WCO Data Model

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Technical Attaché
WCO ROCB
I. INTRODUCTION
About WCO

- Customs Co-operation Council in Brussels, Belgium, in 1952
- Independent intergovernmental organization
- 174 Member Customs administrations covering 98% of world trade
- Mission: Efficient and effective Customs
  - Rule and Standards setting
  - International co-operation, sharing information, Best practices
  - Capacity Building

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WCO Tools for TF

- Single Window
- Framework of Standards (AEO)
- Guideline on application of ICT
  - WCO Data Model, UCR
- Time Release Study, Risk Management Guide
- Integrated Supply Chain Management Guide
- Revised Kyoto Convention, Mutual Administrative Assistance,
  - Harmonized System, Rules of Origin, WTO Valuation,
  - Istanbul/ATA, Container Convention, etc.

Capacity Building

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II. BACKGROUND
Background to develop Data Model

- UN/EDIFACT (since 1987) is less popular among Customs administration
- Major Customs administration have started computerization late 70’s to early 80’s and no compatibility
- Economic Globalization and International Just-in-time production
- Increase in-house international trade
WCO Data Model History

- G7 mandate to simplify and standardize Customs procedures
- Latest G7 version became version 1 of the WCO Customs Data Model (2002)
- Supply chain security requirements ➔ Version 1.1 of the WCO Customs Data Model
- Version 2 of the Customs Data Model has been published end of 2005
- Development of Version 3 Data model June 2005
WCO Data Model components

- WCO Data Model – version 3.0
- XML Schemas / messages
- Other readers, Guidelines etc
- Message implementation guidelines
- International code standards
- Information models
- Harmonized maximum data sets
- Business Process Models
The Data Sets

- Maximum data in 11 data sets – for 11 different procedures – in total 253,450 data elements
- Based on the 2005 Edition of the UNTDED
- Detailed information about a single data element
<table>
<thead>
<tr>
<th>WCO ID</th>
<th>Name</th>
<th>Definition</th>
<th>Data model classes</th>
<th>Import</th>
<th>Export</th>
<th>Consequence</th>
<th>Transit</th>
<th>Response</th>
<th>Format</th>
<th>Code remarks</th>
<th>UID</th>
<th>Name</th>
</tr>
</thead>
<tbody>
<tr>
<td>149</td>
<td>Conveyance reference number</td>
<td>To identify a journey of a means of transport, for example voyage number, flight number, trip number.</td>
<td>BorderTransportMeans, TransitTransportMeans</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>an.17</td>
<td></td>
<td></td>
<td>8028</td>
<td>TransportMeans.Journey.Identifier</td>
</tr>
<tr>
<td>150</td>
<td>Number of containers</td>
<td>Total number of freight containers or similar unit load devices</td>
<td>BorderTransportMeans</td>
<td>X</td>
<td></td>
<td></td>
<td>n.6</td>
<td></td>
<td></td>
<td></td>
<td>8046</td>
<td>Consignment.TransportEquipment.Quantity</td>
</tr>
<tr>
<td>151</td>
<td>Equipment supplier type, coded</td>
<td>Code identifying a type of party that is the supplier of transport equipment.</td>
<td>TransportEquipment</td>
<td>X</td>
<td></td>
<td></td>
<td>n1</td>
<td>EDIFACT codes</td>
<td>8077</td>
<td>TransportEquipment.SupplierPartyType.Code</td>
<td></td>
<td></td>
</tr>
<tr>
<td>152</td>
<td>Equipment size and type identification</td>
<td>Code specifying the characteristics, i.e. size and type of a piece of transport</td>
<td>TransportEquipment</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>an.4</td>
<td>ISO, IATA, EDIFACT or user codes</td>
<td>8155</td>
<td>TransportEquipment.Characteristic.Code</td>
<td></td>
</tr>
<tr>
<td>154</td>
<td>Transport equipment loaded status</td>
<td>Code specifying how full a piece of transport equipment is.</td>
<td>TransportEquipment</td>
<td>X</td>
<td>X</td>
<td></td>
<td>X</td>
<td>n1</td>
<td>EDIFACT codes</td>
<td>8163</td>
<td>TransportEquipment.Fullness.Code</td>
<td></td>
</tr>
<tr>
<td>156</td>
<td>Departure date and time</td>
<td>Date and time of departure of the means of transport.</td>
<td>BorderTransportMeans, TransitDeparture</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>an.17[(CCYYMMDD HHMMSSS)]</td>
<td>2380</td>
<td>Date Or Time Or Period. Text</td>
<td></td>
<td></td>
</tr>
<tr>
<td>157</td>
<td>Container legal status indicator</td>
<td>Indication of the container's legal status with respect to the Container Convention.</td>
<td>TransportEquipment</td>
<td>X</td>
<td></td>
<td></td>
<td>n1</td>
<td>0 = no, 1 = yes</td>
<td>8193</td>
<td>TransportEquipment.LegalStatus.Code</td>
<td></td>
<td></td>
</tr>
<tr>
<td>159</td>
<td>Equipment identification number</td>
<td>Marks (letters and/or numbers) which identify equipment e.g. unit load device.</td>
<td>EquipmentIdentification</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>an.17</td>
<td>ISO 6346, IATA</td>
<td>8260</td>
<td>TransportEquipmentIdentifier</td>
<td></td>
</tr>
<tr>
<td>161</td>
<td>Previous government procedure</td>
<td>Code specifying the government procedure, if any, which has been applied to the goods prior to the application of a different government procedure.</td>
<td>GovernmentProcedure</td>
<td>X</td>
<td>X</td>
<td></td>
<td></td>
<td>an.7</td>
<td>For Customs: User codes, categorized based on the revised Kyoto Convention.</td>
<td>9033</td>
<td>Customs.PreviousProcedure.Code</td>
<td></td>
</tr>
<tr>
<td>162</td>
<td>Arrival confirmation indicator</td>
<td>Indicator that the start date of a customs control is confirmed or not.</td>
<td>Consignment</td>
<td>X</td>
<td></td>
<td></td>
<td>n1</td>
<td>0 = no, 1 = yes</td>
<td>7365</td>
<td>Processed.Indicator.Code</td>
<td></td>
<td></td>
</tr>
<tr>
<td>163</td>
<td>Party relationship, indicator</td>
<td>Indication as to the effect of relationship existing between two parties such as financial relationship.</td>
<td>CustomsValuation</td>
<td>X</td>
<td></td>
<td></td>
<td>n1</td>
<td>0 = no, 1 = yes</td>
<td>7365</td>
<td>Processed.Indicator.Code</td>
<td></td>
<td></td>
</tr>
<tr>
<td>164</td>
<td>Type of duty regime, coded</td>
<td>Code specifying a type of duty regime.</td>
<td>DutyTaxFee</td>
<td>X</td>
<td>X</td>
<td></td>
<td>X</td>
<td>an.3</td>
<td>EDIFACT codes</td>
<td>9213</td>
<td>Duty.Regime.Code</td>
<td></td>
</tr>
<tr>
<td>165</td>
<td>Seal number</td>
<td>The identification number of a seal affixed to a piece of transport equipment.</td>
<td>TransportEquipment</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>an.35</td>
<td></td>
<td></td>
<td>9308</td>
<td>TransportEquipment.Seal.Identifier</td>
</tr>
</tbody>
</table>
International Code Standards

Examples:

- WCO - The Harmonized System
- ISO 3166 - Country codes
- ISO 4217 - Currency codes
- ISO 6346 - Container codes
- UN/Rec. - No. 5 – Incoterms
- UN/Rec. - No. 16 – UN/LOCODE
- UN/Rec. - No. 20 – Units of measure
- UN/Rec. - No. 28 – Type of means of transport
- Wassenaar codes – Dual use goods
**Principles of CDM**

- **Kyoto Data Principles**
  - Maximum set
  - Minimum data requirements
  - Better data rather than more data

- **Maintenance procedures**
  - Strong business justification (reason why data is required to fulfill mission)
  - Required by at least more than one country

- **Context-, medium- and technology independent**
Scope Version 3.0

- Deferred DMRs from version 2.0
- Customs Transit
- Response messages (not only Customs)
- Ongoing alignment with CEFACT CCTS, UNTDED and to work towards the full engagement of trade/transport
- Review and resolve inconsistencies
- Partner Cross-Border Regulatory Agencies
  - Only processes directly related to the release of goods, means of transport and crew
    - at least health and agriculture (national and international)
  - No license/permit/certificate application/request/approval processes
Data Model, Benefits

- Enables the various information systems to work together in the most effective way possible
- Promoting safe and secure borders
- Offering authorised traders end to end premium procedures
- Contributing to rapid release
- Eliminating redundant and repetitive data
- Reducing the amount of data
- Reducing compliance costs
- Promoting greater Customs co-operation
Data Model, Benefits

✓ aligned export and import data requirements
✓ created a single electronic structure
✓ more effective exchange of information between export and import (export information reused at import)
✓ includes data requirements of other Cross-Border Regulatory Agencies

▷ Single Window environment
  ▷ traders to submit information only once
Image of Application of WCO Data Model

Seamless Data Flow
UNeDoc VS WCO Data Model

UNeDoc

B to B

Harmonization between Two Models

WCO Data Model

G to G

G to B

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THANK YOU

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