AUTO MOTIVES: UNDERSTANDING CAR USE BEHAVIOURS
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**Frank Goetzke** has been an assistant professor for urban economics in the School for Urban and Public Affairs at the University of Louisville, Kentucky, since 2006. His research focuses on transportation analysis and spatial modelling. He is especially interested in automobile ownership, public transit, non-motorized modes and traffic safety. Previously, he was an office manager for *WalkBoston*, one of the oldest and largest pedestrian advocacy group, a transit planner at the Central Transportation Planning Staff, which is part of the Boston Metropolitan Planning Organization, a travel demand forecasting modeller for Cambridge Systematics. Dr. Goetzke has a B.A. degree in political science and biology from the University of Bremen in Germany (1991), an M.A. degree in energy and environmental studies from Boston University (1996) and a Ph.D. degree in economics from West Virginia University (2006).

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Introduction

The idea for this edited volume emerged from a session on automobile behaviours at the 2009 Transportation Research Board Annual Meeting in Washington, DC. Some of its chapters are by authors who made presentations at this session. Other authors have been specifically invited to contribute in recognition of their long-standing research into a particular aspect of car-use behaviours, whilst others are relative newcomers to the field. Our list of contributors is far from exhaustive and we recognise that there are many other scholars involved in researching this subject with important things to say about it, many of whom we cite in the chapters that follow. Clearly, no book can include everyone, but it can also be difficult to identify scholars in relation to this topic. In part, because researchers working in this field come from a wide and diverse set of disciplinary backgrounds; while some are in regular dialogue with each other, others are less so and thus harder to locate.

As the title of the volume conveys, this book focuses on the factors that motivate automobile use. One of our key aims with this text has been to draw together and explain the diverse theoretical literatures that pertain to people’s auto motives and to consider these theories in light of current empirical research concerning the actual automobile decisions and behaviours of varied population groups, in different locations and circumstances and at different stages of their lives. We believe it to be a unique venture in this respect, particularly in that it purposefully seeks to avoid advocacy of a single perspective or methodological approach, but rather offers a set of broader insights into ‘what drives people to drive’.

This edited volume emerges in the context of a growing trend of auto-mobility worldwide. In many ways, increased popular access to private motor vehicles can be a positive trend. As a number of chapters in this volume will demonstrate, most individuals gain huge advantages from car-based travel in terms of increased access to key economic and social activities. In most contemporary societies, travel is now an intrinsic part of the way we live our lives and a large part of the popularity of automobiles is that they allow us to decide when and where we travel and to control our micro-environments while we do so. However, travel by automobile produces numerous negative externalities. While individual benefits of automobility continue to be observed and even reaped, the environmental and social cost of this is also increasingly apparent and there is considerable worldwide concern about the negative
effects of mass automobile use on the global and local environment, as well as the negative social effects of dependence on car-based transport systems.

This book takes a balanced view on these issues. Some chapters focus on the benefits of promoting increased automobile ownership and use particularly for less mobile sectors of the population; others focus on the importance of understanding auto motives in order to reduce our societal dependence on the car. In aggregate, the chapters demonstrate that the motivations for car use are both complex and varied and are usually the outcome of reciprocal interactions between ‘personal’ factors and ‘external’ circumstances.

The volume primarily is aimed at post-graduate students, researchers, policymakers and practitioners from a growing spectrum of disciplines with an interest in understanding the motivations and decision processes underpinning the public’s overwhelming preference for the car as the primary means of people-based movement. Its core arguments and narratives are presented in such a way so as to offer widespread appeal to a wide-ranging audience including social and environmental scientists, human geographers, behavioural economists, transport and land-use planners, and those working in the field of urban and community development both within and outside academia. The core focus of the book is empirical research into the auto motives of populations living in the United Kingdom, Europe, North America and Australia and so it does not directly address the rapid move toward car ownership and use in the developing world. Nevertheless, many of the key motivations it identifies will be equally and sometimes more relevant in development countries and we hope that the book may help policymakers in these contexts to identify more balanced solutions to personal mobility than has so far been achieved within the developed world.

Organisation of the Book

The volume is organised in three sections:

Section 1 is designed to offer a basic framework for understanding the empirical research studies that follow. Chapter 1 by Schwanen and Lucas sets the theoretical context for the book. It identifies the four core approaches that have been developed in different disciplines to explain people’s auto motives, namely accessibility and time geography, utility theory, socio-psychological theories and the new mobilities perspective. The chapter is based upon an extensive review and analysis of international literature across various academic disciplines, including transport studies, economics, human geography, psychology and sociology.

In Chapter 2, Jones builds on these various theories to offer an understanding of the nature and dynamics of car dependence. His chapter draws on the concepts and findings of a recent RAC Foundation for Motoring study, to explore the nature and meaning of ‘car dependence’, and how this becomes reinforcing over time. In particular, it seeks to explore whether car use is a matter of choice or constraint, and the conditions under which changes to driver behaviour would be feasible in order to make them more sustainable.
Chapter 3 builds on this second issue. Drawing on existing research, Weinberger and Lucas examine programs and policies that have motivated or have the potential to motivate changes in automobile behaviour.

In Sections 2 and 3 we turn to empirical research evidence to support or refute these theoretical explanations. These chapters are designed to allow the reader to explore in greater detail what motivates people to prefer their cars in practice.

Section 2 is primarily concerned with empirical analysis of the different theoretical perspectives on why people drive that are outlined in Chapter 1. First, in Chapter 4, Farber and Páez apply the principles of time-use geography to demonstrate how the spatial expansion of activity spaces over time, as a result of increased journey distances and car-based travel, has led to time budget constraints and associated reduced participation in discretionary, out-of-home activities for certain social groups.

In Chapter 5, Gaker and Walker demonstrate the use of concepts from behavioural economics, which integrates the fields of psychology and economics, to explain people’s transport choices. In particular they focus on three themes within this literature: the influence of biases, the power of information and feedback, and how we are influenced by the social norms of those around us.

Goetzke and Weinberger pick up these themes in Chapter 6, to explore how people learn travel behaviour habits and preferences from their own experiences and by observing their peers. They use discrete choice analysis and random utility modelling in their analysis of two datasets. Their first study, uses the 2000 United States Census Public Use Micro Sample (PUMS) to look at data on recent movers to United States, transit rich cities and the effect of previous residential location on the decision to own automobiles. Their second study looks at the impact of peer, or social network, effects on decisions to own cars in New York City using data from the 1998/1999 New York Regional Household Travel Survey.

Chapter 7 examines the social-symbolic aspects of car use. Gatersleben draws on her own socio-psychological studies of consumer behaviour to explore the relationship between materialism and attitudes, perceptions and behaviours in relation to the car. In line with existing research on materialism, these show that people who express stronger materialistic values are more motivated to own and use a car, particularly an expensive car, and attach more value to the social symbolic aspects of their cars and are less likely to want to reduce their car use.

Section 3 of the book explores some of the empirical research that has been developed to understand the auto motives of different sectors of the car-driving populations. Schwanen’s first chapter in this section focuses on the gender dimensions of car use in the everyday lives of well-educated middle-class men and women in the city of Utrecht in the Netherlands. He uses a mixed-method approach combining literature review, in-depth interviews and a questionnaire survey to identify gender differences in access to cars, household responsibilities and employment status, as well as the norms, discourses, practices and cultures of mobility.

In Chapter 9, Rosenbloom focuses on the transportation patterns of older drivers in the United Kingdom and the United States as a way to illuminate the motives underlying older people’s continued dependence on the car and their well-documented reluctance to cease driving. It concludes that, given the huge number
of older drivers who may need or wish to reduce driving, governments must not only take action to keep older drivers on the road safely for as long as possible, but also substantially expand their support of a variety of public transit, community transport and volunteer driver systems, as well as more effectively integrating transportation and land use and housing policies.

Chapters 10 and 11 both focus on the car-use behaviours of low-income populations in Australia. In Chapter 11, Currie and Delbosc examine often conflicting views about what motivates car ownership and use of low-income groups in the suburbs and whether this is effectively ‘enforced’ by their housing location. Their chapter is based on a household survey covering travel, housing location, life situation, social exclusion and well-being of household in the wider Melbourne region. Lucas’s chapter which follows focuses on the people living on or below the poverty line in the United Kingdom. It identifies the rapid growth in private vehicle use of low-income households over the last five years and considers whether this recent trend has emerged out of personal preference or practical necessity.

In Chapter 12, Blumenberg and Smart identify a similar strong and growing trend in the automobile use of immigrant populations in the United States. Using data from the US Census 2008 American Community Survey, the authors explore the multiple dimensions of immigrant automobile use in the United States: the factors that motivate their assimilation to automobiles, limit their use of automobiles and shape how they use automobiles.

In the final chapter of this section, Chatman and Klein expand on the themes of the previous chapter in their case study of the home and work location decisions of immigrants to the State of New Jersey. They analyse commuter mode choice data from the United States census to demonstrate how home/work location, as well as the occupations of immigrant workers, plays a role in their lower levels of auto reliance for commuting from that of the average US-born citizens.

The concluding chapter of the book draws together some of the key themes that have emerged out of the individual chapters. Importantly, the chapter identifies that the subject of this volume is likely to become increasingly important in the light of the challenge of a number of irreversible global trends, namely the increasing automobility of the developing world, diminishing natural and manufactured resources for road infrastructure to meet the growing demand for car-based travel, the rapidly changing age structure of the population and ongoing concerns about the social welfare of non-driving sectors of the population.

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Editors