**Towards a Shared European Logistics Intelligent Information Space**

**April 2019**

**ALICE Collaboration Innovation Days**

**Logistics Information Spaces: From Data to Value - Brussels, 4th April 2019**

This was an informative and very interesting day attended by key SELIS representatives, the Project Manager, the Dissemination Manager and the projects' technical leads. The afternoon was devoted to AEOLIX and SELIS to talk through the major achievements made in each project as well as elaborating on the technical integration of the two information spaces that accommodated a joint business scenario.

The day started with a session on Logistics Data Sharing developments within the EU Public Authorities area and opportunities and challenges associated with data ownership in the shared spaces.

Blockchain technologies will become an important tool in the Supply Chain. ERTICO have set up an International Block Chain Group and ICONET (another H2020 project) has to research into the integration of Blockchain into Data Nodes as one of its deliverables.

**a) Data Sharing: Public Authority Initiatives**

There was an excellent overview of the EU Commission DG-MOVE vision and current work particularly on Regulation Reform to allow e-forms to be used, for example for data input to Customs, Tax Authorities, etc. Without this reform the "input the data once" principle becomes impossible.

DG-MOVE are looking for systems and platform architecture that will deliver:

- Single system entry point for companies
- Once only data entry
- Platform interoperability
- Decentralised ownership and maintenance of the data hub networks
- Data Trust and Security
- Reuse of existing standards in any new platform

The Dutch/Finnish/Spanish overviews raised similar issues, especially the legal issues. The Dutch have specified that they do not want one central system in The Netherlands.

### b) Data Sharing: Opportunities and Challenges

There are many questions still to be answered in addition to achieving the structural questions above:

- Will the systems be open or closed?
- They need to be 'plug and play'
- The data hubs must not write special code to communicate with a new operator.
- Data ownership needs clarification and the idea that people will need to pay for the data is not sensible
- However, data should only be used for the purposes it was published, eg these are my deliveries for today is information for the LSPs but it should not be aggregated by the hub and sold commercially so that competitive advantage can be gained

It is apparent that industry needs strong statements of comfort from the EU Commission concerning the sharing of data and what will constitute contravention of competition law and what will be encouraged to reduce waste in the Supply Chain through collaboration and pooling of data.

### c) Data Sharing: The New Generations of Platforms

AEOLIX and SELIS presented their projects; both are very similar and both have had mixed success. Both appear to have used simple scenarios to prove the node concept as the first/second stage in the journey to integrated data transfer nodes and both acknowledged the fact that there is much more to be done in this area.

AEOLIX and SELIS have made the nodes converse with each other. It is very clunky and the next 6-8 weeks are being used to improve the connectivity and the breadth of data transfer. But this is a key concept to prove operationally.

ICONET was also referred to and the connection to the Blockchain Group noted. Its use by SMEs to provide bolt on supply chain software and analytics was discussed.

### d) SELIS

A brief outline of the project centred on:

- Single Logistics Information Space for collaborative intelligence
- Fundamental architecture: Trusted and Secure Data
- USP: Unique Platform (open source coding) for sharing supply chain/logistics data
- Application Design Space: 26 Use Cases with project demonstrators, hopefully leading to commercialisation.
- Future Integration: Provides the data on which analytic solutions can be built
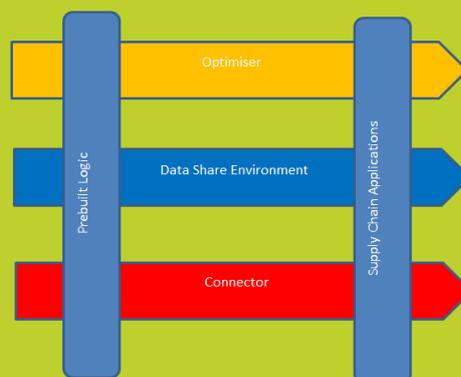
Next Steps:

- Use cases need to be completed and the concept results published
- Additional R+D will be needed to expand the innovation further
- The project results will form the foundation for commercial products, but the Governance standards need to be built first
- SELIS needs to raise market awareness of its thinking and readiness
- The component choice of Software as a Service (SaaS) will need definition and the ability to integrate with the data nodes provided

**e) AEOLIX**

Challenges:

- Operationally there are many data standards and definitions currently in use
- Within Companies there is a lack of connected systems
- Data ownership is an issue mainly down to a misunderstanding in Companies as to the data that really needs to be shared (with the companies they are probably sharing data with already)
- Lack of trust is driven by this mis-understanding
- Data security is an issue and strict rules for access and receiving data need to be ensured
- Fear of 'Big Data'
- Different business models between Companies

Next Steps:

- Build Communications Engine
- Build AEOLIX toolkits to allow integration of SaaS

**f) AEOLIX/SELIS Joint Platform**

A Demonstrator was shown exampling the basic data requirements and message transfers. The basic Ontology Map is being tested. The five data challenges are:

- Volume
- Velocity
- Variety
- Veracity
- Value

This is important on-going work as connection of decentralised data nodes will be key to the success of the digitisation of the Supply Chain

For more information on SELIS look at our website
www.selisproject.eu