WCO Data Model Introduction

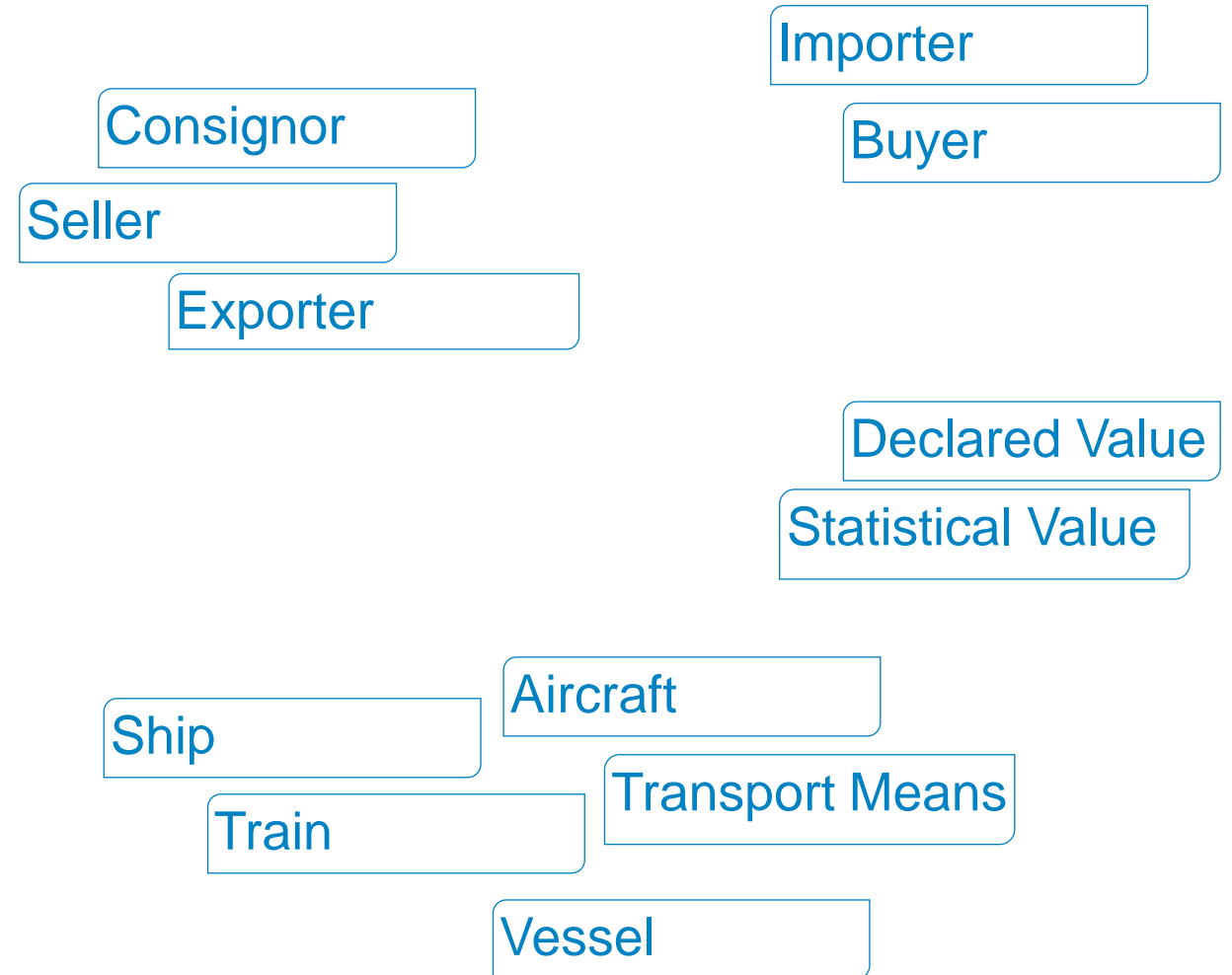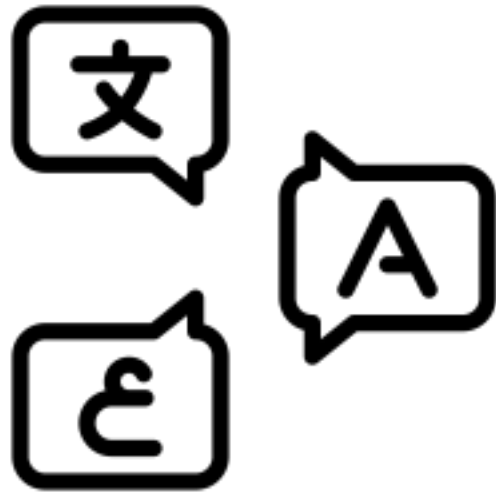**World Customs Organization**

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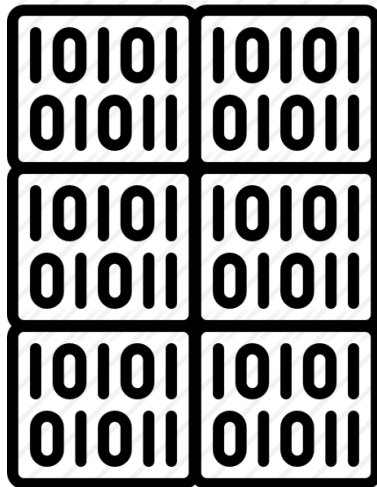**Workshop on Advancing Electronic Origin Data Exchange in APTA**

17 November 2021

Importer

Consignor

Buyer

Seller

Exporter

Declared Value

Statistical Value

Aircraft

Ship

Transport Means

Train

Vessel

Streamlining flow of goods and flow of information

WCO

Digitalization >> Standardization

Standardized dataset Standardized dataset   Standardized dataset Standardized dataset

Flow of Information

Flow of Goods

Competence Authority

Trader

Other Government Agencies

Customs

APPROVED
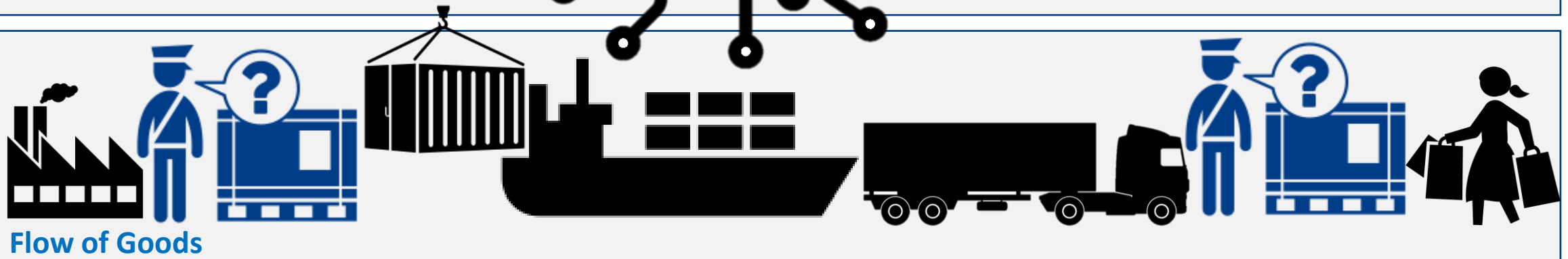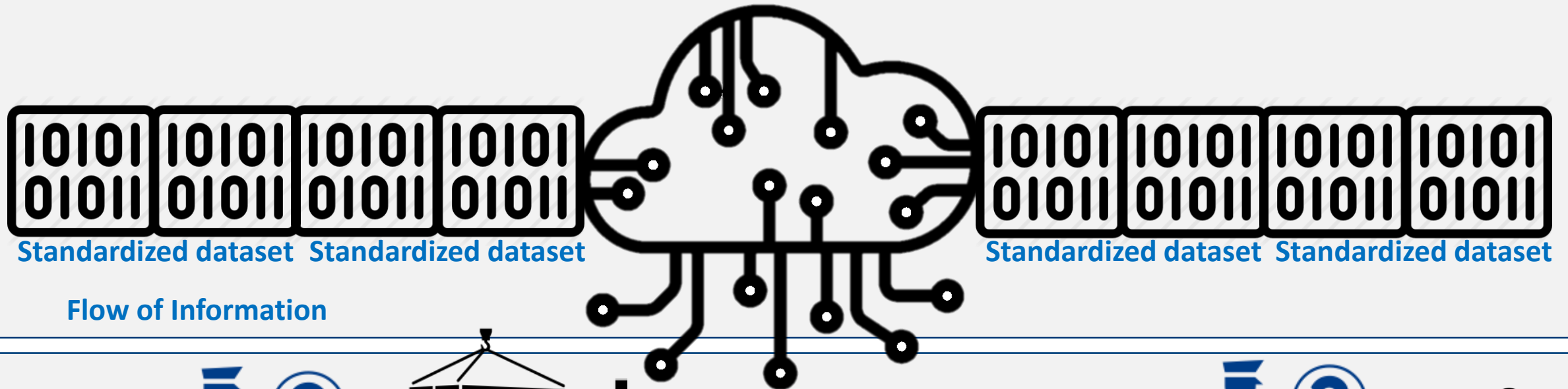
WCO DM Enables Single Window Environment

WCO Data Model: a blueprint for interoperability
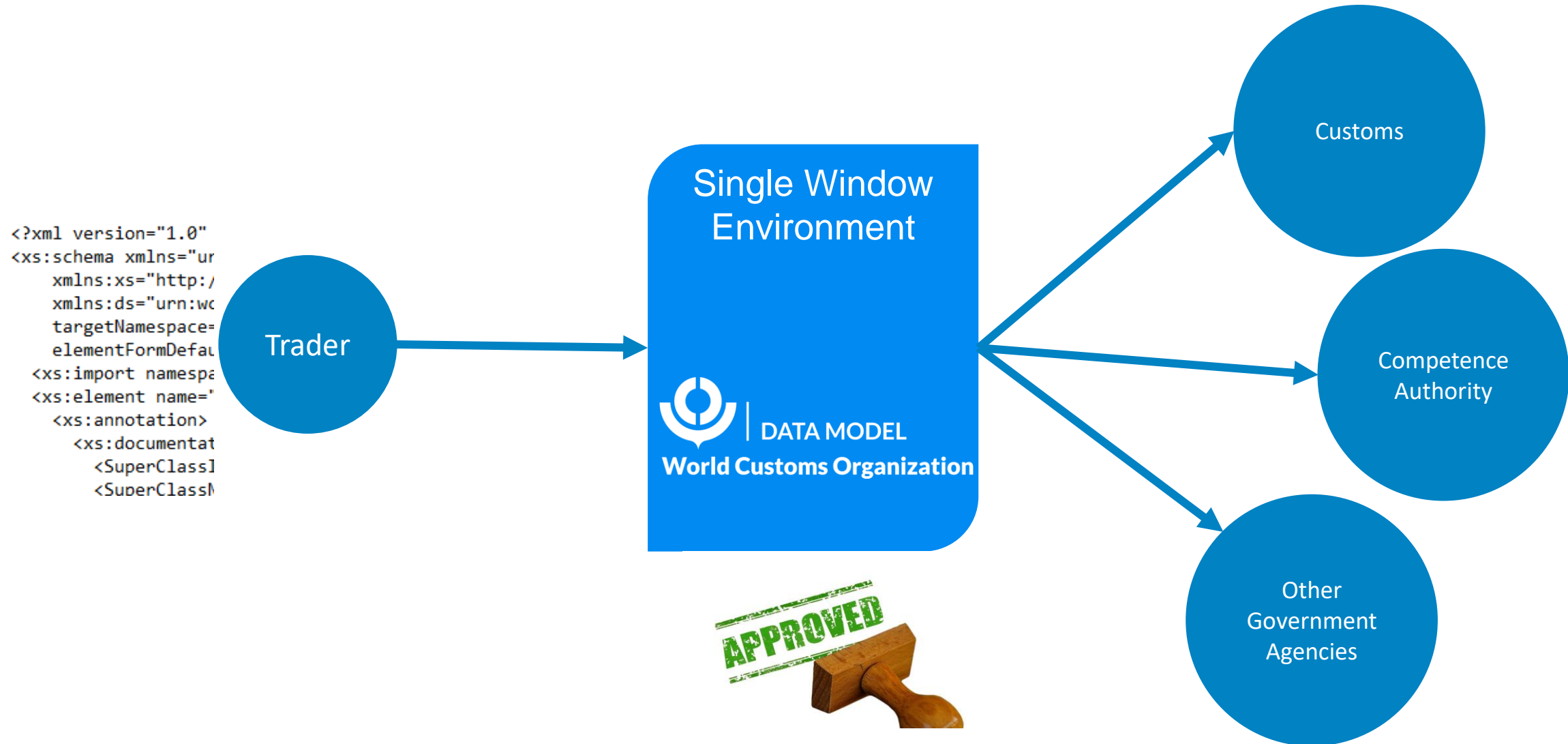
WCO DM:
A multipurpose frameworks for managing cross border regulatory data requirements

Information Packages:
subsets of WCO for a specific purpose

Base Information Package: A Broad categorization of data
- Declaration,
- LPCO
- INTERGOV
- Response

Derived Information Package
- A more specific subset of WCO DM based on a certain Legal Framework

My Information Package
- A National implementation of the WCO DM

WCO Data Model: Derived Information Package

MIP — NATIONAL IMPLEMENTATIONS

DIP
- Postal
- Single Administrative Doc
- Maritime
- Valuation
- Immediate Release
- Customs Dec (IM, EX, CR, TRT)
- Advance Electronic Information
- Advance Passenger Information
- Food safety
- Origin
- Temporary Admission
- Plant Protection
- Transit Guarantee
- Animal Health
- Cultural Object
- Conformity
- Customs to Customs exchange
- Transit Interconnectivity
- AEO MRA

BIP
- Declaration
- Response
- LPCO
- INTERGOV

Overall Information Structure

WCO DM Library

Inside the WCO Data Model: Data Library

WCO Data Model:
- Key reference that act as anchors for interoperability
  - WCO ID
  - WCO Name
  - WCO Definition
  - WCO Format representation
 - WCO Position ID
  - Recommended Code lists

ID	Class Path/Attribute Name	Class/Attribute Definition	Format	Code List
		WCO Data Model version 3.10.0 - Declaration Subset		
15A	Declaration/BorderTransportMeans	Details of the means of transport		
T019	Transport means operation type, coded	A code specifying the type of	an..3	User codes (e.g. IATA code list)
T005	Identification of means of transport	Name to identify the means of	an..70	
T006	Identification of means of transport crossing the border, coded	Identifier to identify the means of transport used in crossing the border	an..25	Sea: ITU Standard or Lloyd's number Air: IATA aircraft ID Road: national license plate Rail: locomotive number
T018	Type of identification of means of	The type of identifier of the means of	an..17	E.g. IMO, MMSI, Call sign, External
T010	Type of means of transport crossing the	Means of transport used for crossing	an..4	EDIFACT codes (8179) /
T014	Nationality of means of transport	Nationality of the active means of	a2	EDIFACT codes (8453)
T022	Mode of transport crossing the border,	Mode of transport used for crossing the	n1	EDIFACT codes (8067) /
T025	Movement type description, coded	Code specifying a type of transport	an..3	EDIFACT codes (8335)
172	Date and time of arrival at first port of arrival in Customs territory	Date and time / scheduled date and time of arrival of means of transport at	an..35	
150	Number of containers	Total number of freight containers or	n..6	
119	Number of Crew	Total number of the members of the	n..4	
156	Departure date and time	Date and time of departure of the	an..35	
029	Consignment unloading date time	Date and time the cargo was outturned	an..35	
085	First port of arrival, coded	To identify the first arrival location.	an..17	UN/LOCODE (an..5) + user code
132	Gross Tonnage	The measure of the overall size of a	n..14,3	
149	Conveyance reference number	To identify a journey of a means of	an..17	
207	Vessel length	Length of single vehicle expressed in	n..6	
206	Vessel draught level	Forward/after draught level in meters	n..5	
133	Net tonnage	The measure of the useful capacity of a ship determined in accordance with	n..14,3	
140	Number of Passengers	Total number of the passengers on	n..4	

- Coded values represent textual information in concise manner
- Reduce error of information
- Enhance standardization of information.

- Country Codes
- Currency Codes
- Container Codes
- Incoterms
- Date time format
- Location Code:

  e.g. **RKSI**

Implementing the WCO DM
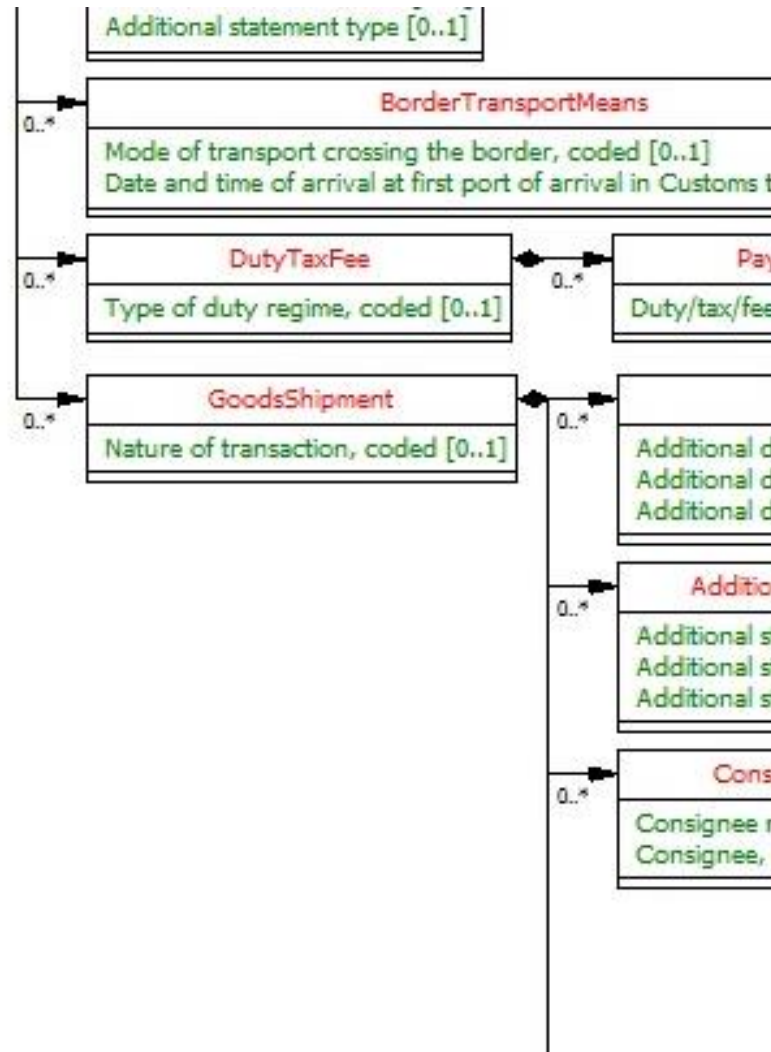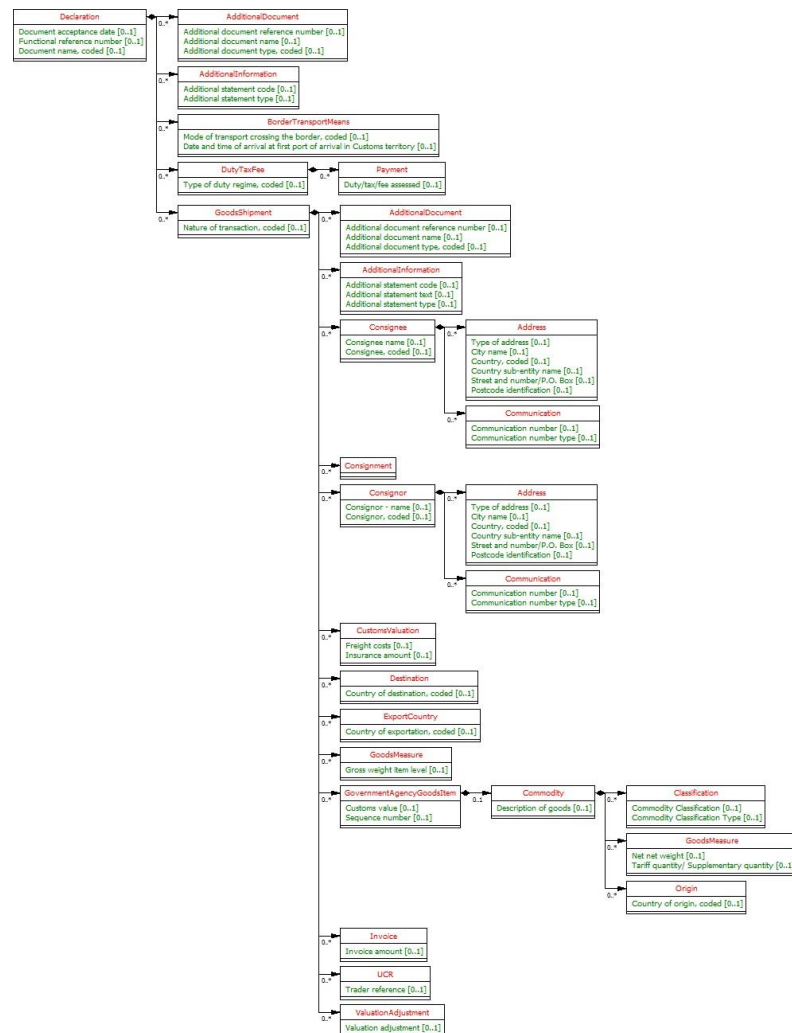
Step
- Identify the processes for which the WCO DM would be implemented
- Examining existing data requirements:
  - *Legal frameworks*
  - *Existing Systems*
  - *Paper forms*
- Harmonize existing data requirements
- Map national data requirements to the WCO DM
  - *Adjust national data requirements*
  - *Develop relevant ICT Systems*
  - *Submit Data Maintenance Request (DMR)*
  - Develop My Information Package (MyIP)

Possible Regulatory processes
- Import / Exports Declaration
- Cargo Management (Manifest)
- Transit interconnectivity
- **Electronic certification**
- Single Window
- Common Customs data exchange
- AEO MRA
- Advance Electronic Information

The role of the Data Model Projects Team (DMPT)

- Receive and process Data Maintenance Requests:
  - *To reject*, or to approve DMRs based on consensus + 2 Members support*
  - *(When DMRs are rejected, the DMPT will recommend the submitter to withdraw / defer the DMR)*
- The DMR should be submitted by Members 5 weeks prior to DMPT Meeting
- Changes to the WCO DM impacted by the DMR will be published as new version
- Submitters of the DMRs would be invited to help with the quality control of the changes

DMR Submitted to the DMPT
(English Only)

DMR from EU Customs DG (TAXUD)
WriteOff association - Request to open switched off object in Library for use in Declaration BIP

WCO LOG	
DATE	
User ref	EUTAXUD-21-001
User date	July 20, 2021

Originator	European Union (DG TAXUD DIH Team)
Contact person	DG TAXUD Unit B1 DIH
Email	taxud-b1-dih@ec.europa.eu
Phone	+32 2 29 71919
Data Set	Class Library
Attached documentation	∨ ● C PreviousDocument
	＞ ● A acceptance
	＞ ● A Document category, coded
	＞ ● A Previous document number
	＞ ● A Date of previous document
	＞ ● A Previous document type, coded
	＞ ● A Declaration line number previously recorded
	＞ ● C Authenticator
	＞ ● C InsuranceCompany
	＞ ● C Submitter
	∨ ● C WriteOff
	＞ ● A Writing-off quantity
	∨ ● C Packaging
	＞ ● A Number of packages
	＞ ● A Type of packages identification, code·
Business need/Justification	Request to open the following association in WCO Library
	WriteOff association at ConsignmentItem/PreviousDocument.
	All objects to be used for Export summary and Transit procedures.
	The request is based on the EU legal requirements as laid down in the COMMISSION DELEGATED REGULATION (EU) 2021/234 of 7 December 2020

Access to the WCO Data Model

http://wcoomd.org/DataModel

Tools: WCO Data Model eHandbook

Tools

WCO Data Model eHandbook
The eHandbook contains the technical documentation of the WCO Data Model versions.
read more

CLiKC! E Learning Module

WCO Data Model eHandbook

The WCO Data Model eHandbook is directed to IT managers and experts in Customs, other Regulatory Agencies, electronic business architects and the business sector. It provides an scope and objectives of the WCO Data Model, the data requirements and guidelines for mes implementation as well as other Implementation documentation.

The WCO Data Model eHandbook reflects the work that started in 1996 as the G7 Customs Simplification and Harmonization of Customs Procedures, and was transferred to the WCO expansion and future maintenance. The eHandbook includes the latest release of the WCO Guide contains all necessary information for harmonized message implementation and prov source of information for those involved in modelling and implementing cross-border proced electronic environment.

Versions

- Introduction

- WCO Data Model version 3.10.0

- WCO Data Model version 3.9.0

- WCO Data Model version 3.8.1

- WCO Data Model version 3.7.0

World Customs Organization

Thank you

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