

# e-Manifest: Trucks (Release 4) Electronic Data Interchange (EDI) Information Session

June 28 - 29, 2004

## **Presenters:**

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William Miller, eCP  
Luke McCormack, CBP  
Bud Blankenship, CBP  
Pat Young, eCP  
Kiran Gowda, eCP  
Don Kozacki, CBP  
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## **Panelists:**

Thomas Fitzpatrick, CBP  
Karen Tilghman, eCP  
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James Wolford, CBP  
Michelle Miller, eCP  
Bill Nolle, CBP  
Elizabeth Phillips, eCP



U.S. Customs and  
Border Protection

# e-Manifest: Trucks (Release 4)

## EDI Information Session

Electronic Meeting Process

Michael Boshes, eCP



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# Explanation of the Electronic Meeting Process



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# e-Manifest: Trucks (Release 4)

## EDI Information Session

Introductions and Session Overview  
Steven Graham, eCP



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# Agenda

- Introductions
- Explanation of the electronic meeting process
- Overview of ACE e-Manifest: Trucks (Release 4)
  - Portal and EDI methods of Submission
  - Release Types
- Portal Presentation
- Carrier Accounts - MEDPID
- Communications for EDI (MQ Series)
- Release 4 – e-Manifest: Trucks (Release 4)– ANSI X12
  - Process flows
  - Looping constructs and changes
  - ANSI X.12 message details
- Release 4 – e-Manifest: Trucks (Release 4) – EDIFACT
- Test and Validation
- Final Questions and Answers



# EDI Overview

## Connecting to ACE using ANSI X.12:

- Messages transmitted to U.S. Customs and Border Protection (CBP)
  - 309 Complete Manifest or Preliminary Shipments
  - 358 Truck Manifest (Trip/Consist)
  - 353 Event Advisory Message (Manifest Commit)
  
- Messages transmitted from CBP
  - 997 Functional Acknowledgement
  - 355 CBP Acceptance/Rejection
  - 350 CBP Status Information



# EDI Overview

## Connecting to ACE/FAST using EDIFACT:

- Messages transmitted to CBP
  - CUSCAR            Customs Cargo Report
  - CUSREP           Customs Conveyance Report
  - PAXLST           Passenger List
  - CUSDEC           Customs Declaration
  
- Messages transmitted from CBP
  - CUSRES           Customs Response
  - REQDOC           Request for Documents
  - CONTRL           Functional Acknowledgment



# Web Links

- **ACE Release 4: Truck Manifest Power Point Presentation, Sept. TSN**  
[www.cbp.gov](http://www.cbp.gov) Trade Support Network > September 2003 TSN Meeting Highlights > ACE Release 4: Automated Truck Manifest
- **ACE EDI Message Drafts**  
[www.cbp.gov](http://www.cbp.gov) Trade Support Network > Related Links: ACE EDI Message Drafts
  - MEDPID EDI Message for Crew, Conveyance and Equipment
  - Outline of EDI Messages for ACE Releases 3 & 4
  - DRAFT CATAIR Changes for ACE Release 3 Periodic Monthly Statement
  - New/Modified EDI Messages for ACE Release 4 - Truck Manifest
- **Multi-Modal Manifest (MMM) Data Matrix**  
[www.cbp.gov](http://www.cbp.gov) Trade Support Network > Committee Requirements > Multi Modal Requirements > Manifest Data Elements > Manifest Data Elements Spreadsheet
- **Standard and Preferred Data Element Details for Truck Manifest**  
[www.cbp.gov](http://www.cbp.gov) Trade Support Network > Committee Requirements > Multi-Modal Requirements > Manifest Data Elements > Manifest Submission by Carriers





# e-Manifest: Trucks (Release 4)

## EDI Information Session

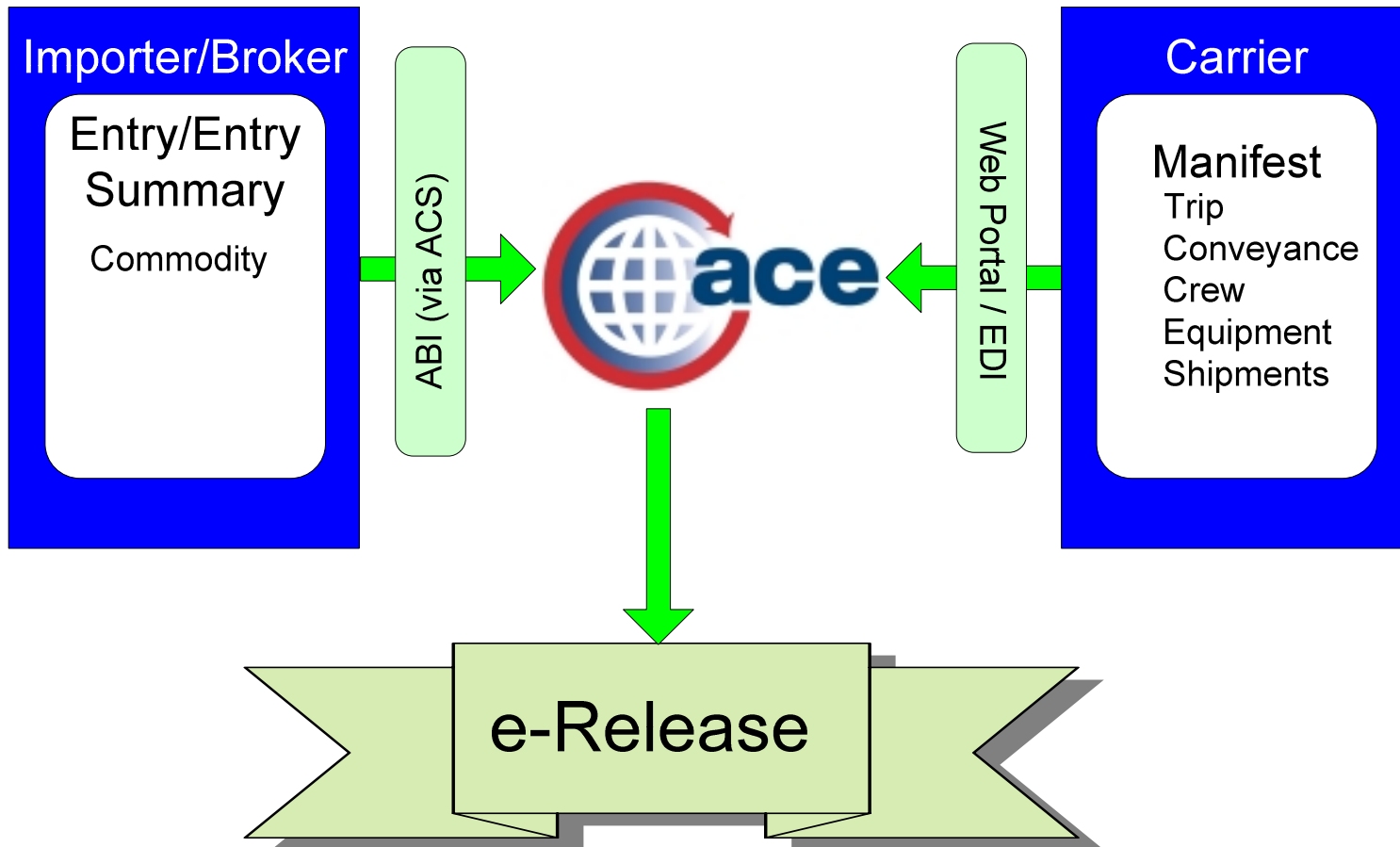
Overview

Adam Houston, eCP



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# e-Manifest: Trucks Process Overview



# e-Manifest: Trucks Functionality At-A-Glance

## Electronic truck manifest

- Multiple filing options
  - ACE Secure Data Portal
  - EDI
- Standardized data elements (MMM)
- In-Bond









## Consolidated Electronic Release (e-Release)

- Simplified and expedited cargo release
- Automated reconciliation of manifest and entry
- Improved intra-port communications - workflow
- Supports current shipment release programs

## On-line trade community access to data



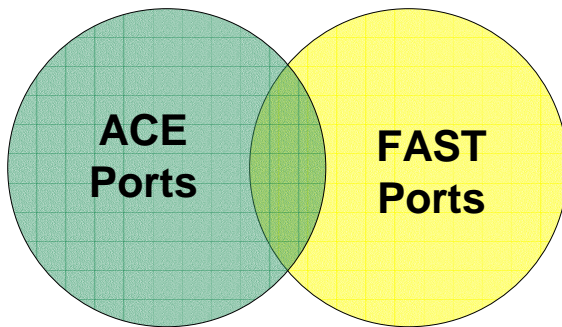
# e-Manifest: Trucks Functionality by Shipment Type

	e-Manifest filing	e-Release	Portal view
PAPS/BCS			
Section 321			
BRASS			
In-Bond			
FAST			



# e-Release: FAST Overview

## Transitional Port Deployment



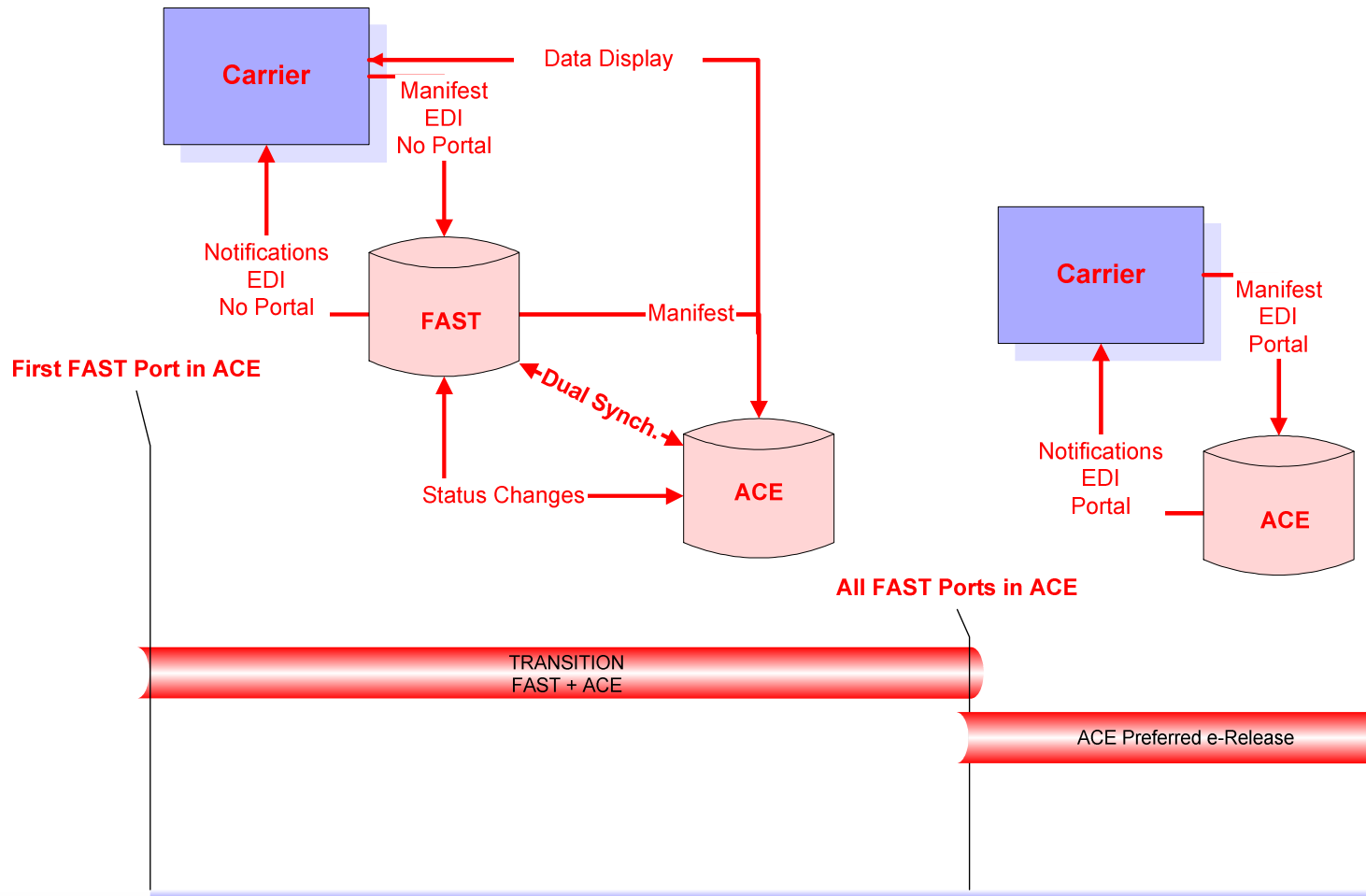
- FAST transactions will be filed in the same manner as today
- ACE will support the release of FAST shipments
- FAST transactions may be viewed via the ACE Secure Data Portal
- FAST transactions may not be created or modified via the ACE Secure Data Portal



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# e-Release: FAST Transition

## FAST - Preferred e-Release Port Functionality



# e-Release : FAST Eligibility Requirements

Driver must be a registered FAST participant with a proximity card

Truck must be equipped with a transponder

Carrier must be a Customs –Trade Partnership Against Terrorism (C-TPAT) participant

Importer must be a C-TPAT participant

Additional requirements on the Southern Border

- Manufacturer must be a C-TPAT participant
- Equipment must be sealed



# e-Release: PAPS

Entry pre-filed in ACS

- Border Cargo Selectivity
- Entry
- Entry Summary

Bar Code will not be needed

Shipment Control Number (SCN) and, if applicable, Bill Control Number (BCN) must match SCN/BCN number supplied on the entry

Current limit of three PAPS shipments at primary will be removed

Manifest and entry information is reconciled





# e-Release: BRASS

- C-4 code numbers will be entered by the carrier into the manifest shipment records
- BRASS bar codes will not be needed
- At the time of release entry number will be assigned



# e-Release: Section 321

- 19 Code of Federal Regulations Section 143.23(j)
- Country of origin and value will be entered into the manifest shipment records
- With these additional data elements the manifest becomes the entry
- Maximum value is 200 dollars



# e-Release: In-Bond

## In-Bond types supported

- 61 – Immediate Transportation (I.T.)
- 62 – Transportation and Exportation (T&E)
- 63 – Immediate Exportation (I.E.)

## In-Bond functionality supported

- In-Bond request and authorization
- In-Bond arrival

## Method of data transmission

- ACE e-Manifest: Trucks (Release 4)
- Electronic In-Bond via the Automated Broker Interface (record identifiers QP/WP)
- Customs Automated Forms Entry System – CAFES



# Additional Issues

## Broker Download

- Shipment data reported by the carrier will be forwarded to the ACS entry filer identified by the carrier

## Associated carriers

- Shipment data transmitted to ACE cannot be transferred from one carrier to another
- The issue of the carrier's ability to transfer shipment data from one carrier to another is under review

Export of In-Bond shipments must be reported via ABI (QP/WP)



# ACE Secure Data Portal – e-Manifest: Trucks (Release 4)

Bill Miller, eCP



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# ACE Secure Data Portal

The screenshot shows a web browser window displaying the ACE Secure Data Portal. The page title is "IBM WebSphere Portal - Microsoft Internet Explorer provided by the U.S. Customs Service [C]". The browser address bar shows "http://www.ace.dhs.gov/". The page header includes the "ace secure data portal" logo and "Bureau of Customs and Border Protection". A user is logged in as "Welcome: Scott User".

The main content area is divided into two sections: "Manifest" and "Shipment".

**Manifest Section:**

Filter Manifests:

Trip # [ ] Tec [ ] Filing Status: --Select--  
 Est. arrival date: [ ] Tec [ ] Type: --Select--  
 Shipment control #: [ ] First expected P.O.A.: [ ]

[Filter Manifests] [Reset]

Showing 1-13 of 42 [Create Standard Manifest](#) or [Create Preferred Manifest](#)

Trip #	Est. Arrival Date	Submitted Date/Time	Type	Number of Shipments	Status	First expected P.O.A.
<a href="#">ZZZZTESTED IMPSEALS</a>	05/14/2004		Standard	0	Preliminary	0601
<a href="#">ZZZZTESTED IMPSEALS</a>	04/28/2004		Standard	0	Preliminary	0601
<a href="#">ZZZZALID1234</a>	04/28/2004		Standard	0	Preliminary	0273
<a href="#">ZZZZALID1235</a>	04/28/2004		Standard	0	Preliminary	0401
<a href="#">ZZZZALID1236</a>	04/28/2004		Standard	0	Preliminary	0401
<a href="#">ZZZZLaw &amp; Compliance</a>	05/01/2004		Standard	0	Preliminary	0601
<a href="#">ZZZZGan's New Tool</a>	05/05/2004		Standard	1	Preliminary	0601
<a href="#">ZZZZIN1000</a>	05/05/2004		Standard	0	Preliminary	0601
<a href="#">ZZZZTRCheck</a>	05/05/2004		Standard	0	Preliminary	0601
<a href="#">ZZZZTESTED</a>	05/04/2004		Standard	0	Preliminary	0601

[1] [2] [3] [4] [5] [6]

**Shipment Section:**

Showing 1-4 of 4 [Create Standard Shipment](#) or [Create Preferred Shipment](#)

Shipment control #	Bill Control #	Sequence #	Type	Point/Port of Loading	Total Shipment Qty.	HAZ-MAT
<a href="#">ZZZZSHIP00412</a>			Standard		111	No
<a href="#">ZZZZSHIP003</a>			Standard		55	No
<a href="#">ZZZZSHIP005</a>			Standard		99	No
<a href="#">ZZZZSHIP004</a>			Standard		544	No



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# ACE Secure Data Portal - Trip

IBM WebSphere Portal - Microsoft Internet Explorer provided by the U.S. Customs Service [C]

ace secure data portal Bureau of Customs and Border Protection

Welcome Sea User!

View: Manifest

Manifest

Account List

Click on icon or label text to access menu.

Manifest - Create Standard Manifest

\* Indicates field is required.

Trip information:

Carrier SCAC: ZZZZ Carrier name: ZZZZobro Carrier ACE ID: 043242425 Filing status:

\* Trip number: ZZZZ

\* Est. date of arrival at first port in U.S.: (mm/dd/yyyy)

\* Est. time of arrival at first port in U.S.: (8:00am local military time)

\* First expected port of arrival: Lookup Port Code

Is transit indicator: (No)

Conveyance:

\* Conveyance ID: Lookup Conveyance or Create One-time Conveyance

Seal #1: Seal #2: Seal #3: View Seals

Instruments of International Traffic:

EC - Trip consists solely of empty IT's covered by carrier's bond.

EI - Trip consists solely of empty IT's covered by importer's bond.

IEC - Trip consists of merchandise and IT's. IT's covered by carrier's bond.

IIE - Trip consists of merchandise and IT's. IT's covered by importer's bond.

\* Crew member(s): Add Crew Member by ID or Lookup Crew Member or Create One-time Crew Member

Change	Last Name	First Name	Middle Name	Suffix	ID	COL #/License #
--------	-----------	------------	-------------	--------	----	-----------------

Passenger(s): Create One-time Passenger

Last Name	First Name	Middle Name	Suffix
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Equipment: Lookup Equipment or Create One-time Equipment

Equip #/License Plate #	Type	Seal Number(s)
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Shipments(s): Lookup Shipment(s) or Create Shipment

Shipment Control #	Bill Control #	Sequence #	Shipper Name	Consignee Name	Total Shipment Quantity
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Check For Errors Save & Finish Later Save & Continue Cancel

Local intranet



# ACE Secure Data Portal - Conveyance

IBM WebSphere Portal - Microsoft Internet Explorer provided by the U.S. Customs Service [C]

File Edit View Favorites Tools Help

ace secure data portal Bureau of Customs and Border Protection Welcome Sco User!

View: Manifest

Manifest

Account List ?

Click on icon or label text to access menu.

**Edit Conveyance**

\* - Indicates field is required.

\* Conveyance type --Select--

\* VIN/Serial #

\* DOT #

Transponder ID

\* License Plate(s):

License Plate #	Country of Registration	State/Province	
	--Select--		<a href="#">Remove</a>
	--Select--		<a href="#">Remove</a>
	--Select--		<a href="#">Remove</a>
	--Select--		<a href="#">Remove</a>

Insurance if carrying Hazardous material:

Company name

Policy #

Liability amount \$

Year of issuance: (yyy)

Continue Cancel



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# ACE Secure Data Portal - Crew

ACE Secure Data Portal - Microsoft Internet Explorer provided by the U.S. Customs Service [C]

File Edit View Favorites Tools Help

Click on icon or label text to access menu.

\* Indicates field is required.

**Personal information**

\* Gender  Male  Female

\* First name

Middle name in full

\* Last name

Name suffix

\* Date of birth  (mm/dd/yyyy)

\* Citizenship/Nationality

**Address**

\* Country:

\* Address line 1:

Address line 2:

Address line 3:

\* City:

\* State:

\* Zip/Postal code:

**Driver Documentation**

Required information for drivers

	Country	State/Province
Commercial Driver's License #:	<input type="text"/>	<input type="text"/>
HAZ-MAT endorsement(s)	<input type="text"/>	<input type="text"/>

\* - at least 1 of the following is required

	Country	State/Province
Passport #:	<input type="text"/>	<input type="text"/>
Birth certificate #:	<input type="text"/>	<input type="text"/>
Citizen card #:	<input type="text"/>	<input type="text"/>
U.S. Visa #:	<input type="text"/>	<input type="text"/>
Certificate of naturalization #:	<input type="text"/>	<input type="text"/>
Laser Visa (Border Crossing Card) #:	<input type="text"/>	<input type="text"/>
Permanent resident card #:	<input type="text"/>	<input type="text"/>
Reentry permit #:	<input type="text"/>	<input type="text"/>
Refugee permit #:	<input type="text"/>	<input type="text"/>
Other:	<input type="text"/>	<input type="text"/>

Continue Cancel



# ACE Secure Data Portal - Equipment

The screenshot shows a web browser window with the title "IBM WebSphere Portal - Microsoft Internet Explorer provided by the U.S. Customs Service (C)". The page header includes the "ace secure data portal" logo and "Bureau of Customs and Border Protection". A "Welcome Sea User!" message is visible in the top right. The main content area is titled "Manifest - Create One-time Equipment".

On the left, there is a sidebar with a tab labeled "Manifest" and a section titled "Account List" with a sub-header "Click on icon or labeled to access menu." Below this is a large empty space.

The main form area contains the following fields and sections:

- A note: "\* - Indicates field is required."
- "\* Type:" with a dropdown menu showing "--Select--".
- "\* Number:" with a text input field.
- "\* License Plate(s):" section containing a table with columns for "License Plate #", "Country of Registration", and "State/Province". Each row has a "Remove" link to its right.
- "Instruments of International Traffic:" section with four radio button options:
  - EC - Trip consists solely of empty IIT's covered by carrier's bond.
  - EI - Trip consists solely of empty IIT's covered by importer's bond.
  - MC - Trip consists of merchandise and IIT's. IIT's covered by carrier's bond.
  - MI - Trip consists of merchandise and IIT's. IIT's covered by importer's bond.
- "Seal #1:" through "Seal #6:" with corresponding text input fields.
- "Continue" and "Cancel" buttons at the bottom.



# ACE Secure Data Portal – Link Shipments to Trip

The screenshot displays the ACE Secure Data Portal interface. The main content area is titled 'Manifest - Linkup Shipments'. It features a search filter section with the following fields:

- Shipment control #:
- to:
- HAZ-MAT:
- Bill control #:
- to:
- Point/Port of loading:

Below the filter section, there are 'Filter Shipments' and 'Reset' buttons. The main data table shows 4 records:

Select All	Shipment Control #	Bill Control #	Sequence #	Point/Port of Loading	Total Shipment Qty.	HAZ-MAT
<input type="checkbox"/>	<a href="#">ZZZTESTPTR417</a>				111	No
<input type="checkbox"/>	<a href="#">ZZZTEST005</a>				55	No
<input type="checkbox"/>	<a href="#">ZZZTEST005</a>				88	No
<input type="checkbox"/>	<a href="#">ZZZPLSH002</a>				544	No

Below the table are 'Add Selected' and 'Cancel' buttons. A second table, titled 'Shipment', shows details for the selected items:

Shipment control #	Bill Control #	Sequence #	Type	Point/Port of Loading	Total Shipment Qty.	HAZ-MAT
<a href="#">ZZZTESTPTR417</a>			Standard		111	No
<a href="#">ZZZTEST005</a>			Standard		55	No
<a href="#">ZZZTEST005</a>			Standard		88	No
<a href="#">ZZZPLSH002</a>			Standard		544	No

Links for 'Create Standard Shipment' and 'Create Preferred Shipment' are provided at the top right of the 'Shipment' table.



# ACE Secure Data Portal - Shipment

IBM WebSphere Portal - Microsoft Internet Explorer provided by the U.S. Customs Service (C)

File Edit View Favorites Tools Help

Shipment - Create Standard Shipment

\*Indicates field is required.

Shipping Information:

\* Shipment control #:

Bill control #:

Shipment identifier:

Port/ Point of loading:  [Lookup Schedule K/Inland Schedule K](#) or [Lookup IATA Code](#)

Place of receipt:  (required when different from Port/Point of loading)

Service type:

Transfer destination FIRMS code:  [Lookup FIRMS Code](#)

FDA freight indicator:  Yes (Indicates that freight in this shipment is subject to FDA requirements)

Shipper:

ID:

\* Name:

\* Address line 1:

Address line 2:

Address line 3:

\* City:

\* Country:

\* State/Province:

\* Zip/Postal code:

Telephone:

Email:

Consignee:

ID:

\* Name:

\* Address line 1:

Address line 2:

Address line 3:

\* City:

\* Country:

\* State/Province:

\* Zip/Postal code:

Telephone:

Email:

Party: [Add Party](#)

Party Type	Name/Filer Code/SCAC	Country	State/Province

Pre-filed release or in-bond type: PAPS

Equipment:  Equipment Type:

Equip. #/License Plate #	Type

Total Shipment Quantity: 0

Boarded quantity:  If this is a split shipment enter the boarded quantity.



# ACE Secure Data Portal – Shipment Commodity

ACE Secure Data Portal - Microsoft Internet Explorer provided by the U.S. Customs Service [C]

File Edit View Favorites Tools Help

Passenger(s): [Create One-time Passenger](#)

Last Name	First Name	Middle Name	Suffix
-----------	------------	-------------	--------

Equipment: [Lookup Equipment](#) or [Create One-time Equipment](#)

Equip #/License Plate #	Type	Seal Number(s)
-------------------------	------	----------------

Shipment(s): [Lookup Shipment\(s\)](#) or [Create Shipment](#)

Shipment Control #	Bill Control #	Sequence #	Shipper Name	Consignee Name	Total Shipment Quantity
--------------------	----------------	------------	--------------	----------------	-------------------------

---

**Shipment - Edit Standard Shipment Commodity**

\*Indicates field is required.

\* **Shipment quantity:** 0  --Select--

\* **Weight:** 0  --Select--

\* **Description:**

**HAZ-MAT UNDG code(s):**

**HAZ-MAT contact person:**

**HAZ-MAT contact phone #:**

**Vehicle identification number:**     
(if commodity is a vehicle)

**Marks & Numbers:**



# ACE Secure Data Portal – Change Shipment Type

ACE Secure Data Portal - Microsoft Internet Explorer provided by the U.S. Customs Service (C)

File Edit View Favorites Tools Help

\*Conveyance ID:  [Lookup Conveyance](#) or [Create One-time Conveyance](#)

Seal #1:  Seal #2:  Seal #3:  [More Seals](#)

Instruments of International Traffic:

EC - Trip consists solely of empty IIT's covered by carrier's bond.  
 EI - Trip consists solely of empty IIT's covered by importer's bond.  
 MC - Trip consists of merchandise and IIT's. IIT's covered by carrier's bond.  
 MI - Trip consists of merchandise and IIT's. IIT's covered by importer's bond.

\* Crew member(s): [Add Crew Member by ID](#) or [Lookup Crew Member](#) or [Create One-time Crew Member](#)

InCharge	Last Name	First Name	Middle Name	Suffix	ID	CDL #/License #

Passenger(s): [Create One-time Passenger](#)

Last Name	First Name	Middle Name	Suffix

Equipment: [Lookup Equipment](#) or [Create One-time Equipment](#)

Equip #/License Plate #	Type	Seal Number(s)

Shipment(s) [Lookup Shipment\(s\)](#) or [Create Shipment](#)

Shipment Control #	Bill Control #	Sequence #	Shipper Name	Consignee Name	Total Shipment Quantity

Check For Errors Save & Finish Later Save & Continue Cancel

---

**Change Shipment Type**

Changing the type from the current shipment type will cause the loss of all data that is unique to that shipment type.

Current shipment type: PAPS  
 Pre-filed release or in-bond type:

PAPS  
 PAPS  
 --Select--  
 BCS  
 BRASS  
 CAFES  
 PAPS  
 Prefiled Inbond  
 Sec 321 Informal



# Carrier Accounts Management (MEDPID)

Patricia Young, eCP

Panelists:

Karen Henderson, CBP

Michelle Miller, eCP



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# Purpose of MEDPID Message

- Electronic Data Interchange (EDI) solution for the trade community to submit master data to a carrier's account for use in e-Manifest: Trucks (Release 4)
- Master data includes:
  - Crew
  - Equipment
  - Conveyance
- Actions: Add, deactivate, and modify





# Purpose of MEDPID Message

Existing translators can be used

MEDPID is compatible with United Nations/Electronic Data Interchange for Administration, Commerce, and Transport (UN/EDIFACT) MEDPID standard rules and guidelines

New CBP EDI messages under consideration

- MEDPID equivalent ANSI X.12 transaction set (359 set)
- UN/EDIFACT message for CBP use (MEDPID “replacement”)
- To be sent to EDI standards bodies (UN/EDIFACT and ANSI X.12) for approval



# MEDPID Message Constraints

- Up to 9999 master data records can be sent in one MEDPID
- Send 1 MEDPID per interchange (UNH-UNT)
- Limit one interchange per message transmission
- Limit MEDPID message to one category (crew, conveyance, or equipment) per message transmission
- Only one Message Group (UNG-UNE) per message transmission
- Message Group is optional
- Maximum message size is 4MB



# To Add Crew Information

An Automated Commercial Environment Identification (ACE ID), once deactivated from the previous account, or the following is required:

- Standard Carrier Alpha Code (SCAC)
- First, last, and middle name (if middle name exists)
- Gender
- Date of Birth
- Nationality/Citizenship
- Driver's License, State/Province and Country, Hazmat Endorsement
- Travel Documents



# To Add Conveyance and/or Equipment

An ACE ID, once deactivated from the previous account, or the following is required:

## Conveyance

- SCAC
- Conveyance type
- Conveyance number/ID
- License plate with state/province, country
- Vehicle Identification Number (VIN)
- Transponder number, if it exists

## Equipment

- SCAC
- Equipment type
- Equipment number/ID
- License plate with state/province, country



# To Deactivate or Modify Information

## Deactivate Crew

- ACE ID
- Driver's license, state/province and country

## Deactivate Conveyance

- ACE ID
- VIN

## Deactivate Equipment

- ACE ID
- Equipment number/ID

To Modify: above fields plus changed fields only



# MEDPID Response

- CBP responds back to the trade community user with a MEDPID Response
- Entire message received is returned with approval/disapproval code and free text (for errors)
- Approvals and disapprovals can be returned in the same message
- Maximum combination of approvals and disapprovals is 99 in a given message



# MEDPID Process with Error Reporting

Trade community user transmits MEDPID message

EDI translator returns functional acknowledgments (FA) to sender

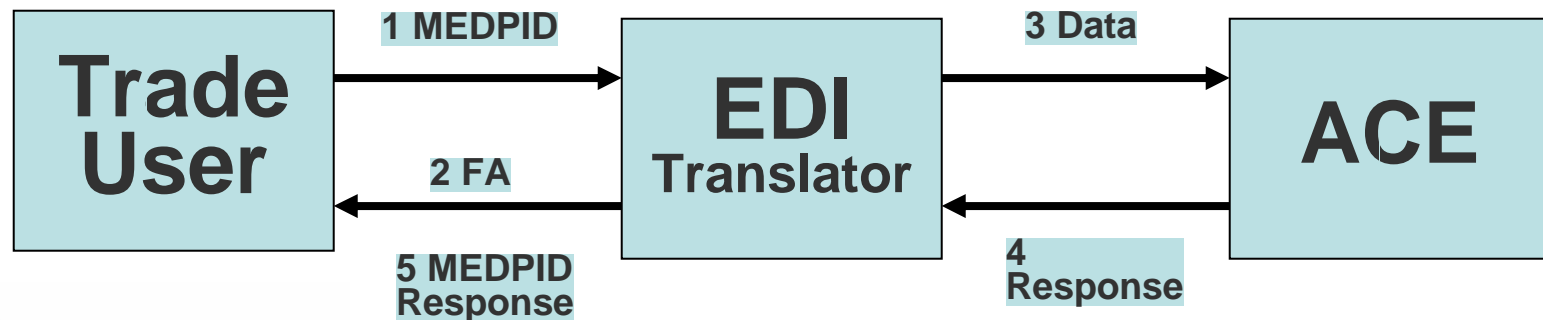
- EDI compliance error or success
- Configurable (for every message or for no messages)

Translator mapped data is sent to ACE

ACE sends response

ACE responses are translated to MEDPID and conveyed to sender

- Entire received message is sent back with error codes and messages



# Test and Validation

- To use MEDPID, trade community user must pass test and validation
- ACE Test and Validation Procedures will be similar to existing CBP Test and Validation Procedures
- Test and Validation briefing will provide more details





# Communications Architecture and Trade Interfaces

Luke McCormack, CBP



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# Communications Architecture and Trade Interfaces

Bud Blankenship, CBP



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# Communications Architecture and Trade Interfaces

## Customs EDI Communications – ACE Supported Communications

- MQ Frame Relay
- Value Added Networks (VANs)
- Application Service Providers (ASPs)
- Service Centers

## Communications Not Supported in ACE

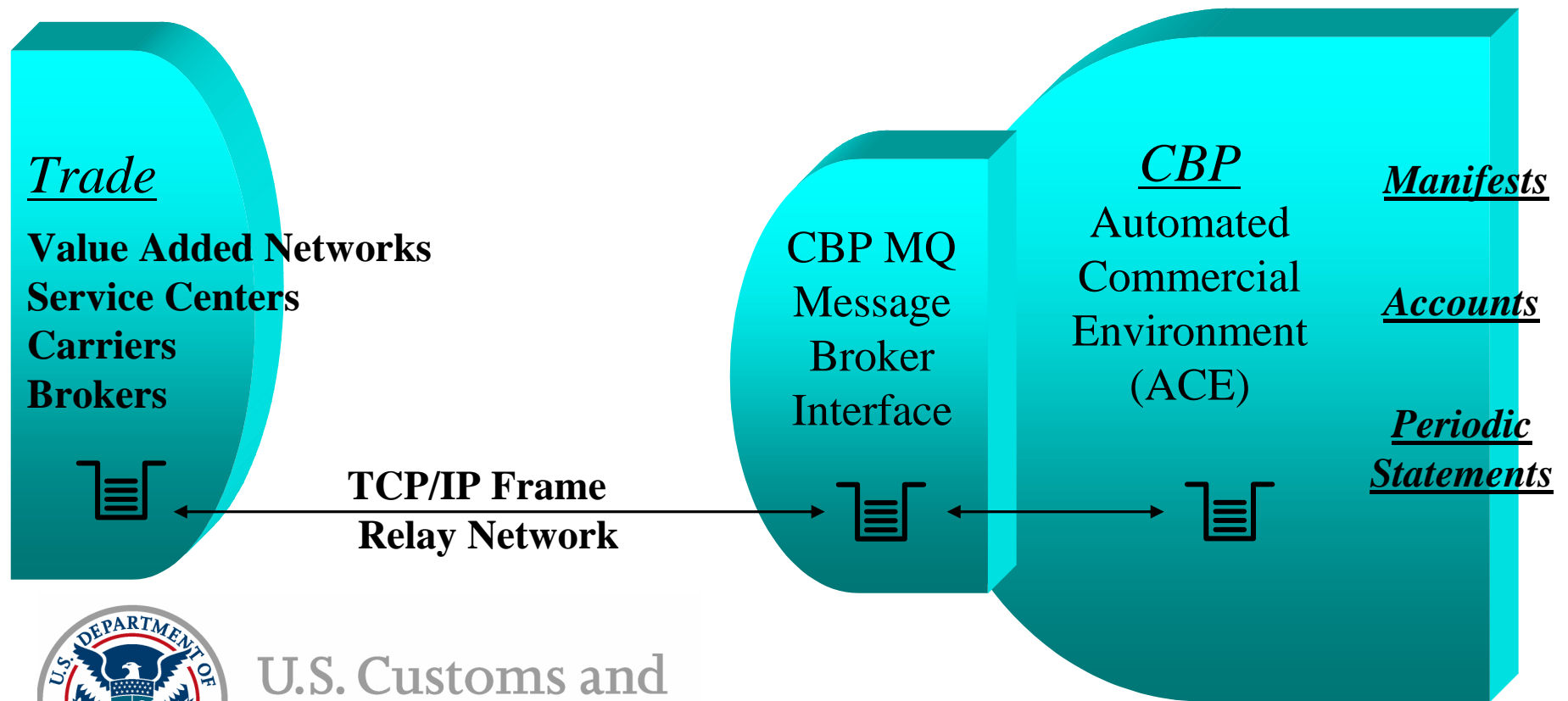
- LU6.2 SNA
- RJE Dial-Up



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# Communications Architecture and Trade Interfaces

## Customs EDI Communications Architecture



U.S. Customs and Border Protection

# Communications Architecture and Trade Interfaces

## MQ Frame Relay Program

- Features:
  - IBM Messaging Technology
  - Sprint Digital Networking Technology
  - Cylink Encryption Technology
  - T1 connections to Sprint for Trade and Participating Government Agency (PGA) Interfaces
  - Conforms with CBP Disaster Recovery Strategy
- Interconnection Security Agreement (ISA) required



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# Communications Architecture and Trade Interfaces

## Service Centers, ASPs and VANs

- MQ Frame Relay to CBP
- Provide flexible communications interfaces to their client base (ie. FTP, HTTPS)
- In-service data translation/transformation
- Refer to list of vendors and service providers on CBP website
- Support ANSI X.12 and UN/EDIFACT messaging
- CBP does NOT pay for electronic data exchange



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# ANSI X.12

Kiran Gowda, eCP



U.S. Customs and  
Border Protection

# ANSI X.12 Manifest

## Messages transmitted to CBP

- 309 Complete Manifest or Preliminary Shipments
- 358 Truck Manifest (Trip/Consist)
- 353 Event Advisory Message (Manifest Commit and In-Bond Arrival)

## Messages transmitted from CBP

- 997 Functional Acknowledgement
- 355 CBP Acceptance/Rejection
- 350 CBP Status Information





# ANSI X.12

## Manifest EDI Submission Options

### Option 1:

- Original manifest (trip and shipments) via the ANSI X.12 transaction set 309 “Customs Manifest”

### Option 2:

- Preliminary shipments via 309
- Trip via ANSI X.12 transaction set 358 “Customs Trip Information” with shipments listed in MBL segment “Bill of Lading”

### Option 3:

- Preliminary shipments via 309 with trip number in M10 segment “Manifest Identifying Information”
- Trip via 358 “Customs Trip Information”



# ANSI X.12

## Manifest EDI and ACE Secure Data Portal Submission Options

### Option 1:

- Preliminary shipments via 309
- Create trip on ACE Secure Data Portal
- Locate and link shipments on ACE Secure Data Portal

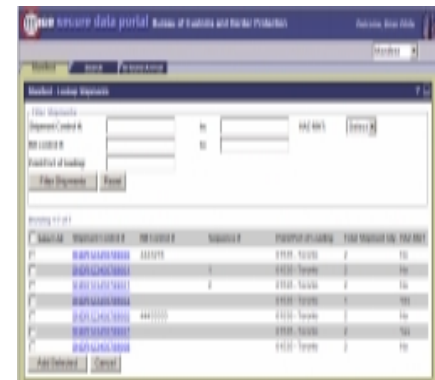


### Option 2:

- Preliminary shipments via 309 with trip number in M10 segment
- Update trip on ACE Secure Data Portal

### Option 3:

- Preliminary shipments on ACE Secure Data Portal
- Trip via 358 with shipments listed in MBL segment



# ANSI X.12 Functionality

## Identifiers:

Trip Identifiers (Standard Manifest) = Trip Number, Estimated Date of Arrival

Trip Identifiers (Preferred Manifest) = Trip Number

Shipment Identifiers (Standard Manifest) = Shipment Control Number, Bill Control Number (if applicable)

Shipment Identifiers (Preferred Manifest) = Shipment Control Number



# ANSI X.12 Functionality

## 309: Truck Manifest / Shipments

Type of Msg	Data	Description	Functionality
M1009 = 'W' (Original) M1017 = '8' (Standard)/'9' (Preferred)	Trip and Shipment data	Manifest (Trip + Shipments created) - marked complete and submitted to CBP.	Create Manifest
M1009 = 'P' (Preliminary) M1017 = '8' (Standard)/'9' (Preferred)	Shipment data only. Trip Number = 'SYSTEM'.	Unassociated Shipments created	Create Shipment
M1009 = 'P' (Preliminary) M1017 = '8' (Standard)/'9' (Preferred)	Trip identifiers provided and Shipment data provided.	Trip with only Trip identifiers created. Shipments created and attached to Trip.	Create Manifest
M1009 = 'P' (Preliminary) M1017 = '8' (Standard)/'9' (Preferred)	Trip information provided and Shipment data provided.	Manifest (Trip + Shipments created) - not yet completed	Create Manifest
M1009 = 'Y' ('Update' at Trip level) M1303 = 'A' ('Add' at Shipment level) M1017 = '8' (Standard)/'9' (Preferred)	Trip identifiers provided and Shipment data provided.	If any Trip information is changed, Trip updated. A new Shipment created and linked to the existing Trip specified.	Update Manifest



# ANSI X.12 Functionality

## 309: Truck Manifest / Shipments (Continued)

Type of Msg	Data	Description	Functionality
M1009 = 'Y' ('Update' at Trip level) M1303 = 'D'. ('Delete' at Shipment level)  M1017 = '8' (Standard)/'9' (Preferred)	Trip identifiers and Bill identifiers(s) provided.	If any Trip information is changed, Trip updated. Shipment cancelled.	Update Manifest
M1009 = 'Y' ('Update' at Trip level) M1303 = 'M'. ('Update' at Shipment level)  M1017 = '8' (Standard)/'9' (Preferred)	Trip identifiers provided and Shipment data provided.	If any Trip information is changed, Trip updated. Shipment modified	Update Manifest
M1009 = 'Y' ('Update' at Trip level) M1303 = 'D'. ('Delete' at Shipment level)  M1017 = '8' (Standard)/'9' (Preferred)	Trip Number = 'SYSTEM'. Bill identifier(s) provided.	Shipment cancelled.	Cancel Shipment
M1009 = 'Y' ('Update' at Trip level) M1303 = 'M'. ('Update' at Shipment level)  M1017 = '8' (Standard)/'9' (Preferred)	Trip Number = 'SYSTEM'. Bill identifier(s) provided.	Shipment modified.	Update Shipment
M1009 = '3' ('Delete' at Trip level)  M1017 = '8' (Standard)/'9' (Preferred)	Trip identifiers provided.	Cancel Manifest (Trip and associated Shipments)	Cancel Manifest



# ANSI X.12 Functionality

## 358: Trip Information

Type of Msg	Data	Description	Functionality
M1009 = 'S' (Preliminary) M1017 = '8' (Standard)/'9' (Preferred)	Trip data provided	Trip created and marked as Empty. Manifest still preliminary	Create Trip
M1009 = 'S' (Preliminary) M1017 = '8' (Standard)/'9' (Preferred)	Trip data provided and Bills listed in MBL (Boarded Qty for Split Shipment may be provided)	Trip created and Shipments specified are linked to this Trip  Pre-condition: Shipment should have been filed earlier.	Create Trip. Link Shipments.
M1009 = 'Y' ('Update' at Trip level) M1017 = '8' (Standard)/'9' (Preferred)	Trip data provided	Trip information updated. If Shipments already exist in the system with this Trip identifier, the Trip and Shipments are linked.	Update Trip. Automatically link Shipments to Trip.
M1009 = 'Y' ('Update' at Trip level) M1303 = 'A' ('Add' at Shipment level) M1017 = '8' (Standard)/'9' (Preferred)	Trip data provided and Bills listed in M13 (Boarded Qty for Split Shipment may be provided in MBL)	Trip updated and Shipments specified are linked to this Trip.	Update Trip. Link Shipments to Trip.
M1009 = 'Y' ('Update' at Trip level) M1303 = 'D' ('Delete' at Shipment level) M1017 = '8' (Standard)/'9' (Preferred)	Trip data provided and Bills specified in M13	Trip updated and Shipments specified are de-linked from this Trip. The Shipments are still available to be used on another Trip.	Update Trip. De-Link Shipments from Trip.



# ANSI X.12 Functionality

## 358: Trip Information (Continued)

Type of Msg	Data	Description	Functionality
M1009 = 'Y' ('Update' at Trip level) M1303 = 'M' ('Update' at Shipment level)  M1017 = '8' (Standard)/'9' (Preferred)	Trip data provided and Bills listed in MBL and Boarded Qty for Split Shipment provided	Trip updated and Boarded Qty on Shipments specified is updated.	Update Manifest
M1009 = '3' ('Delete' at Trip level)  M1017 = '8' (Standard)/'9' (Preferred)	Trip identifiers provided	Cancel Manifest (Trip and associated Shipments)	Cancel Manifest



# ANSI X.12 Functionality

## 353: Events Advisory Details

Type of Msg	Data	Description	Functionality
M1501 = '1' (Arrival by In-bond Number)/ '2'(Arrival by Bill of Lading Number)/ '3'(Arrival by Equipment Number)	In-Bond number/Bill number/Equipment ID	In-Bond Arrival	In-Bond Arrival
M1501 = 'Z' (End of Manifest) M1017 = '8' (Standard)/'9' (Preferred)	Trip identifiers	Mark Manifest complete and submit to CBP.	Submit to CBP





# ANSI X.12 Functionality

## 355: CBP Acceptance/Rejection

Type of Message Segment	Data	Description	Functionality
M1009 = 'P' (Preliminary)/ 'W' (Original) Manifest	Manifest Data	Response to a Manifest submission via 309	Manifest accept/reject
M1009 = 'S' (Trip)	Manifest Data	Response to a trip submission via 358	Manifest accept/reject
M1009 = 'Y' (Amendment))	Manifest Data	Response to an update to a Manifest submitted via 309/358	Manifest accept/reject
M1009 = '3' (Deletion)	Manifest Data	Response to an delete to a Manifest submitted via 309/358	Manifest accept/reject
M1009 = 'I' (In-Bond Arrival)	In-Bond arrival information	Response to an In-Bond arrival submitted via 353	In-Bond Arrival accept/reject



# ANSI X.12 Functionality

## 350: CBP Status Information

Type of Message Segment	Data	Description	Functionality
V901 = 'AAD' (Arrival)	Trip Data	Arrival of conveyance at first U.S. port	Arrival notification
V901 = 'HCR' (Crew)/ 'HEQ' (Equipment)/ 'HMI' (Conveyance)/ 'HTR' (Trip) Hold	Trip Data	Trip, conveyance, crew, equipment Held	Hold notification
V901 = 'RCR' (Crew)/ 'REQ' (Equipment)/ 'RCO' (Conveyance)/ 'RTR' (Trip) Released	Trip Data	Trip, conveyance, crew, equipment released	Release notification



# ANSI X.12 Functionality

## 350: CBP Status Information (Continued)

Type of Message Segment	Data	Description	Functionality
X407 = 1C Entered and Released, General Examination 1H Customs hold placed at port of discharge 1I Customs hold removed at port of discharge 1J In-bond Movement Authorized 1T Seized 11 Arrival of In-bond, complete movement 12 Arrival of In-bond, bill of lading 13 Arrival of in-bond, container/equipment 50 Export of in-bond - complete movement 51 Export of in-bond – bill of lading 52 Export of in-bond – container/equipment 57 Change arrival of in-bond - complete movement 58 Change arrival of in-bond – bill of lading 59 Change arrival of in-bond – container 60 Change export of in-bond – complete movement 61 Change export of in-bond – bill of lading 62 Change export of in-bond – container 63 Delete arrival of in-bond - complete movement 64 Delete arrival of in-bond – bill of lading 65 Delete arrival of in-bond – container 66 Delete export of in-bond - complete movement 67 Delete export of in-bond – bill of lading 68 Delete export of in-bond – container	Shipment Data	Shipment disposition	Shipment notification



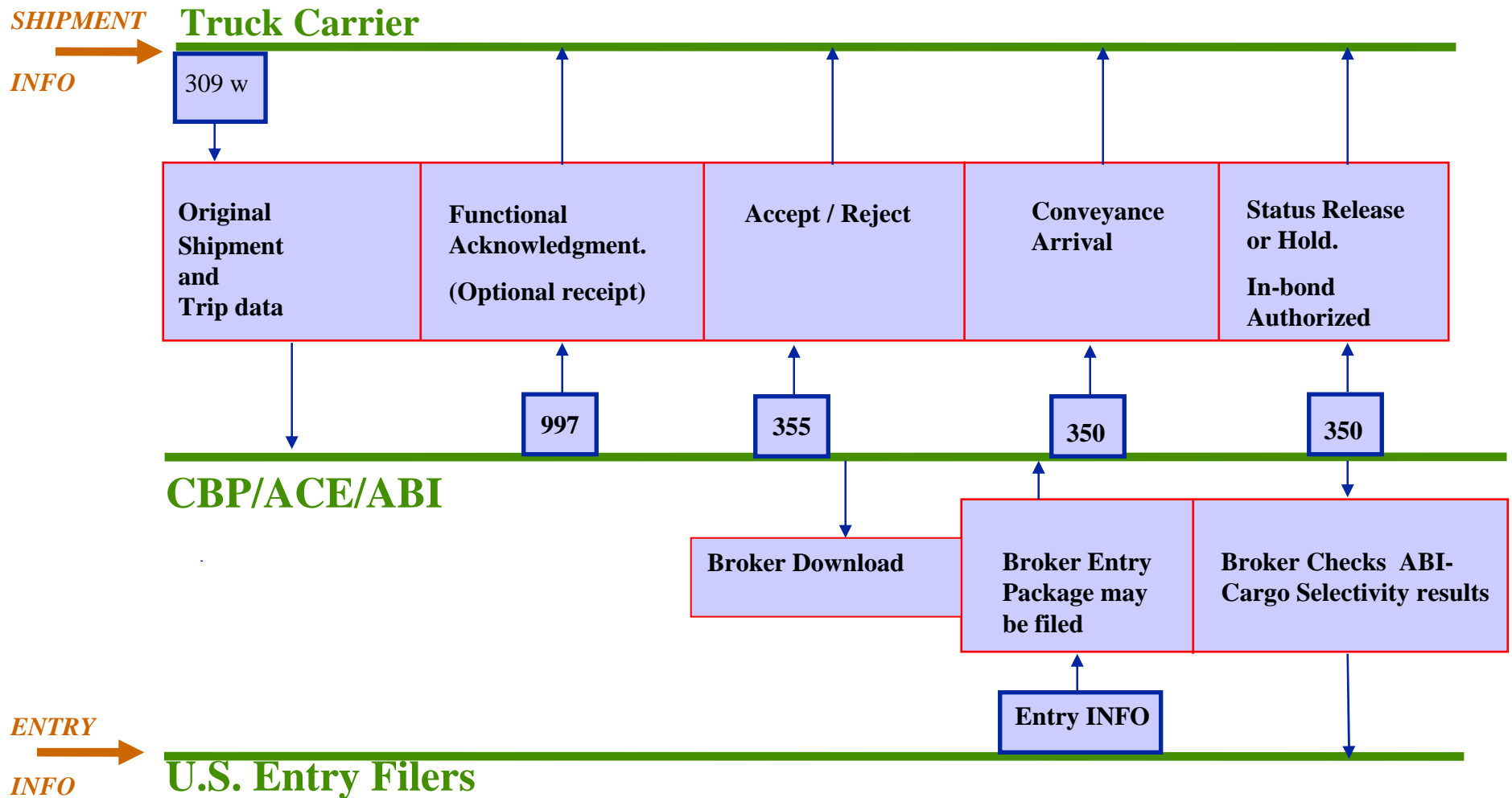
# ANSI X.12 Functionality

## 997 Functional Acknowledgement (FA)

- FAs are used to identify EDI syntax errors within transactions sent to CBP systems
- Generation of the 997 FA is an all or nothing proposition based upon the request of the trading partner
- If trading partner chooses not to receive the 997 FAs they may not, under certain circumstances, receive any acknowledgement from ACE

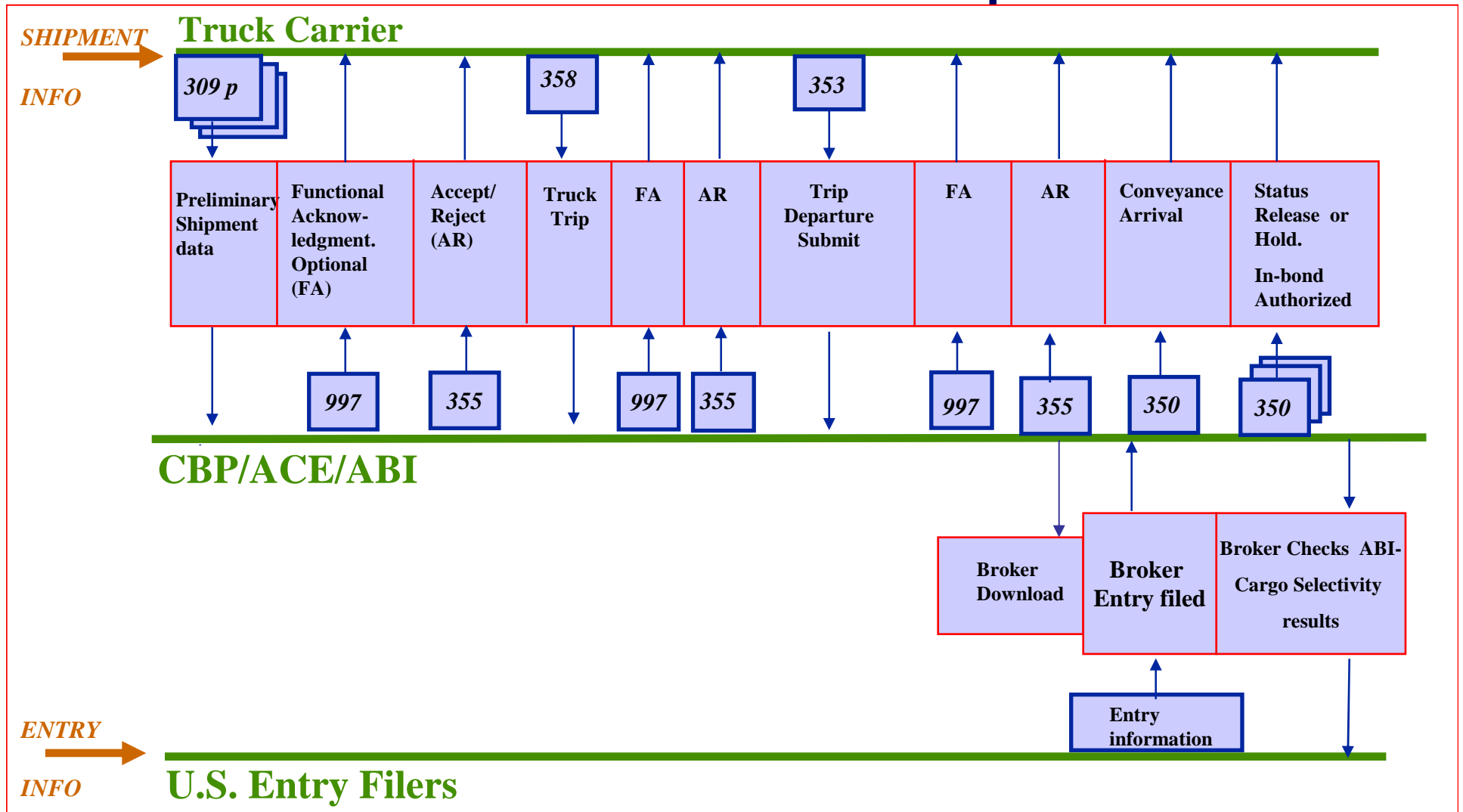


# Process Flows – One Step Process

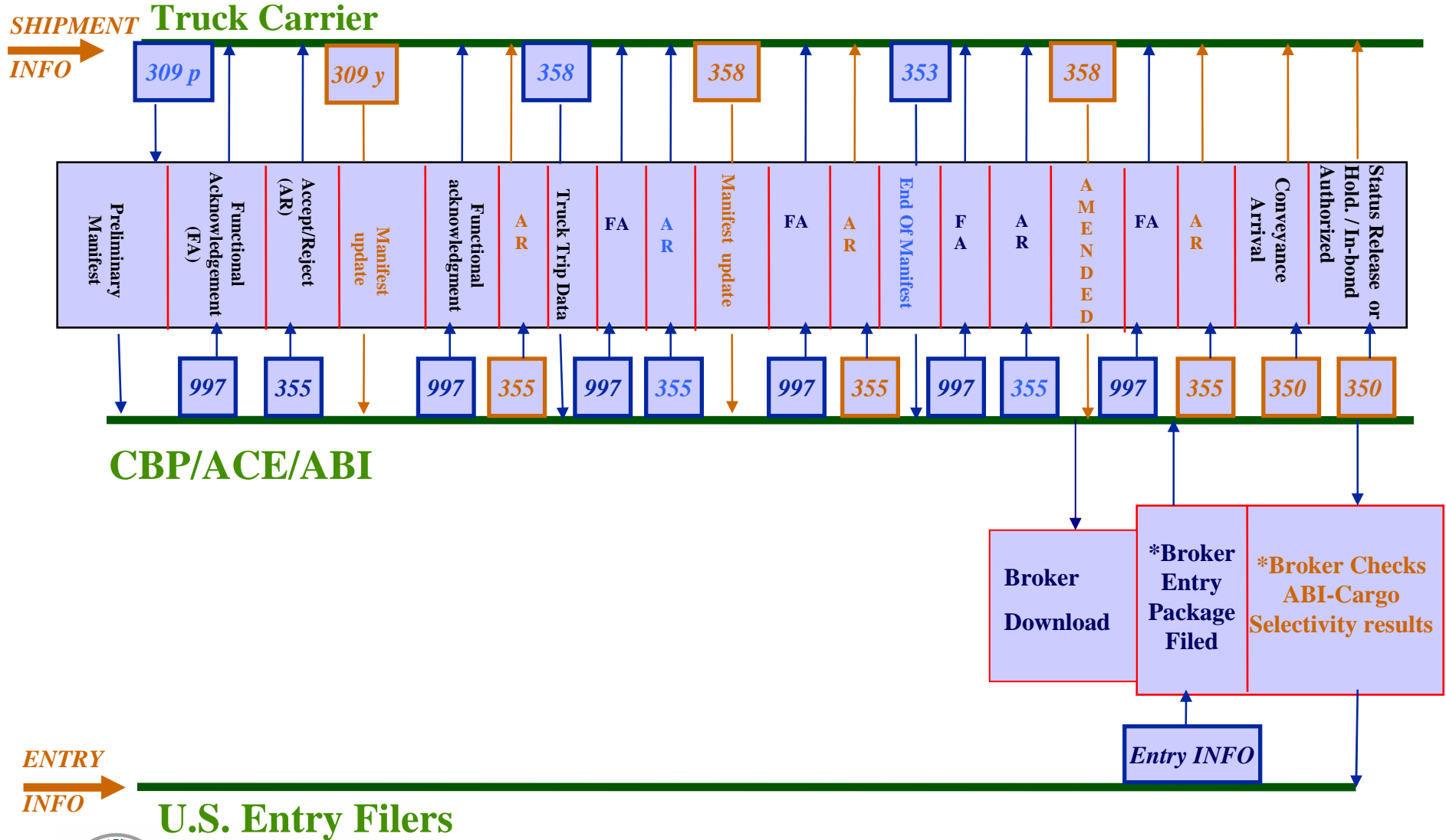


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# Process Flows – Multi Step Process

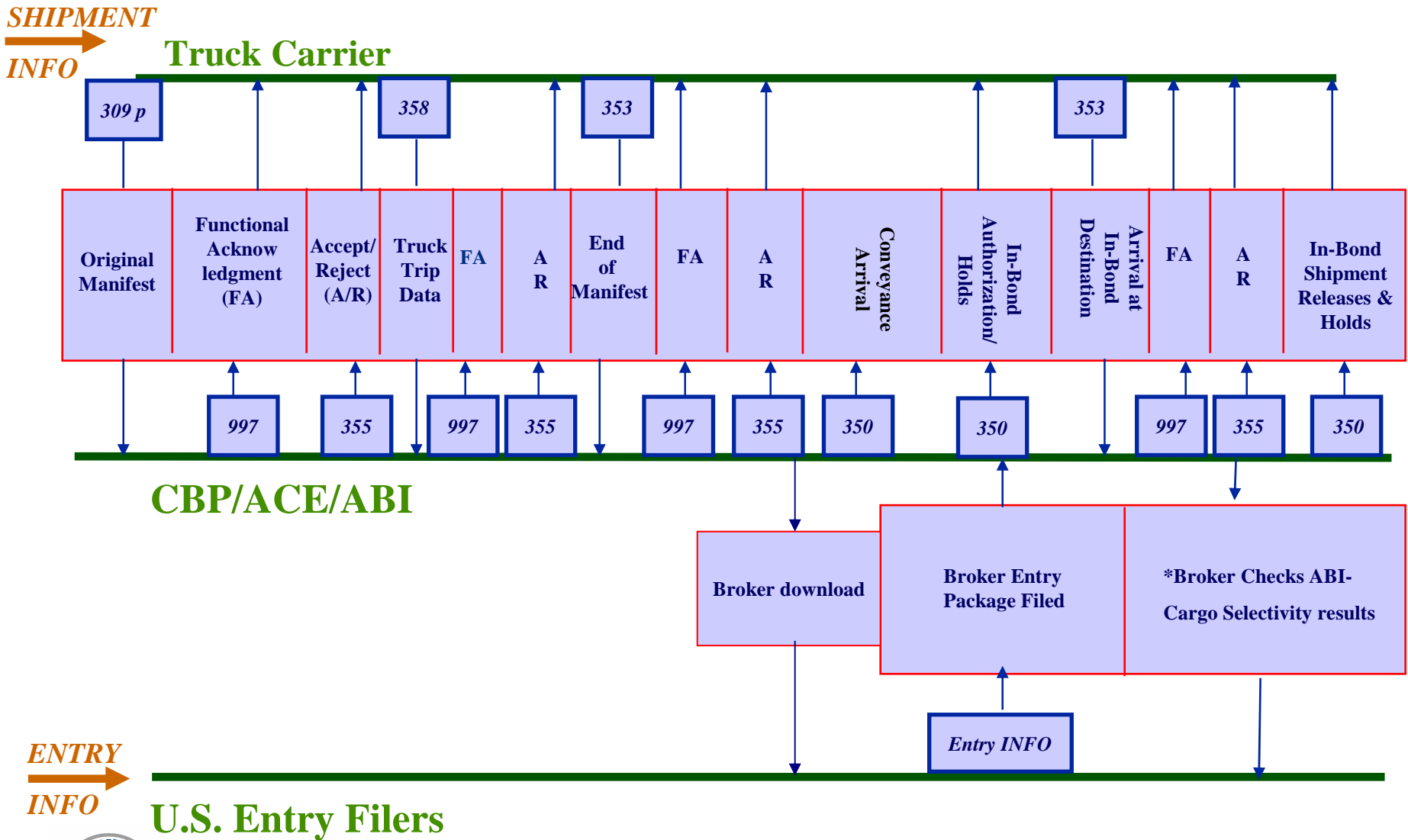


# Process Flows – Amendments



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# Process Flows – In-Bond



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# Looping Constructs and Changes

LOOP ID-P4LX						9999
20	060	LX	Transaction Set Line Number	M	1	
21	070	M13	Manifest Amendment Details	O	1	
23	080	M11	Manifest Bill of Lading Details	O	1	
26	081	N9	Extended Reference Identification		0	999
LOOP ID -P4LX/N1						25
27	100	N1	Party Identification		0	1
31	110	N3	Party Location	O	1	
32	115	N4	Geographic Location		0	2
NU	117	DTM	Date/Time Reference		0	1
33	120	PER	Administrative Communications Contact	O	1	
NU	126	X1	Export License	O	1	
LOOP ID -P4LX/M12						1
34	130	M12	In-bond Identifying Information	O	1	
NU	140	R4	Port or Terminal	O	1	
LOOP ID -P4LX/VD						999
37	150	VD	Vehicle ID		0	4
40	157	M7	Seal Numbers	O	5	
LOOP ID P4LX/VD/N10						999
41	160	N10	Quantity and Description	O	1	
44	162	VC	Motor Vehicle Control		0	999
NU	163	MAN	Marks and Numbers		0	999
LOOP ID -P4LX/VD/N10/H1						99
45	165	H1	Hazardous Material		0	1
NU	166	H2	Additional Hazardous Material	O	1	
46	200	SE	Transaction Set Trailer		M	1

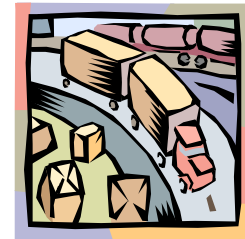


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# Split Shipment

## Scenario:

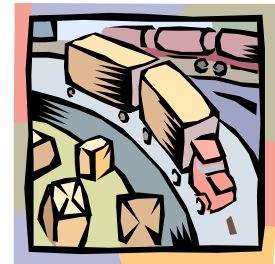
- A shipment contains 100 pcs.
- 1<sup>st</sup> border crossing:
  - **Trip #1** consists of tandem trailers.  
75 pcs. are contained within the 2 trailers (30 in trailer #1 and 45 in trailer #2)
- 2nd border crossing:
  - Remaining 25 pcs. are on **Trip #2** in trailer #1



# Split Shipment

## ANSI messages:

- 309 (Preliminary) with the N1001 Trailer = “NC” Quantity = 100
- 358 for **Trip #1** with
  - VID = Trailer #1 and Boarded Quantity (MBL06) = 30;
  - VID = Trailer #2, Boarded Qty (MBL06) = 45
- 353 End of Manifest for Trip #1
- 358 for **Trip #2** with
  - VID = Trailer #1 and Boarded Quantity (MBL06) = 25
- 353 End of Manifest for Trip #2



# ANSI X-12 Message Details

Donald Kozacki, CBP



U.S. Customs and  
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# Scenario 1: 309 Set Complete Manifest

- ISA\*00\* \*00\* \*02\*XXXX \*ZZ\*CBP-ACE-TEST \*
- 040704\*0930\*^\*00406\*023182085\*0\*P\*:
- GS\*SO\*XXXX\*CBP-ACE-TEST\*20040704\*0930\*987654321\*X\*004060USCBP
- ST\*309\*987654321
- M10\*XXXX\*T\*\*\*2004070401\*TRUCK\*\*\*W\*\*\*0987
- VEH\*\*AB123456789\*\*\*\*\*KEG123\*ON\*\*\*\*\*BT\*\*\*A\*\*DOT123456789
- **NM1\*EJ\*1\*BLIVIT\*MARVIN\*R**
- **DMG\*DB\*12251957\*M\*8\*CA**
- **REF\*ACW\*X12345670\*\*CA**
- **REF\*5K\*ON456789012\*ON**
- N3\*900 SASSAFRAS ST
- N4\*ERIE\*PA\*01234
- P4\*0901\*07042004\*\*\*2330
- LX\*1
- M11\*123456789101\*14094\*\*\*\*\*00\*HALIFAX\*\*XXXX\*\*\*\*\*K
- N1\*SH\*HOSER ARTIFACTS LTD
- N3\*751 YORKE ST
- N4\*TORONTO\*ON\*987 1E6
- N1\*CN\*NEW JERSEY WIDGETS CO
- N3\*123 GARDEN STATE PKWY
- N4\*NEWARK\*NJ\* 012345
- VID\*OE\*\*\*\*\*I\*DD\*KEG345\*ON\*\*\*A
- M7\*09876543
- N10\*50\*WIDGETS,FINELY GRAINED\*MADE IN INDIA\*\*\*L\*2000\*BOX
- N10\*\*SOLID STEEL
- VID\*OE\*\*\*\*\*I\*\*BUF234\*NY\*\*\*A
- M7\*01234567
- N10\*50\*WIDGETS FINELY GRAINED\*MADE IN INDIA\*\*\*L\*2000\*BOX
- N10\*\*SOLID STEEL
- SE\*27\*987654321
- GE\*1\*987654321
- IEA\*1\*023182085

▪ **Note: Segment Terminator is implied**

**NO 358 Set**

**NO 353 Set**



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# Alternative Scenario 1: 358 Set Customs Trip Information

- ISA\*00\* \*00\* \*02\*XXXX \*ZZ\*CBP-ACE-TEST \* 040704\*0930\*^\*00406\*023182087\*0\*P\*:
  - GS\*SO\*XXXX\*CBP-DATA-TEST\*20040704\*0930\*987654321\*X\*004060USCBP
  - ST\*358\*987654321
  - M10\*XXXX\*T\*\*\*2004070401\*TRUCK\*\*\*S\*\*\*12345
  - VEH\*\*AB123456789\*\*\*\*\*KEG123\*ON\*\*\*\*\*BT\*\*A\*\*DOT123456789
  - M7\*098765432\*987654321
  - **NM1\*EJ\*1\*GRAHAM\*STEVEN\*R**
  - **DMG\*DB\*12251957\*M\*8\*CA**
  - **REF\*ACW\*X12345670\*\*CA**
  - **REF\*5K\*ON456789012\*ON**
  - N3\*900 SASSAFRAS ST
  - N4\*ERIE\*PA\*01234
  - P4\*0901\*07042004\*\*\*2330
  - **VID\*OE\*\*\*\*\*I\*\*\*\*KEG345\*ON\*\*\*A**
  - **VID\*OE\*\*\*\*\*I\*\*\*\*BUF234\*NY\*\*\*A**
  - SE\*14\*987654321
  - GE\*1\*987654321
  - IEA\*1\*023182087
- **Note: Segment Terminator is implied**

309 pending  
No 353



U.S. Customs and  
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# Alternative Scenario 1: 309 Set Preliminary Bill, After 358

- ISA\*00\*            \*00\*            \*02\*XXXX            \*ZZ\*CBP-ACE-TEST \* 040704\*0935\*^\*00406\*023182086\*0\*P\*:
  - GS\*SO\*XXXX\*CBP-DATA-TEST\*20040704\*0935\*987654321\*X\*004060USCBP
  - ST\*309\*987654321
  - M10\*XXXX\*T\*\*\* 2004070401\*TRUCK\*\*\*P\*\*\*5432
  - P4\*0901\*070404\*\*\*2330
  - LX\*1
  - M11\*123456789101\*14094\*\*\*\*\*00\*HALIFAX\*\*XXXX\*\*\*\*\*K
  - N1\*SH\*HOSER ARTIFACTS LTD
  - N3\*751 YORKE ST
  - N4\*TORONTO\*ON\*987 1E6
  - N1\*CN\*GREATER BUFFALO WIDGETS CO
  - N3\*123 DEARBORN ST
  - N4\*BUFFALO\*NY\*14220
  - **VID\*OE\*\*\*\*\*I\*\*DD\*\*\*KEG345\*ON\*\*\*A**
  - M7\*09876543
  - N10\*50\*WIDGETS,FINELY GRAINED\*\*\*\*L\*2000\*BOX
  - N10\*\*SOLID STEEL
  - **VID\*OE\*\*\*\*\*I\*\*\*\*BUF234\*NY\*\*\*A**
  - N10\*50\*WIDGETS,FINELY GRAINED\*\*\*\*L\*2000\*BOX
  - N10\*\*SOLID STEEL
  - SE\*18\*987654321
  - GE\*2\*987654321
  - IEA\*1\*023182086
- **Note: Segment Terminator is implied**





# Alternative Scenario 1: 353 Set Customs Events Advisory Details

- ISA\*00\*            \*00\*            \*02\*XXXX            \*ZZ\*CBP-ACE-TEST \*
- 040704\*1000\*^\*00406\*023182086\*0\*P\*:
- GS\*SO\*XXXX\*CBP-DATA-TEST\*20040704\*1000\*987654321\*X\*004060USCBP
- ST\*353\*987654318
- M10\*XXXX\*T\*\*\* 2004070401\*TRUCK \*\*\*H\*\*\*6789
- P4\*0901\*07042004\*\*\*2330
- **M15\*Z\*2004070401\*07032004\*\*XXXX\*2130**
- SE\*5\*987654318
- GE\*1\*987654321
- IEA\*1\*023182086
  
- **Note: Segment Terminator is implied**



# Scenario 2: 309 Set

## Preliminary Bill, No Trip

- ISA\*00\* \*00\* \*02\*XXXX \*ZZ\*CBP-ACE-TEST \* 040704\*0930\*^\*00406\*023182084\*0\*P\*:
  - GS\*SO\*XXXX\*CBP-DATA-TEST\*20040704\*0930\*987654321\*X\*004060USCBP
  - ST\*309\*987654321
  - M10\*XXXX\*T\*\*\*SYSTEM\*TRUCK\*\*\*P\*\*\*3214
  - P4\*0901\*07042004\*\*\*2330
  - LX\*1
  - M11\*123456789101\*14094\*\*\*\*\*00\*HALIFAX\*\*XXXX\*\*\*\*\*K
  - N1\*SH\*HOSER ARTIFACTS LTD
  - N3\*751 YORKE ST
  - N4\*TORONTO\*ON\*987 1E6
  - N1\*CN\*GREATER BUFFALO WIDGETS CO
  - N3\*123 DEARBORN ST
  - N4\*BUFFALO\*NY\*14220
  - **VID\*NC**
  - N10\*100\*WIDGETS,FINELY GRAINED\*\*\*\*\*L\*2000\*BOX
  - N10\*\*SOLID STEEL
  - SE\*14\*987654321
  - GE\*2\*987654321
  - IEA\*1\*023182084
- **Note: Segment Terminator is implied**

358 Set Pending

353 Set Pending



U.S. Customs and  
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# Scenario 2: 358 Set

## Customs Trip Information Trip 1

- ISA\*00\* \*00\* \*02\*XXXX \*ZZ\*CBP-ACE-TEST \* 040704\*0935\*^\*00406\*023182088\*0\*P\*:
  - GS\*SO\*XXXX\*CBP-DATA-TEST\*20040704\*0935\*987654321\*X\*004060USCBP
  - ST\*358\*987654321
  - M10\*XXXX\*T\*\*\*2004070401\*TRUCK \*\*\*S\*\*\*2345
  - VEH\*\*AB123456789\*\*\*\*\*KEG123\*ON\*\*\*\*\*BT\*\*\*\*\*123456789
  - M7\*098765432\*987654321
  - NM1\*EJ\*1\*GRAHAM\*STEVEN\*R
  - DMG\*DB\*12251957\*M\*8\*CA
  - REF\*ACW\*X12345670\*\*CA
  - REF\*5K\*ON456789012\*ON
  - N3\*900 SASSAFRAS ST
  - N4\*ERIE\*PA\*01234
  - P4\*0901\*07042004\*\*\*2330
  - **VID\*OE\*\*\*\*\*I\*DD\*KEG345\*ON\*\*\*A**
  - **MBL\*XXXX\*123456789101\*30**
  - **VID\*OE\*\*\*\*\*I\*\*BUF234\*NY\*\*\*A**
  - **MBL\*XXXX\*123456789101\*45**
  - SE\*16\*987654321
  - GE\*1\*987654321
  - IEA\*1\*023182088
- **Note: Segment Terminator is implied**

309 preliminary already on file



U.S. Customs and  
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# Scenario 2: 353 Set

## Customs Events Advisory Details Trip 1

- ISA\*00\* \*00\* \*02\*XXXX \*ZZ\*CBP-ACE-TEST \* 040704\*1100\*^\*00406\*023182089\*0\*P\*:
- GS\*SO\*XXXX\*CBP-DATA-TEST\*20040704\*1100\*987654321\*X\*004060USCBP
- ST\*353\*987654318
- M10\*XXXX\*T\*\*\*2004070401\*TRUCK\*\*\*H\*\*\*8765
- P4\*0901\*07042004\*\*\*2330
- **M15\*Z\*2004070401\*07042004\*\*XXXX\*2130**
- SE\*5\*987654318
- GE\*1\*987654321
- IEA\*1\*023182089
  
- **Note: Segment Terminator is implied**



# Scenario 2: 358 Set

## Customs Trip Information Trip 2

- ISA\*00\* \*00\* \*02\*XXXX \*ZZ\*CBP-ACE-TEST \*
  - 040704\*1200\*^\*00406\*023182080\*0\*P\*:
  - GS\*SO\*XXXX\*CBP-DATA-TEST\*20040704\*1200\*987654321\*X\*004060USCBP
  - ST\*358\*987654321
  - M10\*XXXX\*T\*\*\*2004070501\*TRUCK\*\*\*\*S\*\*\*6745
  - VEH\*\*AB123456790\*\*\*\*\*KEG103\*ON\*\*\*\*\*BT\*\*\*\*\*123456789
  - M7\*098765433\*98765422
  - NM1\*EJ\*1\*SARANU\*SRINIVAS\*X
  - DMG\*DB\*01011957\*M\*8\*CA
  - REF\*ACW\*X12345670\*\*CA
  - REF\*5K\*ON456789013\*ON
  - N3\*900 SASSAFRAS
  - N4\*ERIE\*PA\*01234
  - P4\*0901\*07052004\*\*\*0830
  - **VID\*OE\*\*\*\*\*I\*\*KEG456\*ON\*\*\* A**
  - **MBL\*XXXX\*123456789101\*25**
  - SE\*14\*987654321
  - GE\*1\*987654321
  - IEA\*1\*023182080
- **Note: Segment Terminator is implied**



# Scenario 2: 353 Set

## Customs Events Advisory Details Trip 2

- ISA\*00\* \*00\* \*02\*XXXX \*ZZ\*CBP-ACE-TEST \*  
040704\*1210\*^\*00406\*023182083\*0\*P\*:
- GS\*SO\*XXXX\*CBP-DATA-TEST\*2004070\*1210\*987654321\*X\*004060USCBP
- ST\*353\*987654318
- M10\*XXXX\*T\*CA\*\*2004070501\*TRUCK\*\*\*H\*\*\*9056
- P4\*0901\*07052004\*\*\*0830
- **M15\*Z\*2004070501\*07042004\*\*XXXX\*2200**
- SE\*5\*987654318
- GE\*1\*987654321
- IEA\*1\*023182083
  
- **Note: Segment Terminator is implied**



# Scenario 1: 309 Set In-bond Complete Manifest

- ISA\*00\* \*00\* \*02\*XXXX \*ZZ\*CBP-ACE-TEST \*
- 040704\*2300\*^\*00406\*023182082\*0\*P\*:
- GS\*SO\*XXXX\*CBP-DATA-TEST\*20040704\*0930\*987654321\*X\*004060USCBP
- ST\*309\*987654321
- M10\*XXXX\*T\*\*\*2004070401\*TRUCK\*\*\*W\*\*\*0043
- **VEH\*\*\*\*\*1234567890\*AID\*A**
- **CII\*TRANSPORTERS\*A12345\*2004\*50000**
- **NM1\*EJ\*1\*\*\*\*\*A7\*1234567890**
- N3\*900 SASSAFRAS ST
- N4\*ERIE\*PA\*01234
- P4\*0901\*07042004\*\*\*2330
- LX\*1
- M11\*123456789101\*14094\*\*\*\*\*00\*HALIFAX\*\*XXXX\*\*\*\*\*K\*DS
- **N9\*8S\*073090112**
- N1\*SH\*HOSER ARTIFACTS LTD
- N3\*751 YORKE ST
- N4\*TORONTO\*ON\*987 1E6
- N1\*CN\*NEW JERSEY WIDGETS CO
- N3\*123 GARDEN STATE PKWY
- N4\*NEWARK\*NJ\* 012345
- N1\*CB\*CHEATUM AND HOWE\*BF\*073
- N3\*101\*FRONT ST
- N4\*BUFFALO\*NY\*14207-4207
- PER\*IC\*\*EM\*CHEATHOWE@BROKERSCAPE.COM
- M12\*61\*\*4601\*\*\*\*\*Y\*\*A123
- VID\*OE\*\*\*\*\*I\*\*\*\*KEG345\*ON\*\*\*A
- M7\*09876543
- N10\*50\*FLAMMABLE LIQ FLASH POINT 32 F\*MADE IN INDIA\*J\*4054567891\*250000\*L\*1000\*CAN
- N10\*\*STAY FAR AWAY
- VID\*OE\*\*\*\*\*I\*\*\*\*BUF234\*NY\*\*\*A
- M7\*01234567
- N10\*50\*FLAMMABLE LIQ FLASH POINT 32 F\*MADE IN INDIA\*\*\*\*L\*1000\*CAN
- N10\*\*STAY FAR AWAY
- H1\*X123\*\*\*\*KIRAN GOWDA\*\*\*\*TE\*7036681234
- SE\*35\*987654321
- GE\*1\*987654321
- IEA\*1\*023182082



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- **Note: Segment Terminator is implied**





# Scenario 3: 353 Set

## Customs Events Advisory Details

- ISA\*00\*        \*00\*        \*ZZ\*CBP-ACE-TEST \*02\*XXXX        \*040714\*1300\*^\*023182081\*0\*P\*:
- GS\*SO\*XXXX\*CBP-DATA-TEST\*20040714\*1300\*987654321\*X\*004060USCBP
- ST\*353\*987654321
- M10\*XXXX\*T\*\*\* 2004070401\*TRUCK \*\*\*H\*\*\*0043
- P4\*0901\*07042004\*\*\*2330
- **M15\*2\*123456789101\*07142004\*\*XXXX\*2330**
- SE\*5\*987654321
- GE\*1\*987654321
- IEA\*1\*023182081
  
- **Note: Segment Terminator is implied**



# Scenario 3: 350 Set Customs Status Information

- ISA\*00\*        \*00\*        \*ZZ\*CBP-ACE-TEST \*02\*XXXX        \*        040714\*1305\*^\*023182090\*0\*P\*:
  - GS\*SO\*CBP-DATA-TEST\*XXXX\*20040714\*1305\*987654321\*X\*004060USCBP
  - ST\*350\*987654321
  - M10\*XXXX\*T\*\*\*200407401\*TRUCK\*\*\*W
  - **X4\*123456789101\*\*\*100\*01\*12012345678\*07042004\*2302\*1C\*\*XXXX\*\*\*4601\*\*\*\*\*4601**
  - SE\*4\*987654321
  - GE\*1\*987654321
  - IEA\*1\*023182090
- **Note: Segment Terminator is implied**



# UN/EDIFACT Standard Manifest

Karen Henderson, CBP



U.S. Customs and  
Border Protection

# UN/EDIFACT Standard Manifest

## Messages transmitted to CBP:

- Customs Cargo Report (CUSCAR)
- Customs Conveyance Report (CUSREP)
- Passenger List (PAXLST)

## Messages transmitted from CBP

- Customs Response (CUSRES)
- Functional Acknowledgment (CONTRL)



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# UN/EDIFACT Standard Manifest

## Components

- Trip identifier
- Conveyance (identifiers or details)
- Crew/passenger (identifiers or details)
- Equipment (identifiers or details)
- Shipment (identifiers or details)



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# UN/EDIFACT Standard Manifest

	<b>CUSCAR</b>	<b>CUSREP</b>	<b>PAXLST</b>
▪ Trip identifier/arrival date	Yes	Required	Required
▪ Conveyance details	Yes	Yes	No
▪ Crew Passenger			
▪ Identifiers	Yes	Yes	Yes
▪ Details	No	No	Yes
▪ Equipment details	Yes	Yes	No
▪ Shipment			
▪ Identifiers	Yes	Yes	No
▪ Details	Yes	No	No



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# UN/EDIFACT Standard Manifest

## Manifest EDI Submission Options

### Option 1:

- Original manifest (trip and shipments) via the EDIFACT set CUSCAR “Customs Manifest”

### Option 2:

- Preliminary shipments via CUSCAR
- Trip via EDIFACT message set CUSREP “Customs Trip Information” with shipments listed in Segment Group 3

### Option 3:

- Preliminary shipments via CUSCAR with trip number in BGM segment
- Trip via CUSREP



# UN/EDIFACT Standard Manifest

## Manifest EDI and ACE Secure Data Portal Submission Options

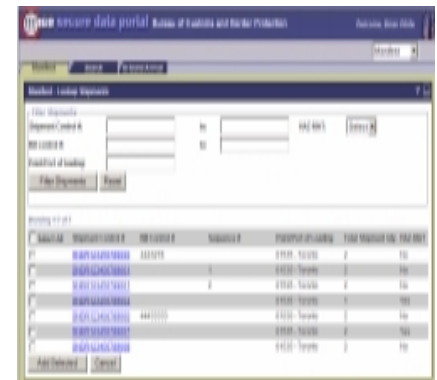
### Option 1:

- Preliminary shipments via CUSCAR
- Create trip on ACE Secure Data Portal
- Locate and link shipments on ACE Secure Data Portal



### Option 2:

- Preliminary shipments via CUSCAR with trip number in BGM segment
- Update trip on ACE Secure Data Portal



### Option 3:

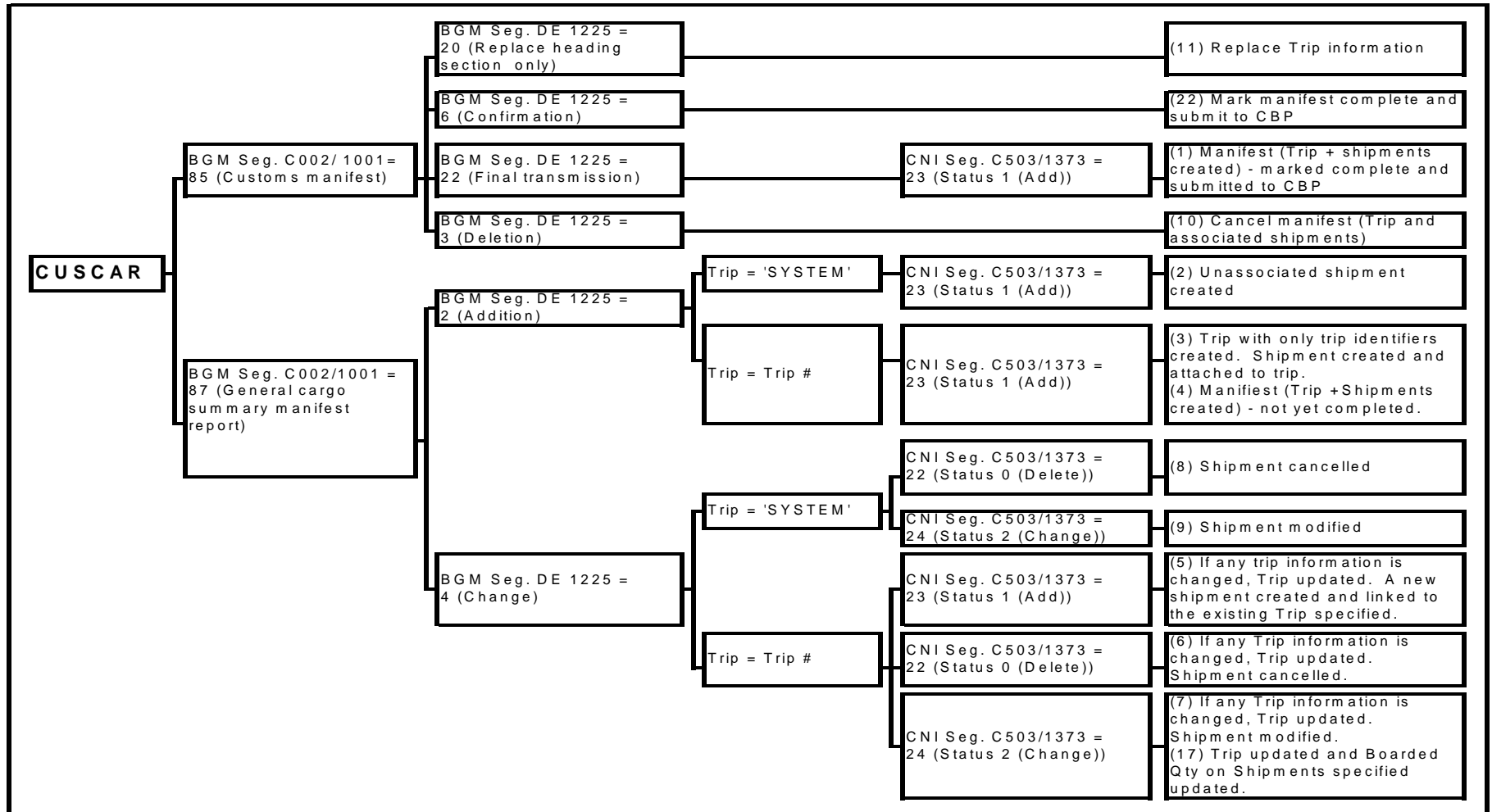
- Preliminary shipments on ACE Secure Data Portal
- Trip via EDIFACT message set CUSREP with shipments listed in Segment Group 3





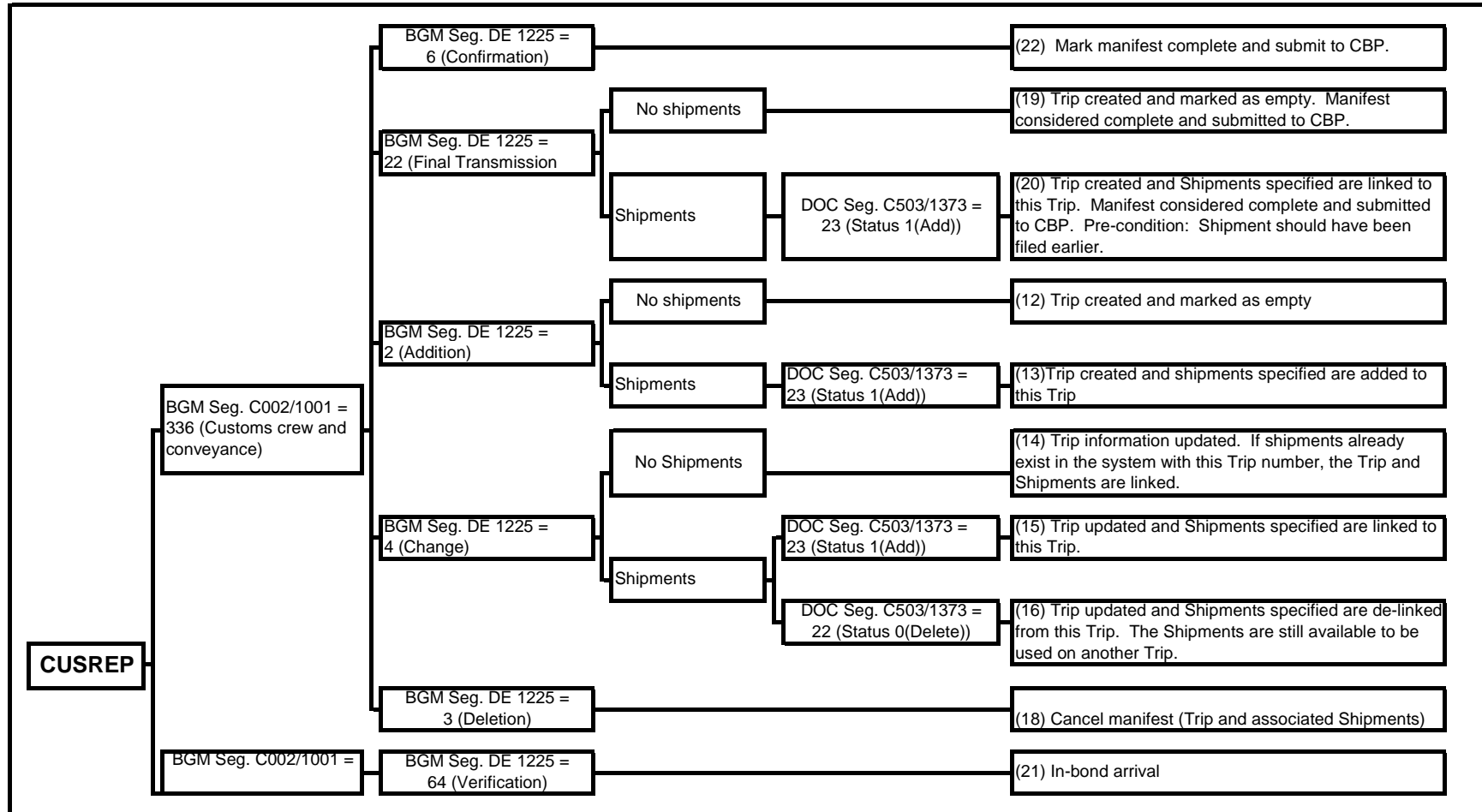
# UN/EDIFACT Functionality

## CUSCAR



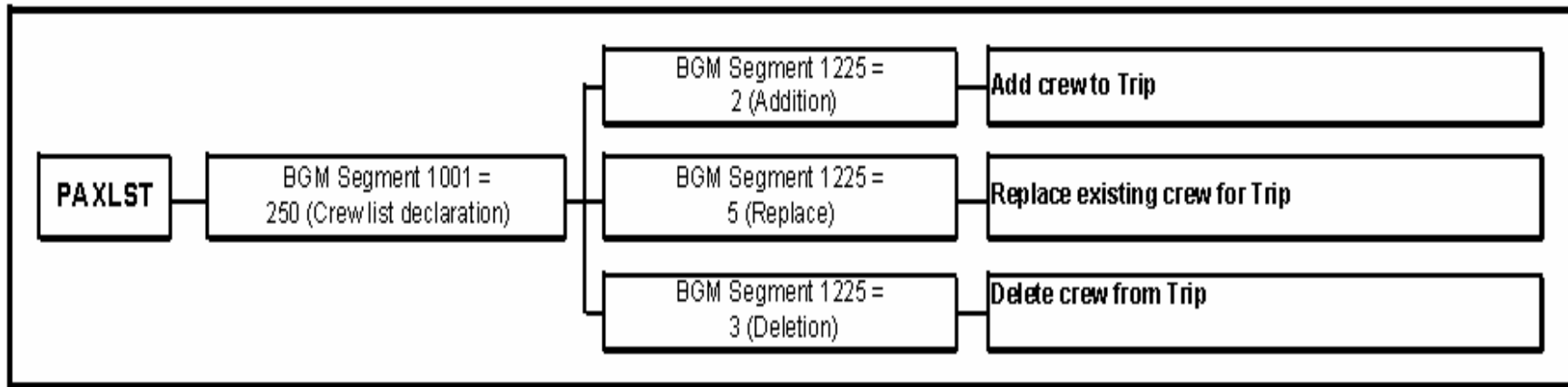
# UN/EDIFACT Functionality

## CUSREP



# UN/EDIFACT Functionality

## PAXLST



# UN/EDIFACT Standard Manifest

## Rough equivalents ANSI X.12 v. UN/EDIFACT

### ANSI X.12

- 309
- 358
- 353
- 997
- 355
- 350
- 309/358

### UN/EDIFACT

CUSCAR  
CUSREP  
CUSCAR or CUSREP  
CONTRL  
CUSRES  
CUSRES  
PAXLST



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# Sample CUSCAR

Pos.	Example	Description
0010	UNH+TRADE12345+CUSCAR:D:03B:UN'	
0020	BGM+85+XYZU04180001+22'	Complete manifest submission Trip=XYZU04180001
0030	DTM+132:200406281300:203'	Arrival date/time: 6/28/04,1 pm EDT
0040	LOC+60+2304:77:111'	Port of arrival = Laredo, TX (2304)
0070	RFF+ABO:LAR04180001'	Transmission reference number
0100	NAD+CA+XYZU;109:182'	Carrier code = XYZU
0100	NAD+VW+CREW654321'	ACE id for responsible party
0170	TDT+11++03+TR+++142BGH:215:111'	License plate = 142BGH
0180	LOC+89+TX:163:5'	License plate registration = TX
0210	EQD+FL'	Equipment is a trailer
0326	RFF+ABZ:ZZP5682'	Trailer license plate 1 = ZZP5682
0327	LOC+89+TX:163:5'	Trailer license plate registration 1 = TX
0326	RFF+ABZ:4458SP2'	Trailer license plate 2 = 4458SP2
0327	LOC+89+AZ:163:5'	Trailer license plate registration 2 = AZ
0210	EQD+4B+XYZL9823543'	Container number = XYZL9823543
0260	SEL+2QP456985221'	Seal number
0350	CNI+1'	
0370	RFF+ICO:XYZU230404180025'	Waybill # = XYZU230404180025
0410	LOC+9+97119:277:310'	Port of loading, Inland Schedule K
0540	NAD+OS+++NUEVO LAREDO SUPPLIERS+HIDALGO 6532+NUEVO LAREDO+TM:163:5++MX'	Shipper name and address
0540	NAD+CN+99-9999999AA'	Consignee's EIN number
0580	CTA+IC'	
0590	COM+1800555555:TE'	Consignee's contact phone number
0640	GID+1'	
0650	PAC+200++CAS'	Quantity: 200 cases
0670	FTX+AAA+++WOODEN GIZMOS'	Commodity description
0680	MEA+AAI++K:2672'	Item gross weight = 2672 kilos
0700	SGP+ XYZL9823543'	Container in which goods are packed
0720	PCI++QUALITY GIZMOS IN A DIAMOND CASES NUMBERED 001 THROUGH 200'	Marks and numbers
0890	UNT+30+ TRADE12345'	



# Test and Validation

Elizabeth Phillips



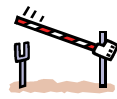
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**e-Manifest: Trucks (Release 4)**

Unit Testing

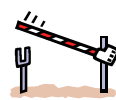
SWIT: Software Integration Testing (Spring 04)

SIT: System Integration Testing (Spring 04)



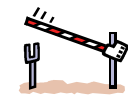
TRR: Test Readiness Review (Summer 04)

SAT: System Acceptance Testing (Summer 04)



PRR: Production Readiness Review (Fall 04)

UAT: User Acceptance Testing (Fall 04)



ORR: Operational Readiness Review (Winter 04/05)

**Limited Trade Samples**

**Pilot Participants**

**Full Participation**

Dec./ Jan./ Feb./ Mar./ Apr./ May./ Jun./ Jul./ Aug./ Sep./ Oct./ Nov./ Dec./ Jan./ Feb



U.S. Customs and Border Protection 2004

2005

# EDI Test and Validation Plan

Patricia Young, eCP

Panelists:

Dale Wilson, CBP

Jim Wolford, CBP



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***Unrestricted***



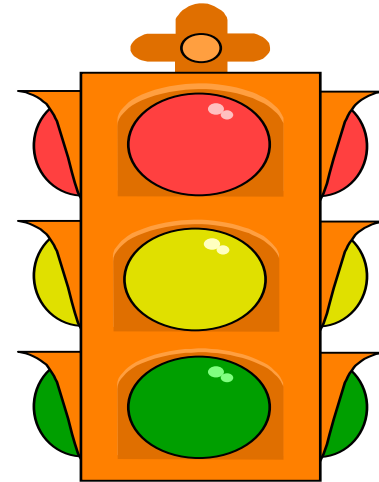
# Why is Test and Validation Necessary?

Electronic Data Interchange (EDI) testing and validation with the trade community is executed to ensure that software developed and used by the trade community properly interfaces with the Automated Commercial Environment (ACE) and provides accurate data in support of CBP business processes. The test also verifies a client's ability to properly send data to ACE as well as receive messages from ACE, using the developed software.



# Test and Validation

An ACE participant's computer system software design and hardware, etc. must be completely developed, implemented and ready to interface with ACE prior to the initiation of the testing process with CBP.



# Test and Validation

Getting Started.....



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# Test and Validation

## Letter of Intent (LOI) -

- A “letter of intent” must be submitted by the trade participant identifying their intent to automate and interface with CBP. It must be on corporate letterhead.
- It must also include information about their computer system requirements, their software vendor or provider, or if self-developer, and other details as noted by the CBP.



# Test and Validation

- The letter of intent is filed with the Client Representative Branch
- Once accepted and approved, allows for the assignment of a CBP Client Representative who works with the participant in support of their automation efforts.
- An ISA must be on file before communications are established



# Test and Validation

## The Client Representative:

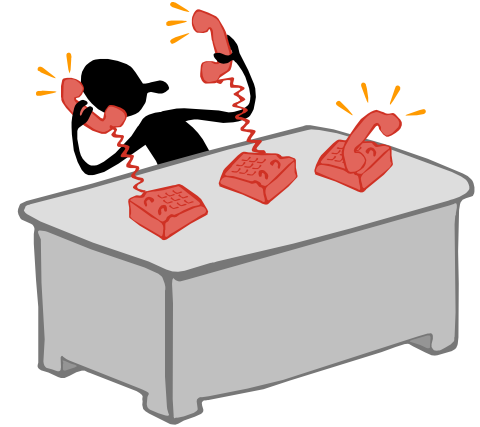
- is the primary CBP contact for the trade participant in their automation efforts; working with other CBP staff to prepare for the new testing partner
- provides support to the client throughout the testing phase, including communication attempts; assists in troubleshooting any errors
- acquires the specific system information about the software and interface protocol from the client, service provider or vendor
- identifies the type of testing required of participants, providing them with the appropriate test package



# Test and Validation

## Next Steps:

- The Client Rep will assist in securing the following for the trade participant:
- New communication profiles and queues established, as appropriate
- Queue name, etc. designated and provided for use by the participant for access to the Test and Certification Environment



# Test and Validation

These tests are administered to:

- Software developers and vendors
- Service providers (port authorities, service bureaus, etc.)
- Clients of the software vendors/service providers
- Clients (brokers, carriers, importers, etc.) developing their own application software
- *VANs (Value Added Networks) are subject to a communication test only*





# Test and Validation

## Test Package:

- The user test guide (test package) documents the series of scenarios required of the participant in order to pass the test
- The test scenarios cover a variety of situations to ensure the software is capable of dealing with a multitude of conditions



# Test and Validation

Types of tests:

- A long test will be administered to those participants developing software for ACE, be it for their own use or for distribution to the trade community
- A short test will be administered to those participants who have purchased a software package from an already tested ACE compatible software vendor or for those using a previously tested service provider



# Test and Validation

## Long Test:

- Is a comprehensive test package containing a variety of test case scenarios in an attempt to cover a multitude of CBP business processes
- Includes a communications test to ensure that connectivity is correct and appropriate
- Is administered to any developer of software to be used in the automated processes supported by CBP, including trade participants who are self-developers, software vendors who develop software for sale to trade participants and service bureaus/providers who develop their own software in support of trade participants



# Test and Validation

## Short Test:

- Is administered to trade participants using a vendor or software provider package
- Includes a communication test
- Is a subset of the long test

## Purpose of the short test is to:

- Demonstrate that a client can properly use the vendor's software package or service provider's system
- Verify the software program being used by the trade participant is the same version that was tested for this vendor



# Test and Validation

Steps required to pass each test scenario:

- A transmission of the EDI message must be sent and the appropriate response received without errors
- If an error message is received by the client, the client must identify the error and correct their software(or notify their vendor/software provider to do so) in order to retransmit the test scenario correctly



# Test and Validation

- The testing client continues to coordinate with the Client Representative for verification of their test results
- The Client Representative reviews all aspects of the transmitted EDI messages/transactions for correct and complete formatting, including optional fields, and troubleshoots problems as necessary



# Test and Validation

- Upon successful completion of the test, the CBP Client Representative authorizes the participant to progress to the status where they are permitted to transmit transactions to ACE in the production environment.
- The testing process must be repeated if the participant changes software packages, service providers, etc.



# Test and Validation

Upon completion of the extensive test by a Software Vendor:

- The company name is included on the list of software vendors maintained by the Client Representative Branch of CBP
- The Software Vendor (provider) list is available on the CBP web site and distributed to parties requesting information to become an ACE EDI participant







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