Bringing intelligent vehicles to the road

Cost-Benefit Analysis

A cost-benefit analysis (CBA) is carried out, which is fully in line with the FESTA methodology. The CBA aims to assess the identified impacts and provide benefit-cost ratios from a societal perspective. The overall effects on society's welfare are determined by comparing monetised impacts, i.e. benefits, and costs to society in the style of investment theory.

The impacts of euroFOT highlight potential benefits in terms of road safety improvements, enhanced traffic efficiency, and reduced fuel consumption and emissions. Building on complex impact mechanisms, CBA intends to provide a condensed overview of the profitability of the considered systems from society's viewpoint.

For example, Adaptive Cruise Control (ACC) is designed to improve the longitudinal control of the vehicle in car-following situations. Deployed on a larger scale, ACC would increase road safety, harmonise traffic flow, and result in less travel time and higher fuel efficiency.

The CBA combines the identified impacts from the Field Operational Test with estimations regarding market conditions and economic resources needed to implement the systems. Given the European scope of euroFOT, the CBA results are embedded in an up-scaling framework that allows an estimation of potential benefits and costs for the EU-27 area.

SEVENTH FRAMEWORK PROGRAMME