

## Together against climate change: Flagship project for the implementation of the Physical Internet in Austria starts

*Within the next four years, applications in various industries will be tested. The project with Fraunhofer Austria as consortium leader started on Friday with a joint kick-off of the 17 project partners.*

The growing number of goods transports worldwide and their handling, which is usually resource-intensive, poses ever-increasing challenges for the environment and society. These must be met quickly and intelligently. One possibility for this is cooperative logistics and, subsequently, the Physical Internet. This is currently probably the most ambitious concept for efficiency and sustainability in transport logistics. It stands for a far-reaching reorganisation of freight transport and logistics. The 17 partners in the flagship project "PhysICAL" - Physical Internet through Cooperative Austrian Logistics – will create the necessary basis for Austria to implement the Physical Internet throughout the country. Amongst others, applications in four different sectors are being developed. In this way, it will be demonstrated that the Physical Internet brings an economic advantage to the Austrian transport industry and, at the same time, an ecological and socio-economic benefit to society. The project is funded by the Federal Ministry for Climate Protection as part of the RTI programme Mobility of the Future.

"I am pleased that 17 Austrian partners from the transport and logistics industry have come together to test the Physical Internet in practice on four specific pilots over the next four years. The Physical Internet promises not only to improve logistics efficiency by up to 30%, but also to reduce congestion, emissions and energy consumption by at least 30%. We therefore have high expectations here in terms of findings for shaping sustainable goods mobility," said Innovation Minister Leonore Gewessler.

While today goods are transported over long distances by individual transport service providers, in the future there will be fragmented, provider and carrier-independent transports. Intelligent containers, for example, will automatically find the most efficient route through transport networks. "Just as an e-mail automatically makes its way through the Internet from the sender to the recipient via several intermediate hubs, goods will in future independently make their way through transport networks," explains project leader Sandra Stein (Fraunhofer Austria). "They will make use of road, rail and waterways, but also different storage locations, depending on their needs, and always choose the most efficient route to the recipient," she adds. However, development work is needed before it can be deployed nationwide, such as the creation of open information systems such as platforms, or the further development of intelligent transport units. An important basis is a cooperative approach by all stakeholders, which must lead to a complete mindshift by all those involved.

These are precisely the steps that the partners in PhysICAL are planning for the next four years. Cooperatively used transport containers are being developed for the timber industry, for example. These are to be used in the Murtal and Lungau regions, where smart timber logistics will make it possible to shift around 30,000 of the current 100,000 tonnes of transport volume from road to rail. The pilot project in Graz also focuses on an intelligent container for parcel shipments. Instead of many CEP-service providers, a neutral fleet will deliver parcels in intelligent PI-boxes to central locations, in order to reduce traffic in inner-city areas and increase the quality of life.

Digital platforms, on the other hand, are the focus of the other two pilot projects: the first real trading house in the virtual world will enable manufacturing SMEs to participate in eCommerce. The joint handling of storage, transport and IT solutions will make successful sales via eCommerce independent of the size of the company. The fourth pilot will involve the development of an open transport management platform. This should simplify the booking of intermodal transport to such an extent that it can be carried out with just a few clicks.

The research leading to these results has received funding from the Mobility of the Future programme. Mobility of the Future is a research, technology and innovation funding programme of the Republic of Austria, Ministry of Climate Action. The Austrian Research Promotion Agency (FFG) has been authorised for the programme management. Project partners are the AIT Austrian Institute of Technology, Prime Mobility & Consulting GmbH, doppler E. Doppler & Co GmbH, 4PL Intermodal GmbH, Schrack Technik GmbH, Steiermarkbahn Transport und Logistik GmbH, Wiener Lokalbahn Cargo GmbH, A1 digital International GmbH, bitsfabrik GmbH, Cargo-Center-Graz Betriebsgesellschaft mbH & Co. KG, niceshops GmbH, Pro Danube Management GmbH, Project-S Global.Web.Shop GmbH & Co KG, Technische Universität Graz, Variocube GmbH, Stranzinger Logistik Service GmbH.