International Supply Chain Orchestration Domain

Background Information

Over the past decades, UN/CEFACT has developed a number of standards including business process models, XML schema and core components. The general overarching technical specification of the UN/CEFACT Modeling Methodology (UMM) was intended to guide much of this work. This guidance was useful for electronic messages which correspond to complete paper documents.

Today, data exchange is being conceived as snippets of information through event-driven data exchanges instead of exchanging complete ‘document’ equivalent messages. This is evident in projects such as the Reference Data Models, the Data Pipeline, Blockchain or Internet of Things. These new methods of data exchange require new methods of considering how these exchanges can work together and complement each other for a same transaction.

Scope

The scope of the international supply chain orchestration Domain is to support the efforts of all UN/CEFACT related projects to deliver their semantic specifications in a way that suits implementers of web platforms and pipeline /IoT projects as well as traditional document exchange projects. To achieve that, we will:

- Develop an architecture model that presents the Supply Chain Reference Data Model (SCRDM) and Multi-Modal Transport Reference Data Model (MMT) as a set of granular information resources with clearly defined state lifecycles.

- For each web resource, explore possibilities such as an Open API 3.0 specification that represents the resource as a RESTful API with JSON data payload and JSON-LD links to related resources.

- Explore the development of a standard event specification such as those based on W3C WebSub that will be used to exchange the event messages (aka “snippets”) that describe each state change in the web resource lifecycle.

Active Projects

- API Town Plan
- RDM2API

Related Deliverable