



PROGRAMME & DEVELOPMENT SERVICES

XML Services

Ver. 6.0

Unit Test Plan for Shipment Validation Service
(Global schema)



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1 TEST ENVIRONMENT

1.1 XML Service Gateway Installation

1.1.1 Hardware

- Linux v6.x 64 bits
- Terminal Emulator H/W e.g. IBM PC

1.1.2 Software

- WebLogic 12c
- JDK 1.7
- xerces1.4

1.1.3 Special Test Needs

- Access to Global Ecom Gateway backend for AM region
- X Windows server should be set up.

1.2 DHLClient Installation

1.2.1 Hardware

- Windows XP Desktop or above

1.2.2 Software

- JDK 1.5
- xerces1.4

1.2.3 Special Test Needs

- Client side environment needs to be set for java execution.

2 UNIT TEST REPORT

| | |
|-------------------------------------|---|
| Author | : Mary Ang |
| Program Name | : Shipment Validation services |
| Functionality Tested | : Shipment Validation services |
| Test Execution Procedure | : Once the application server is up and running, open a command prompt and run the 'runDHLClient.cmd' file. The runDHLClient software should follow correct URL and file names and directory path to read request XML messages and stored response The following URL https://xmlpitest-ea.dhl.com/XMLShippingServlet is an example used for testing purpose. |
| Test Results Checking Method | : The results are stored in XML format in the directory specified in the runDHLClient.cmd file. |



3 TEST CASES

3.1 Shipment Validation Service (Valid XML message with correct data)

| S.No. | Condition to be Tested | Expected Result |
|-------|---|---|
| 1. | Run the runDHLClient.cmd file to send a valid AP shipment validation request for international shipment with request of 2 pieces with piece segment defined and label image output. ShipmentValidateRequest_Global_AP_RegularShpmt.xml | Shipment Validate response is received and stored in the specified directory. ShipmentValidateResponse_Global_AP_RegularShpmt.xml |
| 2. | Run the runDHLClient.cmd file to send a valid EU shipment validation request for international shipment with request of 2 pieces with piece segment defined and label image output. ShipmentValidateRequest_Global_EU_RegularShpmt.xml | Shipment Validate response is received and stored in the specified directory. ShipmentValidateResponse_Global_EU_RegularShpmt.xml |
| 3. | Run the runDHLClient.cmd file to send a valid AM shipment validation request for international shipment with request of 2 pieces with piece segment defined and label image output. ShipmentValidateRequest_Global_AM_RegularShpmt.xml | Shipment Validate response is received and stored in the specified directory. ShipmentValidateResponse_Global_AM_RegularShpmt.xml |
| 4. | Run the runDHLClient.cmd file to send a valid AP shipment validation request for international shipment with EProcShip of 'Y' ShipmentValidateRequest_Global_AP_EProcY.xml | Shipment Validate response is received and stored in the specified directory. ShipmentValidateResponse_Global_AP_EProcY.xml |
| 5. | Run the runDHLClient.cmd file to send a valid AP shipment validation request with Paperless shipment request ShipmentValidationRequest_Global_AP_PLTShipment.xml | Shipment Validate response is received and stored in the specified directory. ShipmentValidationResponse_Global_AP_PLTShipment.xml |



| S.No. | Condition to be Tested | Expected Result |
|-------|--|--|
| 6. | Run the runDHLClient.cmd file to send a valid EU shipment validation request with Paperless shipment request ShipmentValidationRequest_Global_EU_PLT_Shipment.xml | Shipment Validate response is received and stored in the specified directory. ShipmentValidationResponse_Global_EU_PLT_Shipment.xml |
| 7. | Run the runDHLClient.cmd file to send a valid AM shipment validation request with Paperless shipment request ShipmentValidationRequest_Global_AM_PLT_Shipment.xml | Shipment Validate response is received and stored in the specified directory. ShipmentValidationResponse_Global_AM_PLT_Shipment.xml |
| 8. | Run the runDHLClient.cmd file to send a valid AM shipment validation request with regular shipment request with selected label template and customer's logo image. ShipmentValidationRequest_Global_AM_Shipment_LabelTemplateCustLogo.xml | Shipment Validate response is received and stored in the specified directory. ShipmentResponse_ShipmentValidateRequest_Global_AM_Shipment_LabelTemplateCustLogo.xml |
| 9 | Run the runDHLClient.cmd file to send a valid AM shipment validation request with Advance Shipment request with selected label template and customer's logo image. ShipmentValidateRequest_Global_AM_AdvanceShipment.xml | Shipment Validate response is received and stored in the specified directory. ShipmentValidateResponse_Global_AM_AdvanceShipment.xml |
| 10 | Run the runDHLClient.cmd file to send a valid AP shipment validation request with Advance Shipment request with selected label template and customer's logo image. ShipmentValidateRequest_Global_AP_AdvanceShipment.xml | Shipment Validate response is received and stored in the specified directory. ShipmentValidateResponse_Global_AP_AdvanceShipment.xml |
| 11 | Run the runDHLClient.cmd file to send a valid EU shipment validation request with Advance Shipment request with selected label template and customer's logo image. ShipmentValidateRequest_Global_EU_AdvanceShipment.xml | Shipment Validate response is received and stored in the specified directory. ShipmentValidateResponse_Global_EU_AdvanceShipment.xml |
| 12 | Run the runDHLClient.cmd file to send a valid AM shipment validation request with Paperless shipment request and require ODD Link option ShipmentValidateRequest_Global_AM_PLT_Shipment_WithODDLinkReq.xml | Shipment Validate response is received and stored in the specified directory. ShipmentResponse_ShipmentValidateRequest_Global_AM_WithODDLinkReq.xml |



| S.No. | Condition to be Tested | Expected Result |
|-------|---|---|
| 13 | Run the runDHLClient.cmd file to send a valid AP shipment validation request with Paperless shipment request and require ODD Link option. ShipmentValidateRequest_Global_AP_PLTShipment_WithODDLinkReq.xml | Shipment Validate response is received and stored in the specified directory. ShipmentResponse_ShipmentValidateRequest_Global_AP_WithODDLinkReq.xml |
| 14 | Run the runDHLClient.cmd file to send a valid EU shipment validation request with Paperless shipment request and require ODD Link option. ShipmentValidateRequest_Global_EU_PLTShipment_WithODDLinkReq.xml | Shipment Validate response is received and stored in the specified directory. ShipmentResponse_ShipmentValidateRequest_Global_EU_WithODDLinkReq.xml |
| 15 | Run the runDHLClient.cmd file to send a valid EU shipment validation request with Customer Barcode Text and using Customer Barcode label template. ShipmentValidateRequest_Global_EU_CustomerBarcodeText.xml | Shipment Validate response is received and stored in the specified directory. ShipmentResponse_ShipmentValidateRequest_Global_EU_CustomerBarcodeText.xml |
| 16 | Run the runDHLClient.cmd file to send a valid EU shipment validation request with Dangerous Goods items. ShipmentValidateRequest_Global_EU_DangerousGoods.xml | Shipment Validate response is received and stored in the specified directory. ShipmentResponse_ShipmentValidateRequest_Global_EU_DangerousGoods.xml |



3.2 Shipment Validation Service (Malformed XML Message)

| Sl. No: | Condition to be Tested | Expected Result |
|---------|--|---|
| 1. | Run the runDHLClient.cmd file to send a mal formed AP Shipment validation request for International (Dutiable). E.g. remove the end tag for 'Piece' ShipmentValidateRequest_Global_AP_MalFormed.xml | Error response is received and stored in the specified directory. The XML has error condition code and condition data. In this case the error message will be like ' <i>Error in parsing request XML:The element type "Piece" must be terminated by the matching end-tag "&lt;/Piece&gt;&quot;;</i> ' ErrorResponse_Global_AP_MalFormed.xml |
| 2. | Run the runDHLClient.cmd file to send a mal formed EU Shipment validation request. E.g. remove the end tag of the root element of request message ShipmentValidateRequest_Global_EU_MalFormed.xml | Error response is received and stored in the specified directory. The XML has error condition code and condition data. In this case the error message will be like. ' <i>Error in parsing request XML:The element type "req:ShipmentRequest" must be terminated by the matching end-tag "&lt;/req:ShipmentRequest&gt;&quot;;</i> ' ErrorResponse_Global_EU_MalFormed.xml |



3.3 Shipment Validation Service (*Invalid XML Message*)

| Sl. No. | Condition to be Tested | Expected Results |
|---------|---|--|
| 1 | <p>Run the runDHLClient.cmd file to send an invalid AM Shipment validation request condition for International (Dutiable). E.g Acceptable values of 'DutyPaymentType' are 'S', 'R', 'T'. Give 'O'.</p> <p>ShipmentValidateRequest_Global_AM_Invalid.xml</p> | <p>Error response is received and stored in the specified directory. The XML has error condition code and data. In this case the error message will be like 'Error in parsing request XML:Error: Datatype error: In &apos;DutyPaymentType&apos; : Value &apos;O&apos; must be one of [S, R, T]. at line 20, column 40</p> <p>ErrorResponse_Global_AM_Invalid.xml</p> |
| 2 | <p>Run the runDHLClient.cmd file to send an invalid EU Shipment validation request condition for International (Dutiable). For weight element accepts values only in decimal. Give a fractional value like 12/12. and send the request</p> <p>ShipmentValidateRequest_Global_EU_Invalid.xml</p> | <p>Error response is received and stored in the specified directory. The XML has error condition code and E.g. data. In this case the error message will be like 'Error in parsing request XML:Error: Datatype error: In element &apos;Weight&apos; : &apos;12/12&apos; is not a decimal at line 76, column 26'</p> <p>ErrorResponse_Global_EU_Invalid.xml</p> |



3.4 Shipment Validation Service ([Incorrect Data XML Message](#))

| Sl. No: | Condition to be Tested | Expected Result |
|---------|--|---|
| 1. | Run the runDHLClient.cmd file to send a AM Shipment validation request for International (Dutiable) with invalid data. Since the shipment is dutiable, remove the dutiable segment from the request message ShipmentValidateRequest_Global_AM_IncorrectData.xml | Shipment validate error response is received and saved in the specified directory. The XML has error condition code and condition data. In this case the condition data reads, as <i>'Dutiable segment Declared Amount Conditional Required Error'</i> ErrorResponse_INT_DUT_AM_IncorrectData.xml |
| 2. | Run the runDHLClient.cmd file to send a AP Shipment validation request for International (Non - Dutiable). E.g. Put a postal code for Receiver country, which is invalid as shipper's postal code. ShipmentValidateRequest_Global_AP_IncorrectData.xml | Shipment validate error response is received and saved in the specified directory. The XML has error condition code and condition data. In this case the condition code reads, as <i>'Cannot determine destination service. Check recipient Postal code, city and country or complete an airwaybill manually. For assistance call DHL customer services.'</i> ErrorResponse_Global_AP_IncorrectData.xml |
| 3. | Run the runDHLClient.cmd file to send a AM Shipment validation request for Domestic shipment of Brazil without Tax ID fields for both Shipper and Receiver. ShipmentValidateRequest_Global_AM_BRBR.xml | Shipment validate error response is received and saved in the Specified directory. The XML has error condition code and Condition data. In this case the condition code reads, as <i>'Shipper Federal Tax ID Mandatory Required', 'Shipper State Tax ID Mandatory Required', 'Consignee Federal Tax ID Conditional Required' and 'Consignee State Tax ID Conditional Required'.</i> ShipmentValidateErrorResponse_Global_AM_BRBR.xml |



4 Notes

4.1 Shipment Validation mandatory fields and field patterns

Please refer to section 'Shipment Validation Request' of [XMLServices6.0_ShipmentValidationService.pdf](#) for details of all mandatory fields and acceptable values for all Shipment Validation Request messages.

4.2 Warnings / Error messages returned in case of incorrect data

Please refer to section 'Shipment Validation' – region specific of [Reference_Data.xls](#) document - <Error Messages> tab sheet, for details of all warnings and error messages received in case of incorrect data.

5 DEFINITIONS

5.1 Well Formed XML

A "Well Formed" XML document is a document that conforms to the XML syntax rules.

5.2 Malformed XML

XML document, which does not conform to XML syntax rules, is called as "Malformed" XML.

5.3 Valid XML

A "Valid" XML document is a "Well Formed" XML document, which also conforms to the rules of a Document Type Definition (DTD) or XML schema.

5.4 Invalid XML

An "Invalid" XML document is a "Well Formed" XML document, which does not conform to the rules of a Document Type Definition (DTD) or XML schema specified for the same.

5.5 Incorrect Data XML

An "Incorrect Data XML" is a valid XML document, which has data that does not conform to business rules of DHL backend services.

E.g. The acceptable shipment date range is from current date or date up to next ten days. If the shipment date does not fall into this date range, then an error message is received.

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