



1.400
RESEARCHERS

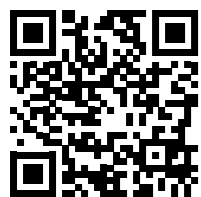
11 LOCATIONS

7 CENTERS

**AIT IS AUSTRIA'S LARGEST
RESEARCH UND TECHNOLOGY
ORGANISATION**



MORE ABOUT IMPACT



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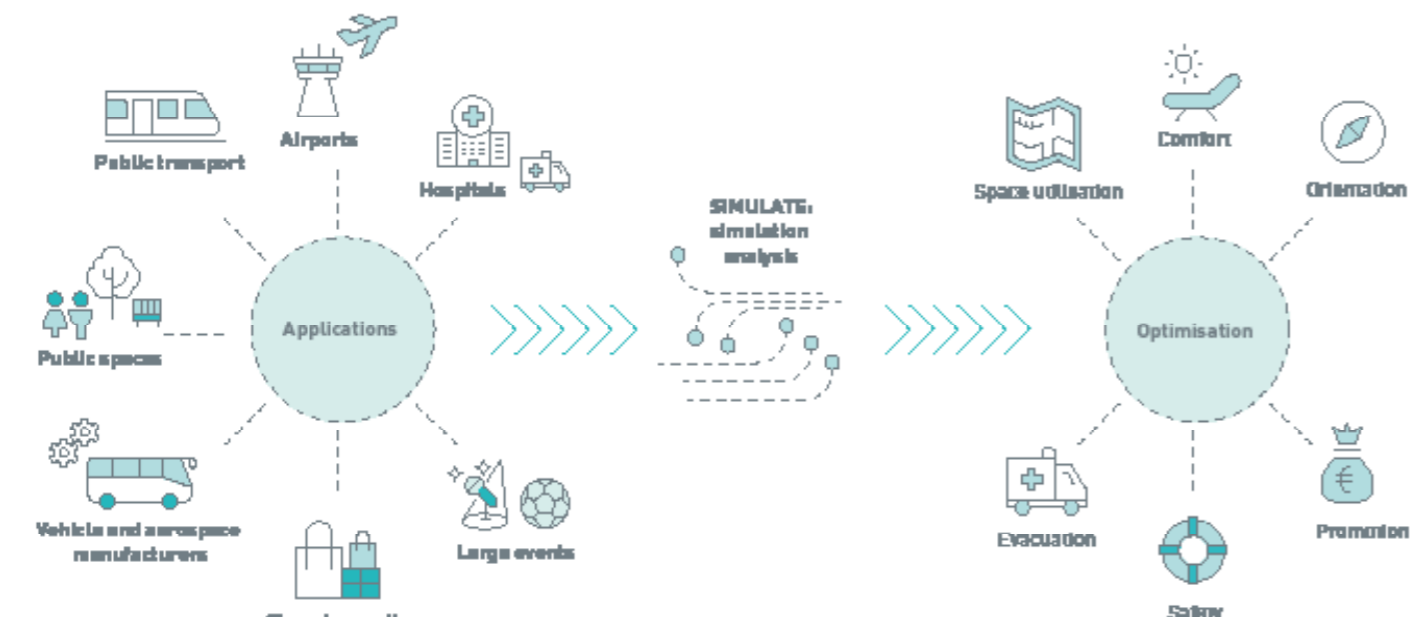
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IMPACT

Impact assessment of interventions
and new technologies in mobility systems

IMPACT: RE-DESIGNING MOBILITY SYSTEMS MORE EFFICIENTLY

Are you planning measures on the supply side? Are you expecting changes in demand? IMPACT analyses the impact of various measures in the transport sector so that they can be leveraged effectively by transport associations, infrastructure providers or planners. In this way, IMPACT makes an essential contribution to shaping the overall transport system of the future.



GROUP-SPECIFIC SURVEYS

Working with market researchers, we investigate the impact of planned traffic measures on the behaviour of people from affected target groups. We then analyse the results in relation to the social milieu and derive clusters in terms of behavioural and change processes.

MODELLING MOBILITY SCENARIOS

The IMPACT assessment considers the factors that lead to changes in the transport system. Examples include pricing structures, parking management, new public transport lines, road construction, and new technologies such as autonomous vehicles. We implement the mobility measures and the findings of the surveys in simulation environments and models and develop scenarios from them.

IMPROVED DECISION MAKING

The final impact assessment of the scenarios provides a sound basis for the selection of suitable interventions and approaches to optimise and increase transport efficiency. With IMPACT, we identify trends for future planning, achieve a high level of evidence and explanatory power of behavioural phenomena, gain knowledge about the cost-benefit ratio at an early stage and identify rebound and backfire effects.

“HUMAN-CENTERED” – IMPACT’S PARTICULAR VIEWPOINT

Every day, people use a wide range of different transport modes to get around different traffic routes. Each person decides individually, follows habits and experiences, and acts more emotionally than rationally in most situations. IMPACT distinguishes itself by its scientifically sound analysis of these individual processes and their integration into traffic models.



COMPREHENSIVE PICTURE FOR TRANSPORT MODELS

In models and simulations, IMPACT not only considers the overall transport system but also human aspects. Potential factors such as environmental influences, new technologies, changes in the transport infrastructure or transport safety issues are also included in the assessment.



TOOLS USED BY IMPACT

The AIT uses its own modelling elements such as a personalized trip-based survey tool and specific choice models, combining them with state-of-the-art tools such as mesoscopic, agent-based transport modelling tools (e.g. MATSim) and microscopic transport simulations.



THE BENEFITS OF IMPACT

- Reliable information on mobility interventions and their deciding impact
- Unique focus on the analysis of transport-related human behaviour
- Ideal cost-benefit ratio
- Impact assessment of new technologies for types of mobility
- Always at the cutting edge of technological progress

IMPACT APPLIED



- Analyses on the impact of innovative public transport systems in rural areas
- Assessment of modal shift potentials
- Investigations on the impact of autonomous vehicles on the transport system
- Effects of changes in the supply or demand sides of transport