipment reference type	

4.2.3.18.1 ReferenceID

The ReferenceID element is a mandatory element which contains the shipper reference ID number.

```
<xsd:simpleType name="ReferenceID"> <xsd:annotation>
        <xsd:documentation>Shipper reference ID</xsd:documentation>
        </xsd:annotation>
    <xsd:restriction base="xsd:string">
        <xsd:maxLength value="35"/>
    </xsd:restriction>
</xsd:simpleType>
```

4.2.3.18.2 ReferenceType

The ReferenceType element is an optional element which contains the shipper reference type.

```
<xsd:simpleType name="ReferenceType"> <xsd:annotation>
        <xsd:documentation>Shipment reference type</xsd:documentation>
    </xsd:annotation>
    <xsd:restriction base="xsd:string">
        <xsd:length value="2"/>
    </xsd:restriction>
</xsd:simpleType>
```

4.2.4 Pieces Element

The Pieces element is a complex element which consists of the following elements. It is an optional field in the AWBInfo segment.

```
<xsd:complexType name="TrackingPieces">
        <xsd:annotation>
            <xsd:documentation>Piece Info</xsd:documentation>
    </xsd:annotation>
    <xsd:sequence>
                <xsd:element name="PieceInfo" type="PieceInfo" minOccurs="1" maxOccurs="unbounded" />
    </xsd:sequence>
</xsd:complexType>
```

Note: This is not available for Unknown Tracking response.

Element Name	Datatype/Format	Req	Definition	Valid Values
PieceInfo	PieceInfo	M	Information of the Pieces	

4.2.4.1 PieceInfo Element

The PieceInfo element is a complex element which consists of the following elements.

```
<xsd:complexType name="PieceInfo">
    <xsd:sequence>
                <xsd:element name="PieceDetails" type="PieceDetails" minOccurs="1"   maxOccurs="1"/>
                <xsd:element name="PieceEvent" type="PieceEvent" maxOccurs="unbounded"/>
    </xsd:sequence>
</xsd:complexType>
```

Element Name	Datatype/Format	Req	Definition	Valid Values
PieceDetails	PieceDetails	M	Details about each Piece	

PieceEvent	PieceEvent	O	Details about each PieceEvent	

4.2.4.1.1 PieceDetails Element

The PieceDetails element is a complex element which consists of the following elements:

```
<xsd:complexType name="PieceDetails">
        <xsd:sequence>
                <xsd:element name="AWBNumber" type="xsd:string" minOccurs="1"/>
                <xsd:element name="LicensePlate" type="TrackingPieceID" minOccurs="1"/>
                <xsd:element name="PieceNumber" type="xsd:string" minOccurs="0"/>

                <xsd:element name="ActualDepth" type="xsd:string" minOccurs="0"/>
                <xsd:element name="ActualWidth" type="xsd:string" minOccurs="0"/>
                <xsd:element name="ActualHeight" type="xsd:string" minOccurs="0"/>
                <xsd:element name="ActualWeight" type="xsd:string" minOccurs="0"/>

                <xsd:element name="Depth" type="xsd:string" minOccurs="0"/>
                <xsd:element name="Width" type="xsd:string" minOccurs="0"/>
                <xsd:element name="Height" type="xsd:string" minOccurs="0"/>
                <xsd:element name="Weight" type="xsd:string" minOccurs="0"/>

                <xsd:element name="PackageType" type="PackageType" minOccurs="0"/>
                <xsd:element name="DimWeight" type="xsd:string" minOccurs="0"/>
                <xsd:element name="WeightUnit" type="xsd:string" minOccurs="0"/>
                <xsd:element name="PieceContents" type="xsd:string" minOccurs="0"/>

        </xsd:sequence>
</xsd:complexType>
```

Element Name	Datatype/Format	Req	Definition	Valid Values
AWBNumber	xsd:string	M	The Waybill number	
LicensePlate	TrackingPieceID	M		Max: 35
PieceNumber	xsd:string	O	The piece number	
ActualDepth	xsd:string	O	The actual piece depth	
ActualWidth	xsd:string	O	The actual piece width	
ActualHeight	xsd:string	O	The actual piece height	
ActualWeight	xsd:string	O	The actual piece weight	
Depth	xsd:string	O		
Width	xsd:string	O		
Height	xsd:string	O		
Weight	xsd:string	O		
PackageType	PackageType	O	The type of Package	
DimWeight	xsd:string	O	Dimensional Weight	
WeightUnit	xsd:string	O		
PieceContents	xsd:string	O		

4.2.4.1.1.1 AWBNumber Element

The Waybill Number note is returned by the GQS-X in response to the Tracking Request send to it. It is a mandatory field in the AWBInfo Segment.

```
<xsd:simpleType name="AWBNumber">
    <xsd:annotation>
        <xsd:documentation>Airway bill number</xsd:documentation>
    </xsd:annotation>
    <xsd:restriction base="xsd:string">
        <xsd:maxLength value="10"/>
    </xsd:restriction>
</xsd:simpleType>
```

4.2.4.1.1.2 LicensePlate Element

The LicensePlate element contains the License Plate number with the maximum length 35.

```
<xsd:simpleType name="TrackingPieceID">
    <xsd:annotation>
    <xsd:documentation>Piece ID</xsd:documentation>
    </xsd:annotation>
    <xsd:restriction base="xsd:string">
    <xsd:minLength value="1"/>
    <xsd:maxLength value="35"/>
    </xsd:restriction>
</xsd:simpleType>
```

4.2.4.1.1.3 PieceNumber Element

The PieceNumber element is the piece number.

```
<xsd:simpleType name="PieceNumber">
      <xsd:annotation>
         <xsd:documentation>Piece Number</xsd:documentation>
      </xsd:annotation>
      <xsd:restriction base="xsd:positiveInteger">
       </xsd:restriction>
   </xsd:simpleType>
```

4.2.4.1.1.4 ActualDepth Element

The Actual Depth of the piece.

```
<xsd:element name="ActualDepth" type="xsd:string" minOccurs="0"/>
```

4.2.4.1.1.5 ActualWidth Element

The Actual Width of the piece.

```
<xsd:element name="ActualWidth" type="xsd:string" minOccurs="0"/>
```

4.2.4.1.1.6 ActualHeight Element

The Actual Height of the piece.

```
<xsd:element name="ActualHeight" type="xsd:string" minOccurs="0"/>
```

4.2.4.1.1.7 ActualWeight Element

The Actual Weight of the piece.

```
<xsd:element name="ActualWeight" type="xsd:string" minOccurs="0"/>
```

4.2.4.1.1.7 Depth Element

The depth element represents the depth of the piece or of the shipment. It is required when the width and the height is specified. It is an optional field.

```
<xsd:element name="Depth" type="xsd:positiveInteger" minOccurs="0">
      <xsd:annotation>
                  <xsd:documentation>required if width and height are specified</xsd:documentation>
      </xsd:annotation>
</xsd:element>
```

4.2.4.1.1.5 Width Element

The width element represents the width of the piece or of the shipment. It is required if the height or depth is specified. It is an optional field.

```
<xsd:element name="Width" type="xsd:positiveInteger" minOccurs="0">
      <xsd:annotation>
                  <xsd:documentation>required if height and depth are specified</xsd:documentation>
      </xsd:annotation>
</xsd:element>
```

4.2.4.1.1.6 Height Element

The height element represents the height of the piece or of the shipment. It is required if width and depth is specified. It is an optional field.

```
<xsd:element name="Height" type="xsd:positiveInteger" minOccurs="0">
    <xsd:annotation>
        <xsd:documentation>required if width and depth are specified</xsd:documentation>
    </xsd:annotation>
</xsd:element>
```

4.2.4.1.1.8 Weight Element

The Weight Element represents the weight of the individual piece or of the shipment. It is a mandatory field in the Shipment Details.

```
<xsd:simpleType name="Weight">
    <xsd:annotation>
        <xsd:documentation>Weight of piece or shipment</xsd:documentation>
    </xsd:annotation>
    <xsd:restriction base="xsd:decimal">
        <xsd:fractionDigits value="1"/>
        <xsd:maxInclusive value="999999.9"/>
        <xsd:totalDigits value="7"/>
    </xsd:restriction>
</xsd:simpleType>
```

4.2.4.1.1.9 PackageType Element

The PackageType element is an optional element which contains the type of package.

```
<xsd:simpleType name="PackageType">
    <xsd:annotation>
        <xsd:documentation>Package Type (EE: DHL Express Envelope, OD:Other DHL
    Packaging, CP:Customer-provided.Ground shipments must choose CP)</xsd:documentation>
    </xsd:annotation>
    <xsd:restriction base="xsd:string">
        <xsd:length value="2"/>
        <xsd:enumeration value="EE"/>
        <xsd:enumeration value="OD"/>
        <xsd:enumeration value="CP"/>
    </xsd:restriction>
</xsd:simpleType>
```

4.2.4.1.1.4 DimWeight Element

The Weight Element represents the weight of the individual piece or of the shipment. It is a mandatory field in the Shipment Details.

```
<xsd:simpleType name="Weight">
    <xsd:annotation>
        <xsd:documentation>Dim Weight of piece or shipment</xsd:documentation>
    </xsd:annotation>
    <xsd:restriction base="xsd:decimal">
        <xsd:fractionDigits value="1"/>
        <xsd:maxInclusive value="999999.9"/>
        <xsd:totalDigits value="7"/>
    </xsd:restriction>
</xsd:simpleType>
```

4.2.4.1.1.8 PieceContents Element

The PieceContents element represents the contents or description of the piece or of the shipment. It is an optional field.

```
<xsd:element name="PieceContents" type="xsd:string" minOccurs="0" />
```

4.2.4.1.2 PieceEvent Element

The PieceEvent element is a complex element which contains the following five elements. The element contains the checkpoint information.

```
<xsd:complexType name=" PieceEvent">
    <xsd:annotation>
        <xsd:documentation>Describes the checkpoint information</xsd:documentation>
    </xsd:annotation>
    <xsd:sequence>
        <xsd:element name="Date" type="xsd:date"/>
        <xsd:element name="Time" type="xsd:time"/>
        <xsd:element name="ServiceEvent" type="ServiceEvent"/>
        <xsd:element name="Signatory" minOccurs="0">
            <xsd:annotation>
                <xsd:documentation>Signatory</xsd:documentation>
            </xsd:annotation>
             <xsd:simpleType>
                <xsd:restriction  base="xsd:string"/>
            </xsd:simpleType>
        </xsd:element>
        <xsd:element name="ServiceArea" type="ServiceArea"/>
    </xsd:sequence>
</xsd:complexType>
```

Element Name	Datatype/Format	Req	Definition	Valid Values
Date	Xsd:date	M	Date	
Time	Xsd:time	M	Time	
ServiceEvent	Service event	M	Event of the service	
Signatory	Signatory	O	Signatory	
Service area	Service area	M	Service area	

4.2.4.1.2.1 Date element

The Date element is a mandatory field in the Shipment Event segment.

```
<xsd:element name="Date" type="xsd:date"/>
```

4.2.4.1.2.2 Time Element

The time element is a mandatory field in the Shipment Event segment.

```
<xsd:element name="Time" type="xsd:time"/>
```

4.2.4.1.2.3 ServiceEvent Element

The ServiceEvent element is a complex element which contains two child elements EventCode & Description. The elements contain the description of a service event.

```
<xsd:complexType name="ServiceEvent">
```

```
<xsd:annotation>
    <xsd:documentation>Complex type to describe a service event. Eg Pickup,
    Delivery</xsd:documentation>
</xsd:annotation>
<xsd:sequence>
    <xsd:element name="EventCode">
        <xsd:annotation>
            <xsd:documentation>Two letter Code denoting a specific service
            event</xsd:documentation>
        </xsd:annotation>
        <xsd:simpleType>
            <xsd:restriction base="xsd:string">
                <xsd:length value="2"/>
            </xsd:restriction>
        </xsd:simpleType>
    </xsd:element>
    <xsd:element name="Description" type="xsd:string" minOccurs="0">
        <xsd:annotation>
            <xsd:documentation>Description of the
            service event code</xsd:documentation>
        </xsd:annotation>
    </xsd:element>
</xsd:sequence>
</xsd:complexType>
```

Element Name	Datatype/Format	Req	Definition	Valid Values
EventCode	xsd:string	M	2 letters code defining a specific service	Please refer to the Reference Data (Tracking Event Codes).
Description	xsd:string	O	Description of the service event code.	

4.2.4.1.2.3.1 EventCode

The EventCode element contains the two letter code defining a specific service. It is a mandatory field.

```
<xsd:element name="EventCode">
    <xsd:annotation>
        <xsd:documentation>Two letter Code denoting a specific service event</xsd:documentation>
    </xsd:annotation>
    <xsd:simpleType>
        <xsd:restriction base="xsd:string">
            <xsd:length value="2"/>
        </xsd:restriction>
    </xsd:simpleType>
</xsd:element>
```

4.2.4.1.2.3.2 Description

The Description element contains the detailed description specific service.

```
<xsd:element name="Description" type="xsd:string" minOccurs="0">
    <xsd:annotation>
        <xsd:documentation>Description of the service event code</xsd:documentation>
    </xsd:annotation>
</xsd:element>
```

4.2.4.1.2.4 Signatory Element

The Signatory element is an optional field which contains the signatory.

```
<xsd:element name="Signatory" minOccurs="0">
    <xsd:annotation>
        <xsd:documentation>Signatory</xsd:documentation>
    </xsd:annotation>
    <xsd:simpleType>
        <xsd:restriction base="xsd:string"/>
    </xsd:simpleType>
</xsd:element>
```

4.2.4.1.2.5 ServiceArea Element

The Service Area element is a mandatory complex element which consists of two child elements —ServiceAreaCode and —Description.

```
<xsd:complexType name="ServiceArea">
    <xsd:sequence>
        <xsd:element name="ServiceAreaCode" type="ServiceAreaCode"
            minOccurs="0"> <xsd:annotation>
                <xsd:documentation>three letter service area
            code</xsd:documentation> </xsd:annotation>
        </xsd:element>
        <xsd:element name="Description" type="xsd:string" minOccurs="0">
            <xsd:annotation>
                    <xsd:documentation>Detailed description for the Area code such as city,
                    state,country/region etc</xsd:documentation>
            </xsd:annotation>
        </xsd:element>
    </xsd:sequence> </xsd:complexType>
```

Element Name	Datatype/Format	Req	Definition	Valid Values
ServiceAreaCode	ServiceAreaCode	O	3 letter Service Area Code of origin	
Description	xsd:string	O	Detailed description for the Area code such as city, state, country/region etc.	

4.2.4.1.2.5.1 ServiceAreaCode

The ServiceAreaCode element contains the three letter code for the service area. It is an optional field.

```
<xsd:simpleType name="ServiceAreaCode">
<xsd:annotation>
        <xsd:documentation>DHL service area code</xsd:documentation>
</xsd:annotation>
<xsd:restriction base="xsd:string">
        <xsd:length value="3"/>
</xsd:restriction>
</xsd:simpleType>
```

4.2.4.1.2.5.2 Description

The description element contains the detailed description of service area code.

```
<xsd:element name="Description" type="xsd:string" minOccurs="0">
    <xsd:annotation>
        <xsd:documentation>Detailed description for the Area code such as city,
        state,country/region etc</xsd:documentation>
    </xsd:annotation>
</xsd:element>
```

4.3 Fault Element

The Fault element is a complex type element consisting of the Piece Fault element. The Piece Fault element contains the piece Id for which the response is not obtained along with the condition code and condition data.

```
<xsd:complexType name="Fault">
        <xsd:annotation>
                <xsd:documentation>Piece Fault</xsd:documentation>
        </xsd:annotation>
        <xsd:sequence>
                <xsd:element name="PieceFault" type="PieceFault" minOccurs="1" maxOccurs="unbounded" />
        </xsd:sequence>
</xsd:complexType>
<xsd:complexType name="PieceFault">
        <xsd:sequence>
                <xsd:element name="PieceID" type="TrackingPieceID" minOccurs="1">
                        <xsd:annotation>
                <xsd:documentation>The License Plate identifier.</xsd:documentation>
                        </xsd:annotation>
                </xsd:element>
                <xsd:element name="ConditionCode" type="xsd:string" minOccurs="1">
                        <xsd:annotation>
                                <xsd:documentation>Condition Code</xsd:documentation>
                        </xsd:annotation>
                </xsd:element>
                <xsd:element name="ConditionData" type="xsd:string" minOccurs="1">
                        <xsd:annotation>
                                <xsd:documentation>Condition Data</xsd:documentation>
                        </xsd:annotation>
                </xsd:element>
        </xsd:sequence>
</xsd:complexType>
```

Element Name	Datatype/format	Req.	Definition	Valid Values
PieceID	dhl:TrackingPieceID	M	Contains the Piece ID.	
Condition Code	xsd:string	M	Error Code	
Condition Data	xsd:string	M	Error Data	

4.4 LanguageCode Element

LanguageCode element contains the DHL language code used by the requestor. This element should be declared once in the Tracking request message. The default is **en** (English).

```
<xsd:simpleType name="LanguageCode">
<xsd:annotation>
    <xsd:documentation>DHL Language Code</xsd:documentation>
</xsd:annotation>
<xsd:restriction base="xsd:string"/>
</xsd:simpleType>
```