



Background

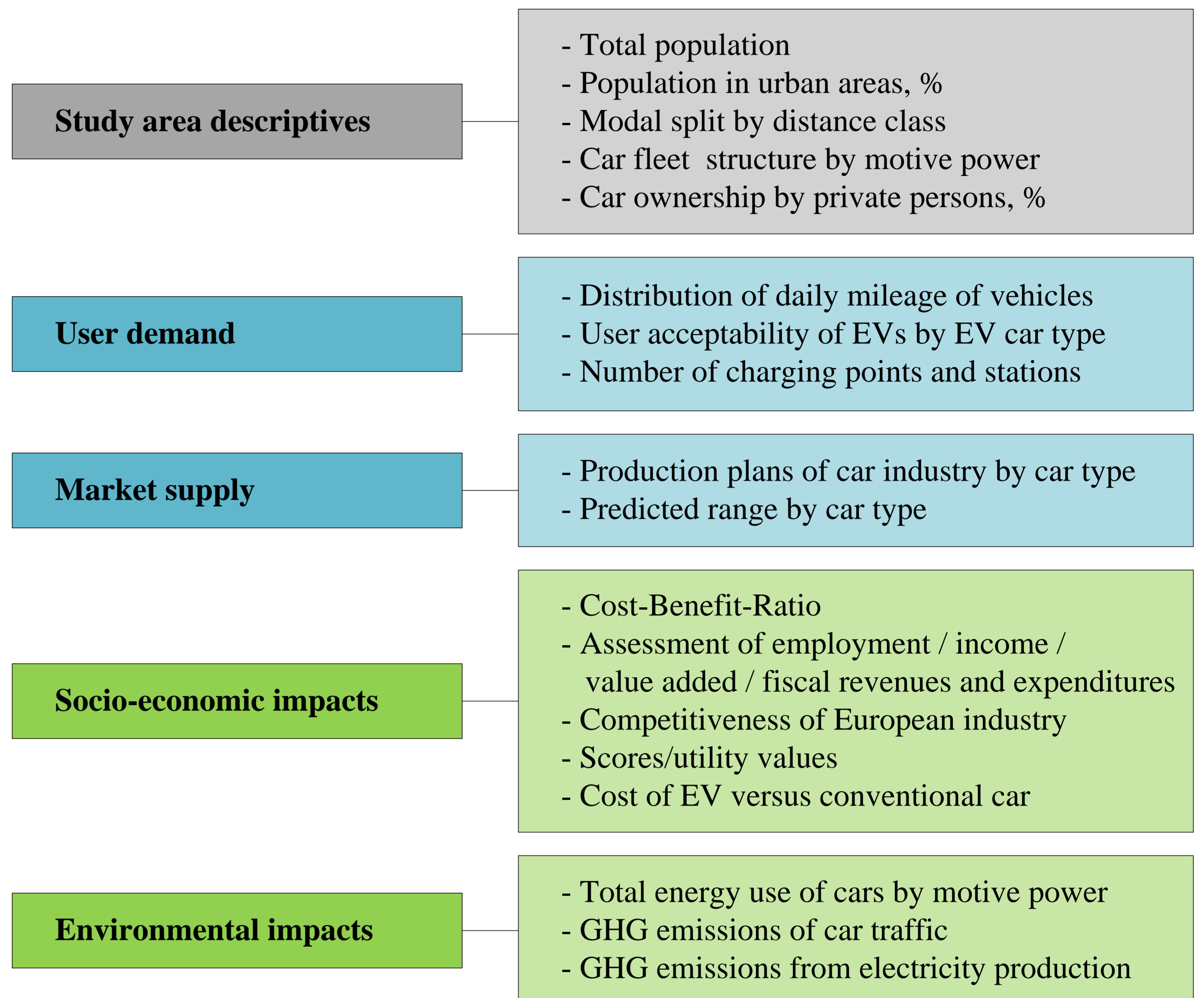
When addressing road transport induced greenhouse gas emissions and local air pollution, sustainable alternatives are needed to replace conventionally fuelled cars. Proposed and often complimentary solutions include energy efficient vehicles, hybrid technologies, electric powertrains, biofuels and modal shift to public transport, walking and cycling. User needs together with technology development, market preparedness and policies set the boundary conditions under which these sustainable solutions can be established.

Project eMAP

The eMAP** research project analyses the markets and deployment paths of electric vehicles with a time horizon until 2030. Scenarios are generated and assessed for user demand and market supply in Finland, Germany and Poland. The three national scenarios are conducted in a joined and harmonised conceptual approach that allows evaluation of evolution of electromobility on the European level in the end of the project.



Electric vehicles in the Netherlands



Key parameters of electromobility

First results

As an early outcome, the eMAP project has developed a framework and key parameters to evaluate deployment of electromobility. Evaluation criteria describe user demand, suitability, acceptability and market supply affecting the success of electric vehicles. In addition to the efficiency and environmental aspects of the transport system, also political, social, technological, economic and legislative aspects are covered with the target of capturing electromobility as one factor in sustainable transport.

Another early accomplishment of the project is the successfully completed consumer survey with the objective of learning about drivers' awareness of electric drives and their willingness to use and buy these cars. A total of 6 000 online interviews were conducted in the European Union region: 1 000 interviews in Finland, Germany and Poland each, and additional 3 000 interviews in the most populated 14 EU countries. The topics of the online questionnaire were:

- socio-demographic background of the consumer
- cars within the household and present car use
- decision making process in car ownership and use
- consumer attitudes towards electromobility
- impacts of policy and other measures to car ownership and electromobility.

The consumer survey revealed that presently only half of the drivers acknowledge electricity as a vehicle drive but an additional 40% recognized it after further information. Two thirds of drivers could consider driving and buying an electric or hybrid car in the future. The main obstacles are the present high price, information gaps and perceived unsuitability for the present mobility patterns of the user.

**The eMAP (electromobility – scenario based Market potential, Assessment and Policy options) research project (2012-2015) is realised under the trans-national call Electromobility+, where public funding from involved national and regional authorities is complemented by funding from the European Commission within the framework of ERA-NET Plus. <http://www.project-emap.eu/>