



Austrian Technologies for Hong Kong's Mobility Initiatives

Tuesday, 6th December 2022

















MARTIN DIRNWOEBER

MANAGER FOR DIGITAL TRANSFORMATION AUSTRIATECH

















Austrian Mobility Solutions

Martin Dirnwoeber, AustriaTech GmbH

About AustriaTech



- AustriaTech supports transformation and change processes in the context of traffic and mobility.
- The various aspects of transformation such as sharing, data access and management, drive technologies and much more are to be used effectively.
- The effectiveness of new technologies and related cooperations and partnerships are at the core of our activities.
- The focus is on sustainability, safety and efficiency. This is also intended to increase economic and social benefits and promote service orientation in mobility.



Basis for Mobility Solutions – Ecosystem of Platforms

- Graph Integration Platform GIP Reference system of Austrian public authorities for transport infrastructure data
- Basemap Official geodata of Austrian administrations
- EVIS.AT Real time traffic information for Austrian roads
- Mobility Association Austria Association of the seven public transport authorities in Austria
- VAO Traffic Information Austria comprising all modes



source: https://www.gip.gv.at/



source: https://basemap.at/

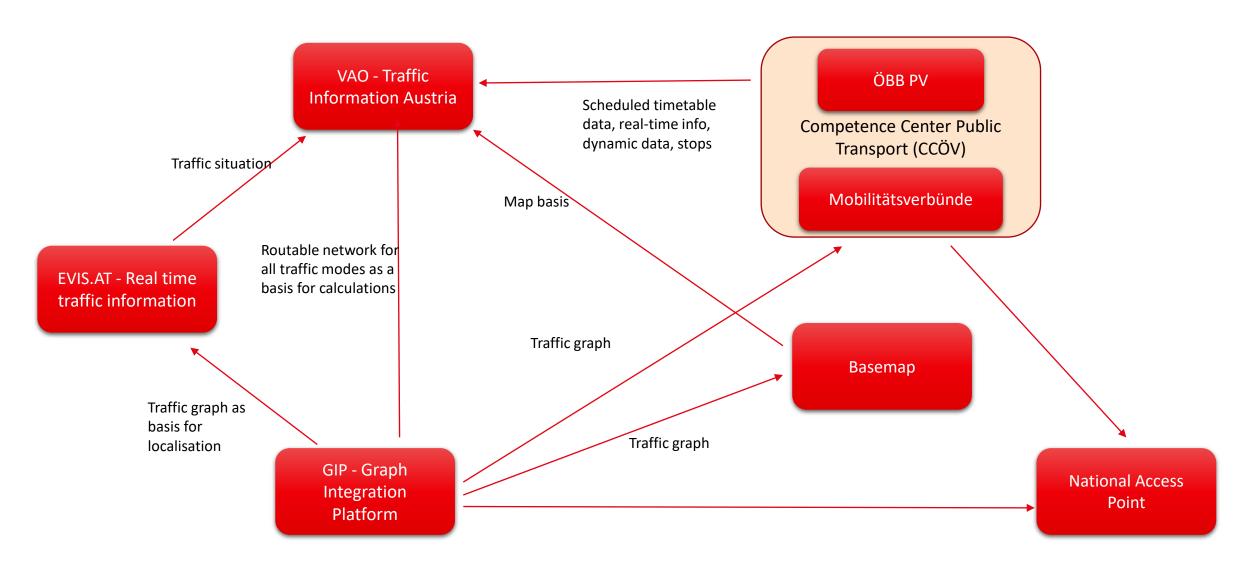








Information flow between the Platforms



Cooperative Intelligent Transport Systems



Interaction between infrastructure and vehicles to increase

- sustainability,
- safety,
- efficiency,
- capacity

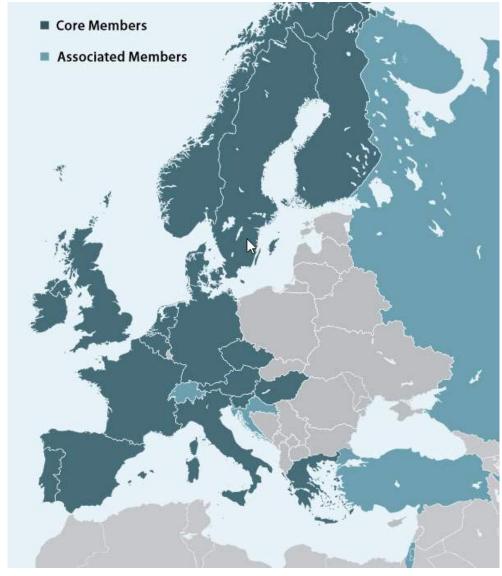
© AustriaTech

Open standards as key element

- for seamless services
- for independence from propriatary systems
- to accomplish better solutions

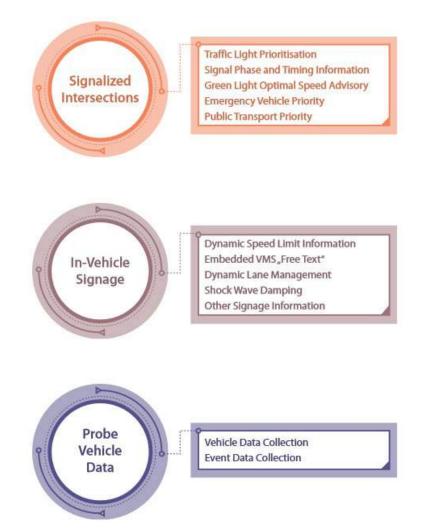
C-Roads Platform developed harmonised C-ITS specifications focus on I2V (Infrastructure-to-Vehicle) communication:

- Based on cooperation with the CAR 2 CAR Communication Consortium
- Form the basis for the roll-out of infrastructure driven C-ITS services
- First ITS-G5 Implementations are already operational in several C-Roads
 Platform Member States



Source: C-Roads Brochure 2021

Cooperative ITS Services





Source: C-Roads Brochure 2021



Road works and incidents

- ASFINAG: Deployment of 525 C-ITS units on 2.250 km of road network
- Deployment of mobile warning trailers
- Deployment of road operator vehicles (also able to send out road works information and emergency corridor messages)
- Implementing Day 1 services, first productive messages are road works and incidents (DENMs)
- MAP message for road works layout is in specification (planned to be finished in C-Roads until March)



Image from WikimediaImages on Pixabay



Traffic light cooperative ITS services

Implemented in several Austrian cities

- signal phase and timing
- prototyped in Vienna for Public Transport prioritisation
- used in Brno for emergency vehicles

Research and development:

- working towards transmitting mandatory messages
- using vehicle information CAM to adapt the traffic lights



Image from zerotake on Pixabay



Other cooperative ITS services



©Shutterstock estherpoon

Vulnerable Road User Warnings

- pilot implemented in Graz
- based on C-Roads specifications

UVAR – Urban vehicle access regulations

- goal: Facilitate the private, public and commercial use of UVARs.
- proof of concept that it is possible to transmit information via
 C-ITS is carried out currently in two cities
- further definition of messages: future topic, very important

Using vehicle data

- important element for cities
- planned to be tested and evaluated in the next years



Electromobility

- Implementation steps in the course of the Mobility Master Plan 2030
 - Elaboration of action plan + evaluation and achievement of objectives
- Development of measures for national implementation of AFIR (Alternative Fuels Infrastructure Regulation)
- Strongly improved networking of different stakeholder groups
- Entry into force of RVS 03.07.21 Charging infrastructure for e-vehicles in public spaces
- Amendment of the WEG (Residential Property Law)
 - Right to Plug strong improvement for installation of private charging infrastructure
- NEW: Exemption from payment in kind for charging company cars at home

Stay in touch!

austriatech.at/newsletter



linkedin.com/company/austriatech



@austriatech



austriatech



https://bit.ly/2QhMMkl



facebook.com/austriatech





Thank you!

Q&A

Martin Dirnwöber

T: +43 1 26 33 444 49

martin.dirnwoeber@austriatech.at

Contact

Raimundgasse 1/6 1020 Wien, Österreich F: +43 1 26 33 444-10 office@austriatech.at

T: +43 1 26 33 444