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# Gender and mobility in the cardependent urban society of Muscat/ Oman

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# Abstract

This article aims at analysing women's possibilities in Muscat/Oman to participate in society by being mobile. Taking Muscat's highly diversified population into account, we included both Omani and Indian family households in a mixedmethods approach using predominantly qualitative interviews. As a result of the urbanisation and modernisation process of the last five decades, the Capital Area of Muscat today forms a linear urban corridor that extends over roughly 80 km. The specific spatial context of a fast growing and widely dispersed urban space, as well as a well-developed road infrastructure combined with a high availability of individual cars are the reasons why individual mobility is predominantly car-based. For the analysis of Omani and Indian women's mobility the concept of motility was chosen as theoretical framework. Considering the categories access, competence and appropriation, the concept offers a particular enlightening perspective for the case of Muscat, where the socioeconomic position as well as social norms and cultural restrictions play a decisive role in women's mobility.

# Zusammenfassung

Dieser Artikel hat zum Ziel, die Mobilitäts- und Partizipationsmöglichkeiten von Frauen in Muscat/Oman zu analysieren. Mit Blick auf die stark diversifizierte städtische Gesellschaft Muscats haben wir dazu sowohl omanische als auch indische Familienhaushalte in einem Mixed-Methods-Ansatz mit überwiegend qualitativen Interviews einbezogen. Als Ergebnis des Urbanisierungs- und Modernisierungsprozesses der letzten fünf Jahrzehnte bildet das Hauptstadtgebiet von Muscat heute einen linearen urbanen Korridor, der sich über etwa 80 km erstreckt. Der spezifische räumliche Kontext eines schnell wachsenden und eine große Fläche einnehmenden urbanen Raums sowie eine gut ausgebaute Straßeninfrastruktur in Kombination mit einer hohen Verfügbarkeit von PKWs in den Haushalten bilden den Hintergrund für eine überwiegend autobasierte individuelle Mobilität. Für die Analyse der Mobilität von omanischen und indischen Frauen wurde das Konzept der Motilität als theoretischer Rahmen gewählt. Unter Berücksichtigung der Kategorien *access, competence* und *appropriation* (Zugang, Kompetenz und Aneignung) bietet das Konzept eine besonders aufschlussreiche Perspektive auf den spezifischen räumlichen und sozialen Kontext von Muscat, wo die sozioökonomische Position sowie soziale Normen und kulturelle Restriktionen eine entscheidende Rolle für die Mobilität von Frauen spielen.

Keywords gender, mobility, motility, women, Muscat, Oman

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# 1. Introduction

When Sultan Qaboos ibn Sa'id Al Sa'id ascended to power in 1970, he initiated a modernisation process that also included integrating women into the process. Women in the Sultanate of Oman enjoyed rights and options to participate much earlier than in other Gulf States, e.g. with regard to education and work. When unveiling Oman's Basic Law in 1996, Sultan Qaboos mentioned in an interview that he is especially proud of the progress women had made between the 1970s and 1990s: "I congratulate myself for some things, such as the progress women have made. I never said you must do this or you can't do that. I offered services, such as education, and let the families decide. And more of them than I expected chose to accept schools for girls from the beginning. So we have been able to make progress and safeguard tradition" (Miller 1997: 17). The ongoing social change is of particular concern to young and middle-aged urban Omani women. Their marrying age has gone up, they tend to have fewer children and they work as lawyers, doctors, dentists, engineers, economists, bankers as well as university professors (Chatty 2000: 248).

Being able to participate in higher education and qualified work requires to be mobile. Especially in a car-dependent urban society like the Sultanate's capital Muscat, mobility is not possible without the competence of driving skills and access to a car. In contrast to Saudi Arabia, where women have only been allowed to get a driving license beginning in 2018 and where women's individual mobility has been extremely restricted (Le Renard 2014), women in Oman have had access to modern car-based mobility beginning in 1970, when asphalted roads were built and cars were imported. However, this is only true for Omani nationals. Male and female expats, except those from Western and Arab countries whose national driving licenses are valid in Oman, have to pass a rather expensive driving test in Oman. As can be expected under those conditions, car-mobility in Oman is unequally distributed among its residents. The mobility options for low-income migrant workers are rather restricted since they typically neither have the means to obtain a driving license nor a car. Instead, their mobility options are limited to the formal and informal public transportation, which has only recently begun to be developed.

Our focus here is on women's mobility options and we will concentrate on Omani and Indian women be-

cause Indian nationals constitute the largest group of foreign nationals in Oman. We explore the following questions: how do Omani and Indian women perceive existing mobility options (private car, taxi use, public transport, walking)? How do social and cultural norms as well as the social position of the household influence the choice of transport? With reference to the concept of motility explained in the following, we specifically ask how access, competence and appropriation are shaped with regard to different mobility options (car and alternative options). How do access, competence and appropriation differ according to the social status of the household, the nationality and the age of the women? Finally, we explore the consequences for women who do not have their own car in a car-dependent urban society like Muscat: to what extent are their possibilities to participate in society restricted due to limitations in access, competence and appropriation of different modes of mobility?

In the following section 2, we first explain the theoretical background of the article and explore scientific knowledge about the relationship between gender and mobility. In section 3, we give an overview of how Muscat's urban structure developed in the last five decades. Section 4 is dedicated to the empirical methods of our study and in section 5, we present our findings related to the mobility patterns of women in Muscat. In the last section, we discuss and contextualize our findings with regard to the concept of motility as well as new insights from other Arab and Islamic countries.

#### 2. Mobility, gender and inequality

Our research looks at women's everyday mobility in Muscat from a social scientist's perspective. This perspective has been significantly shaped by the "new mobilities paradigm" developed by Urry and his research group at the beginning of the new millennium (Sheller and Urry 2006). While questions of gender differences with regard to mobility practices have been addressed in geography, social sciences and transport studies at least since the late 1980s (see e.g. Hanson and Pratt 1988), the topic has gained tremendously in visibility and scope during the last twenty years. This holds true particularly for the regional perspective on gender and mobility, which we present in the first part of this section before we go on to introduce the theoretical background for our study, focussing in particular on the concept of motility. While our own study

clearly adheres to a research agenda which sets gender and daily mobility in a larger social context and uses qualitative methods to unravel meanings and cultural contexts (see *Law* 1999) we will also briefly refer to the large corpus of quantitative research on gender differences in mobility, since the respective findings will help to put our results in context.

# Research on women's mobility - a regional perspective

If we focus on the setting of our field study, we find that literature on mobility in Muscat or Oman in general is scarce. Most existing studies are related to traffic and transportation studies while social perspectives - including gender specific perspectives are still lacking. The most comprehensive transport study is a PhD thesis dating back to 1993. In his thesis, Al-Rawas combined a transport system analysis with a first household survey including questions on everyday mobility patterns and different means of transportation. The analyses highlight existing traffic problems such as congestion and accidents as well as a high demand for parking facilities and an insufficiency of the public transport system. More recently, Belwal and Belwal (2010) looked into the reasons for the high prevalence of car-based mobility in Muscat. One of the main reasons for this is the well-developed road infrastructure combined with the high availability of individual cars. According to official data (National Centre for Statistics and Information 2018; own calculations), Oman counts 304 private cars per 1.000 inhabitants. This means that on average one car is available for each household in Oman. In reality, however, the distribution varies widely between lowerskilled migrants, who most often neither have a car nor a driving license, and Omani households, which most often own several cars.

Since little scientific research about women and mobility in Oman is available, in the following we will present some findings from mobility related research in the Global North and the Middle East. Generally speaking, research on gender differences in daily or weekly urban mobility since the early 1990s has focused on two topics. The first topic is the variation of length and mode of daily transits between men and women (*Scheiner* and *Holz-Rau 2012: 2*). A number of mainly quantitative studies in Western cities revealed that women often travel less in terms of distance but have more complex mobility patterns since they often combine different reasons and destinations and that they serve as "drivers" for children or elderly family members (see e.g. *Hanson* 2010: 15; *McGuckin* and *Nakamoto* 2005). For Europe and the USA, it has also been shown that women use a car less often and that they use public transport more often than men (Cresswell and *Uteng* 2008: 3). By contrast, women in many countries in the Global South, especially those who do not belong to the "upper few" often walk far longer distances when compared to men in the same local context (*Hanson* 2010: 15; *Srinivasan* 2008). As we will show in our results section, the situation in Oman differs significantly from both of these settings.

The second topic, which researchers have concentrated on since the early 1990s already is the fear of dangers related to movements in public spaces and the ensuing limitations for female mobility (see *Fortier* 2011, *Rizzo* 2011 for Egypt and *Anand* and *Tiwari* 2006 for India).

Overall, however, research on women's mobility (and mobility in general) in the Global South is only recently growing in scope and content. At the same time, mobility is "one of the biggest challenges in regions outside the Western world" which is why *Kwan* and *Schwanen* (2016: 251) see an ongoing need to "decenter mobility studies" from its "conventional orientation" towards the Global North.

Looking through a regional lens at what is known about women's mobility in the Middle East, we observe a clear concentration of the research on transport issues and traffic studies. While some of these studies include gender issues among other topics (see e.g. *Aloul* et al. 2018) genuine social perspectives on questions of everyday mobility are still rare. During recent years, however, there have been some notable exceptions. Social anthropologists, sociologists and geographers such as *de Koning* (2009a), *Le Renard* (2014), *Iqbal* (2019) or *El-Dorghamy* et al. (2019) have started to shed some light on the social and spatial interdependences of mobility in different local contexts in the region.

In her thesis *de Koning* (2009a) analyzed the interrelatedness of constructions of class, gender and women's presence in public spaces. In this context, she defines the private car as the ideal vehicle used by upper middle-class women to navigate the "urban jungle" because it creates a controlled environment and transports "women unscathed and free of unwanted interventions from one safe space to the next" (*de Koning* 2009b: 549). In contrast to cars, public buses were associated with extreme instances of uncivilized harassment. The Cairo subway with women-only carriages and the 'luxury' air-conditioned busses were considered possible but not preferred mobility options.

From a complementary perspective, *El-Dorghamy* et al. (2019) studied the mobility of children and their mothers in an informal Cairo settlement. Using the motility concept as a theoretical framing (this concept will be explained in more detail in the next sub-section), they were able to detect that a private car is seen as a very comfortable but unreachable option. All other means of transportation (walking, biking, microbus, public bus, tuktuk) are rated neutral to positive and thus are regularly used by the interviewed families. While both girls and boys display a high degree of competence and appropriation of the different means of transportation, a gender 'appropriation gap' is observable, translating to more restrictions for girls. For them biking is not seen as appropriate, especially for older girls, and when using public transportation it is expected that they should either be accompanied by family members or friends or to be in regular contact with their parents via mobile phone (El-Dorghamy et al. 2019: 26).

In a recent field study, *Iqbal* (2019) looked into the relationship of gender and transport poverty in Karachi, Pakistan, and assumes that "mobility is socially produced and unevenly distributed along ethnic, class, gender and religious lines" (2019: 174). *Iqbal* agrees with *Kaufman* and *Montulet* (2008) that there is a "clear relation between mobility and access to resources" (*Iqbal* 2019: 174). Her research results underline *Cresswell*'s call (2001) to go beyond physical infrastructure to see how other social structures or discourses, such as gender norms, define or shape mobility patterns.

In her analysis of young women's spaces and mobilities in Riadh, *Le Renard* (2014: 3) focuses on the younger female generation in Saudi Arabia. Their presence in work and leisure spaces outside the home is transforming gender norms not only in comparison to the older female generation of urbanized Saudi women but also in comparison to women socialized in rural Saudi areas. Paid work outside the home is not only an approved reason to be mobile in the city but also provides the necessary personal income to finance the high costs of mobility, especially in Riyadh. From the early 1990s to mid-2018, women in Saudi Arabia had been forbidden to drive a car and to obtain a drivers' license, which meant that they had to employ a driver or rely on male family members for their urban transportation. Her interviews revealed that female mobility in Riyadh is influenced through issues of security and obstacles (here: religious police, urban checkpoints and harassment by groups of young men), by questions of status and class distinction, by finance and revenues as well as by power constellations within the family and individual negotiation skills.

Insights obtained from these studies will help to set our empirical results in perspective and sharpen our analytical gaze with regard to possible cultural and socio-economic aspects. Before we continue to present the context to our case study area in more detail, the next section introduces the theoretical background and the framework for our analysis.

#### Gender differences in mobility - theoretical approaches

In an overview article on gendered mobilities, Scheiner and Holz-Rau (2012: 251f) differentiate between four major theoretical concepts that have been used to discuss and explain gender differences in everyday mobility: social psychologists explain gender specific mobility by gender-specific preferences and norms ('preference hypothesis'). Sociologists refer to differing social roles, which - due to different daily tasks - result in different mobility patterns ('social role hypothesis'). Finally, feminist researchers have pointed to unequal power relations within the households ('economic power hypothesis') and more general patriarchal society structures ('patriarchy hypothesis') to explain deviations between women's and men's mobility patterns. These hypotheses are of course crucial for the drafting of quantitative studies and models. However, they will also help us in a qualitative context to take into account different socio-economic as well as cultural and discourse related aspects that might be of influence with regard to women's mobility in Muscat.

In this context, the 'economic power hypothesis' alerts to the fact that research on mobility and inequality can and should relate to different processes of social differentiation. As *Cresswell* and *Uteng* (2008: 4) noted, "gender and mobility are inextricably linked with other formations of power including class, ethnicity and imperialism." *Kwan* and *Schwanen* (2016: 248) highlight that questions of inequality and exclusion have been of concern both in mobilities studies and transportation research.

Many transport studies since the 1990s have focused on "transport poverty" and "transport disadvantage" (see El-Dorghamy et al. 2019: 19 for an overview). From this perspective, a disadvantaged socio-economic position results in exclusion from mobility and transport which - in turn - contributes to more general social exclusion due to the reduced and hindered accessibility of services and/or work places. Looking at the different parameters that may cause reduced mobility opportunities and transport poverty, Church et al. (2000: 198ff) differentiated between economic exclusion (mobility costs), physical exclusion (lack of accessibility, e.g. for people with a physical handicap), time-based exclusion, fear-based exclusion, geographical exclusion due to lack of transport infrastructure, exclusion from facilities due to general lack of accessibility of services irrespective of means of transport, and finally space exclusion (prohibitions related to different means of transport). We will refer to these different facets of exclusion when discussing to what extent, in regard to which mode of transport, and for which reasons women in Muscat might suffer from reduced mobility options.

Despite many differences in focus and methodology, most transport mobility researchers agree that "mobility and mobilities are both generating and an outcome of inequalities and exclusion" (Kwan and Schwanen 2016: 248). More recently, and in line with other strands of social geography and sociology, mobility researchers have started to look at gender, race and their intersections with other processes of social differentiation and their interactions and influences on daily mobilities. Looking at mobility from an intersectional perspective highlights that social differentiations are never just binary and uniform. From this perspective, how a person "does mobility" (Adey 2017) will differ according to his/her position in society with regard to a number of different attributes of social differentiation and stratification. Additionally, of course, individual mobility is also influenced by the possibilities and constraints of a particular urban (or rural) environment (e.g. local transport system, urban design, but also urban politics and more general discursive framings; see e.g. Klinger et al. 2013 on mobility cultures).

In our study, we thus strive to take into account and investigate both the influence of social inequalities (including i.a. gender, ethnicity, migration status and/ or socio-economic positions) and the importance of physical infrastructure as well as incorporated cultural values and discursively constructed significances of different means and aspects of being mobile. We agree with *El-Dorghamy* et al. (2019) that the concept of motility developed by *Kaufmann* et al. 2008 offers a fruitful analytical framework in this regard since it enables to shed light on how possibilities and constraints for daily urban mobility are conceived and appropriated from an individual, yet socially embedded perspective.

# Motility as a conceptual framework

The concept of motility focuses on the individual actor who is seen as embedded in and interacting with social *and* infrastructural constraints and opportunities. Motility is defined as "the capacity of entities [...] to be mobile in social and geographic space" (*Kaufmann* et al. 2008: 342). It encompasses interdependent elements relating to *access, competence* and *appropriation* of a particular mobility choice, including the option of non-action or non-appropriation.

Access refers to the entire range of means of transportation, communication and transport equipment accessible for a person at a given time. Access depends on the spatial distribution of population and infrastructure, the sedimentation of spatial policies (e.g. transportation offer) and the socio-economic position of a person (e.g. purchasing power and his or her position in a social network of family and friends).

*Competence* is defined as those skills and abilities needed for individual mobility including physical ability, acquired skills (rules and regulations, permit, etc.) and organizational skills (know-how to plan and organize a trip, find one's way by car, read a timetable and line plan for public transport, etc.).

Appropriation refers to how an individual actor interprets and acts upon his/her perceived access and skills. While access and competences to a certain degree can be measured 'objectively' (a person owns a car, has a driver's license, can ride a bike, is able to read a map or not), the aspect of appropriation points to the fact that all the individual and structural opportunities and constraints for every day mobility are perceived and interpreted differently by an individual depending on the experiences and socio-cultural norms that have been internalized by this person. Thus, the concept allows to take a differentiated look into internalized social norms (habitus; see *Bourdieu* 1977) and individual feelings that influence mobility (e.g. choice of means of transport, timing etc.). By

looking both at actual mobility patterns and at a person's potential mobility, the concept sheds light on the gap between both and thereby the social and cultural embeddedness of mobility decisions and habits.

As the term of habitus already conveys, the concept of motility is rooted in Bourdieu's social theories. Kaufmann et al. (2008) originally proposed to conceive motility as a form of capital. We however agree with Dangschat (2013: 56) who argues convincingly that mobility should rather be considered a social (sub) field, in which different forms of capital are needed in order to move both in space and in society. A means of transportation such as a car can be defined as physical capital (which corresponds to converted financial capital), but it also has a symbolic value (e.g. different car brands as symbols of prestige). Being able to reach the workplace (work-related mobility) on the other hand is a prerequisite for income generation (financial capital). Seen through this lens, thus, mobility/ motility is a social field on which social inequalities are generated and reinforced. Actual mobility practices in turn are sedimented into the subject's habitus (cf. automobile subjects; Manderscheid 2013) thereby influencing future mobility choices and preferences. Taking into consideration incorporated norms and values as well as the socio-economic position of an individual helps to shed light on the question of how individual mobility is shaped through social inequalities related to gender, ethnicity, age, family status and socio-economic class differences.

The concept of *motility* offers a particular enlightening perspective for the case of Muscat, where potential access differs significantly from the actual mobility practices (appropriation) and where social norms play a decisive role in women's mobility choices (see section 5). The next section will introduce the particular local context for women's mobility in more detail.

# 3. Urbanisation, modernisation and increasing urban mobility in Oman

The urbanisation as well as the modernisation process started in Oman after Sultan Qaboos came into power in 1970. His plans for the rapid expansion of technical infrastructure included the development of a modern road network (*Peterson* 2004, *Valeri* 2009). In the Capital Area of Muscat, urban growth was concentrated mainly in the governorate of Muscat/Mutrah during the 1970s, extended to the neighbouring governorate of Bawsher during the 1980s, moving further westwards during the 1990s, and at the beginning of the 2000s the settlement process had reached the governorate of as-Seeb, which is currently the main growth area (Scholz 2014). As a result, the Capital Area of Muscat today forms a linear urban corridor that extends over roughly 80 km. At the same time, the Capital Area of Muscat has been transformed into a highly fragmented urban space. It now is made up of a vast urban patchwork, where mostly low-rise and low-density residential neighbourhoods alternate with areas dedicated to administrative, commercial, recreational and cultural purposes. All neighbourhoods and functions are connected by highways and a high-density road network geared to fast road-based mobility (see Photo 1).



Photo 1 Urban space in Muscat dedicated to cars: roads and parking slots. Photo credit: Nebel (2017)

The urban expansion was driven by a continuous population growth: in 1970, the Capital Area had approx. 50,000 inhabitants; in 1980, it had grown fourfold to 226,000 inhabitants (*Scholz* 1990: 162). In 1990, the count doubled again to 444,472 inhabitants (*Al-Rawas* 1993: 35). A large share of this population growth is due to in-migration from rural areas in Oman as well as from foreign countries. Just like the other Gulf States, Oman has recruited a large number of low-skilled and highly-skilled foreign workers to contribute to its petrol-driven industrial development and the expansion of the service sector.

According to population data published in the Monthly Statistical Bulletin (*National Centre for Statistics and Information* 2020) Muscat to date has 1,443,926 inhabitants with 876,075 (61%) of them being expatriates. In 2010, which is the latest date for which data on different nationalities is available, Indian nationals comprised by far the largest group accounting for 65% of all expatriates in Muscat (Source: special cal-

culations of census data 2010; own calculations). This dominance of Indians within the foreign workforce is primarily a result of the long history of trade relations between Oman and India.

The dynamic population growth is a big challenge to the responsible governmental bodies in particular in terms of providing enough and adequate housing. Royal Degrees grant Omani nationals above the age of 23 years the right to claim a residential plot. This right was extended to include female Omanis in 2008. Today, most first time allocated residential plots are situated in the newly developed areas in the west of the Capital Area. Non-Omani nationals are with some exceptions prohibited from land and housing ownership in Oman and therefore depend on the rental housing market (*Deffner* and *Pfaffenbach* 2015).

Workplaces are important destinations for everyday mobility. In Muscat, workplaces are clustered according to economic sectors, with the Ministry district being the largest with 18 ministries and more than 10,000 workplaces. The light industrial and commercial area, the commercial and office complexes as well as the Central Business District are clustered in different neighbourhoods in the Capital Area with thousands of employees and a large number of customers commuting in and out every day (*Nebel* et al. 2021).

Other monofunctional clusters also represent important target locations for individual mobility: big shopping malls located along the highway network and with up to 4,200 parking bays; educational clusters as for example Sultan Qaboos University Campus with 18,000 enrolled students (*Muscat Daily* 2017) or the six large Indian schools in Muscat totalling approx. 45,000 students (*Times of Oman* 2017).

Concerning women's everyday mobility in Muscat, both the location of work places as well as those of the educational facilities are important since an increasingly high proportion of women in Oman participate in secondary and tertiary education and are part of the workforce. In addition, it is mostly the women who are responsible for taking the children to their schools if the children are not picked up by the respective school bus system (*Chatty* 2000: 49).

The continuously expanding residential areas and the dispersed location of services and facilities have led to long distance trips and the amount of traffic has increased considerably. Responding to the need for covering long distances in a short time, the road network has continuously been developed. As a result, Muscat features a high density road network, especially when compared to its relatively low population density (*Nebel* 2016).

Only in 2015 did the Omani government begin to establish public transport services in Muscat in a systematic way. The public buses (Mwasalat buses) operate according to an official time schedule and private minibuses operate on demand. Neither Mwasalat buses nor minibuses, however, service the residential quarters and until recently both bus types only ran on the Sultan Qaboos Highway. As an answer to the lack of alternative transportation within the city, some ten years ago residents started to organize additional informal shared private taxi services, which are mainly used by Indians (Didero et al. 2019b). To date all available transport services are road based and other types of public transport, e.g. a metro line like the one in Dubai, are currently not considered to be realistic options.

These urban structures result in long distances and a car-based mobility culture (cf. *Klinger* et al. 2013). We ask how this specific local setting impacts on the perception and appropriation of existing mobility options and modes of transport by Indian and Omani women. We assume that their access, competence and appropriation differ according to age, social position and nationality. In order to explore these questions, we carried out an empirical research project in Muscat in 2016 and 2017. The methods we applied for this purpose are presented in the next section.

# 4. Methods

In order to look into the interdependences of social structures, urban planning as well as individual mobility, we employed a mixed-methods approach including a quantitative survey, qualitative interviews and self-reporting video clips (see *Fig. 1*). While results from the quantitative survey and the structural analysis have already been published (*Didero* et al. 2019a), the current article focuses on the qualitative interviews and the self-reporting video clips, referring to the survey only where necessary.

Our interview partners were recruited from three case study areas. We had chosen to conduct our research in the neighbourhoods of al-Ghubra, as-Seeb



#### Mixed-methods approach

Fig. 1 Mixed-methods approach of the study

and al-Maabela because of their geographical locations within the metropolis, their age-related structure (recently developed or more mature) and significantly differing average housing prices. Our quantitative analysis of the survey data showed that, in accordance with our expectations, the mobility patterns of the households in the selected neighbourhoods differ based on their socio-economic status and the neighbourhood structure. In this article, however, our focus is on the question of how and why mobility patterns, competence, access and appropriation within a household might differ related to gender or family status.

Taking Muscat's highly diversified population into account (see section 3), we included both Omani and Indian households in our survey and the interviews. Indians are not only the largest group of non-Omanis in Muscat but they are also nearly as numerous as Omani nationals. For both the quantitative survey and the qualitative interviews, we focused on male and female Indians who live in Muscat with their families since these are sufficiently comparable to Omani households. Because Indian working migrants who want to be joined by their family need a minimum salary and the employer's, i.e. sponsor's, agreement (*Zahra* 2015), we assumed that the Indian families included in our research most likely dispose of medium to high incomes and have sufficient means for daily mobility. In most cases, thus, their mobility patterns do not depend on the transportation services provided by their employers as is the case for many low-income working migrants coming from India and other Arab and Asian countries who live in Muscat.

In March 2017, we conducted 16 interviews with female Omani and Indian respondents. All interviews were conducted by one of the authors accompanied by either the Omani or Indian female research assistant living in Muscat. Most of the interviews with Omani respondents were conducted in Arabic, most of the interviews with Indian respondents were conducted in English. The interviews were semi-structured and included open questions related to the living situation within the neighbourhoods, long-term household mobility (migration and other movements), household mobility resources, daily and weekly mobility patterns, the experiences and emotions related to mobility practices, questions of life style and mobility as well as to social norms and mobility patterns. Finally, some more directed questions concerned the opinions and experiences on the recently developed public transport in Muscat and the expected changes in mobility patterns related to the recent and future increases of the petrol price. We recruited the interview partners mostly during the door-to-door survey activities and through spontaneous contacts in the

three case study areas as well as by snowballing. The interviews lasted between 20 and 90 min.

The self-reporting video clips were produced by Omani students of the Department of Urban Planning and Architectural Design at German University of Technology in Oman. The students in the final year of their bachelor study program were asked to make short films on their mobile phones in which they showed where they go on a normal weekday and on a Saturday, how they go there and how they feel during the trips<sup>1</sup>. 28 students uploaded video clips of 10 to 15 minutes for further analysis of texts and images.

In the following, we introduce our female Omani and Indian interviewees and offer first insights into their competence and access to car mobility. All of the female Omani interviewees were employed, except for one student. The average age of our Omani interviewees is rather low, with all but two of them being younger than 40 years old (see Table 1). Only few of the interviews could be conducted at home, while the majority took place in public or semi-public spaces (work places and cafés). As was to be expected, Omani homemakers and older women did not agree to participate in our interviews because of cultural issues. More traditionally oriented and enculturated women usually are not willing to meet with strangers - neither at home nor in public spaces – unless they have been introduced to them through personal or family contacts. This stance also holds true for female strangers. Since neither the female authors nor the female Omani research assistant were able to be introduced via those types of contacts, this group of women unfortunately could not be included in the sample.

The seven Indian female interlocutors were all in their 30s and 40s (see *Table 2*), which is typical for the majority of the highly-skilled Asian workforce. With the exception of one woman, all live in Muscat with their husband and children. Their husbands are the main earners in the family, they are rather well educated and allowed to bring their family with them to Oman. Three of the women were homemakers, while four were employed. Those staying at home did so for different reasons: because they could not obtain a work permit, because they chose to stay at home to take care of smaller children or because they adhered to a more traditional gender role<sup>2</sup>.

All interviews were fully transcribed, and the interviews conducted in Arabic were translated into English. An excerpt has been written for each interview and first results were discussed in a workshop, held in Germany, by the whole author team and research assistants. A more detailed analysis was carried out using MaxQDA software solution for qualitative text analysis (*Rädiker* and *Kuckartz* 2019). Categories were derived from the interview guideline supplemented by in-vivo coding.

| Profession/work place    | Age | Living situation  | Driving<br>license | Car/Mobility                | Neighbourhood |
|--------------------------|-----|---|--------------------|-----------------------------|---------------|
| Secretary in oil company | 20s | Engaged; lives with her<br>parents and siblings                   | Yes                | Yes<br>(luxury car)         | Al-Ghubra     |
| Secretary in oil company | 50s | Divorced; lives with her adult son and house maid                 | Yes                | Yes<br>(medium size car)    | Al-Ghubra     |
| Teacher                  | 40s | Married; lives with her<br>husband and three children             | Yes                | Yes<br>(big car)            | Al-Maabela    |
| Teacher                  | 30s | Married; lives with her husband,<br>her brother and four children | No                 | No<br>(had a female driver) | Al-Maabela    |
| Student                  | 20s | Single; lives with her parents<br>and siblings                    | No                 | No<br>(had a driver)        | Al-Maabela    |
| Engineer in oil company  | 20s | Married; lives with her husband,<br>two children and house maid   | Yes                | Yes<br>(medium size car)    | Al-Maabela    |
| Teacher                  | 30s | Married; lives with her husband,<br>four children and house maid  | Yes                | Yes<br>(small car)          | As-Seeb       |
| Teacher                  | 30s | Married; lives with her husband,<br>three children and house maid | Yes                | Yes<br>(small car)          | As-Seeb       |
| Bank employee            | 30s | Single; lives with her parents and siblings                       | Yes                | Yes<br>(small car)          | As-Seeb       |

Table 1 Overview of female Omani interviewees

| Profession/work place           | Age | Living situation   | Driving<br>license | Car/Mobility                  | Neighbourhood |
|---------------------------------|-----|--|--------------------|-------------------------------|---------------|
| Homemaker                       | 30s | Married; lives with her<br>husband and one child         | Yes                | limited<br>(small family car) | Al-Ghubra     |
| Manager of beauty saloons       | 40s | Married; lives with female<br>workmates; family in India | No                 | No                            | Al-Ghubra     |
| Teacher                         | 30s | Married; lives with her<br>husband and three children    | No                 | No                            | Al-Ghubra     |
| Homemaker                       | 30s | Married; lives with her<br>husband and one child         | No                 | No                            | Al-Maabela    |
| Homemaker                       | 40s | Married; lives with her<br>husband and four children     | No                 | No                            | Al-Maabela    |
| Medical employee at<br>hospital | 30s | Married; lives with her<br>husband and children          | Yes                | Yes (small car)               | Al-Maabela    |
| Medical employee at hospital    | 30s | Married; lives with her<br>husband and two children      | No                 | No                            | Al-Maabela    |

Table 2 Overview of female Indian interviewees

# 5. Results

In the following, we will first summarize the results of the interviews and provide evidence from the interviews in the form of direct quotes. We will show which mobility options exist from the women's perspective and how they evaluate them. Throughout the whole section these descriptions will be embedded in the local context of social and cultural norms to understand the women's perspectives. In section 6, the results will be discussed in more detail by referring to the conceptual framework of motility and by analysing access, competence and appropriation of different means of transport.

#### 5.1. Mobility patterns of Omani women

# No alternatives for using cars: sociocultural and socioeconomic reasons

Only two of the nine Omani women we interviewed do not have a driving license. The male heads of household of both of these women, however, had hired a driver to drive them to university or to work every working day. The women who have a driving license also have a car at their disposal. Each household has several cars. While the husbands typically use the larger car for their work trips, the women drive a smaller car, which in Oman is usually a middle class car (*Photo 2*), as they often have comparatively shorter distances to cover than their husbands.



Photo 2 Middle class cars are the favoured means of transportation of Omani women. Photo credit: Nebel (2017)

One teacher (in her 30s) described the direct, nearly inevitable and almost causal connection between employment and car ownership: *"Everyone knows that anyone who gets a job, buys a car."* Even very short distances to work are covered by car. From the women's point of view, even short distances are difficult to walk: they wear a black Abaya in public, which quickly heats up in the sun. In addition, attractive (that is obstacle-free, shaded) footpaths are usually missing. Their own (bad) physical constitution, such as back problems, was also mentioned as a reason why they cannot walk even short distances. Finally, walking is also culturally undesirable as women want to be visible in public as little as possible.

#### Our cars - their buses and taxis

In the interviews we explicitly asked about the use of taxis and the new public buses, which would eliminate

the need for a working woman to own a car. However, the women not only ruled out the use of public transport in the interviews, but very often vehemently rejected it: "Of course no, not at all, never!" (unmarried woman in her 20s). Social reasons (distinction) are cited as reasons for not using public buses: public transport is only suitable for foreign workers. "We grew up here when everything is available and all the locals are using their own cars – and public transport, you don't find locals using them. It's mostly the laborers" (divorced woman in her 50s). Only in an emergency and when the families would not have a car available, there would be a willingness to take a bus, but never as a woman alone.

Due to the higher costs (compared to public buses), taking a taxi, in general, is socially appropriate for Omani men, but not for Omani women. In Oman, there are no taxi companies where drivers can be ordered. Instead, free taxis are stopped at the roadside by hand signals. The fares are negotiated as taximeters are not installed. The taxi business is firmly in Omani hands due to the requirements of a 100% Omanisation quota in this sector. This makes taxi rides predictable in one respect: all Omani passengers can communicate with the drivers in Arabic. However, they are unpredictable in two other respects: passengers do not know who will be the driver and how high the costs will be. Another obstacle, especially for women, is that they would be alone in a confined space (the car) with a man who is not part of the family. This is culturally not accepted ("just wrong"; unmarried woman in her 20s). In the worst case, the taxi driver would even let another male passenger get on. Only taxi rides accompanied by male relatives are culturally considered unproblematic for Omani women. In an emergency, it is therefore always the responsibility of male relatives (husband, brother, son) to guarantee the mobility of women and to drive them.

There were also frequent reports of harassment that other women (often housemaids) had experienced, causing feelings of insecurity and fear. It has to be said that harassment is felt to happen as soon as a man does not maintain the culturally required physical distance to a woman. A divorced woman (in her 50s) explained her aversion to taxi drivers in the interview: *"Because of the stories on the safety and the things that have been happening to our housemaids. And we also discourage our housemaids to take a taxi alone unless she is with a group of girls. For their own safety".* An unmarried woman (in her 30s) explained the problem with (disrespectful) taxi drivers: "If the driver is not well behaved with women in general, then it's not comfortable. There are drivers that respect women, so it's better. So, they let you sit comfortable in the car without taking other men to share the [back] seat. But some taxi driver would not give this comfort, they would allow other men to share the [back] seat with a woman otherwise make us pay more if we want privacy".

Interestingly, women who travel to the United Arab Emirates from Oman often do not have any qualms using taxis there. In the Emirates, taxi drivers are exclusively foreigners who must not be at fault, otherwise they may lose their visa. The situation would also be different for female passengers in Oman if there were female taxi drivers for then female passengers would not fear being exposed to harassment: *"If women drive taxis, we would not get this harassment issue. She will be a woman like me and she will understand me better and respect me"* (unmarried woman in her 30s). However, in Oman taxis are only driven by Omani men, which means that taxis are an unacceptable means of mobility for Omani women.

# Mobility purposes and mobility restrictions for Omani women

In the interviews, we discussed differences between men's and women's mobility. As was to be expected, our female interlocutors reported a wide range of differences, pointing to an "appropriation gap" (*El-Dorghamy* et al. 2019: 26).

The mobility purposes of women are mostly target-oriented. Apart from commuting to work, they use the car to take their children to or from school or kindergarten, to run small errands or to meet relatives. A 35-year-old bank employee sees the mobility of women predominantly as an obligation: "Sometimes women are more mobile than men. Because they take their kids to school and drive their kids to where they need to go. Also, for daily needs to buy from small shops are mainly done by the women. Some men don't like to do these small trips". The female interviewees held the opinion that men either travel frequently without any specific purpose or that they limit their mobility to commuting to work and otherwise prefer to stay at home. A 27-year-old young mother working in the oil industry also sees significant differences in mobility purposes depending on age and family stage: "Young people from college and university, they have more of meaningless traveling targets. We used to also be like this. We come out of college and we go to coffee shops. So, the older you get you have more meaningful traveling."

The self-reporting video clips produced by students confirmed the previously mentioned 'meaningless travels' of young people at least in their free time on weekends with numerous trips between beach and shopping malls to pass the time and meet friends. One student commented in the video about her daily journeys to university as time-consuming but nevertheless relaxing from her domestic duties: *"On daily basis, I drive a minimum of 106 km. I use the time as a sort of relax and refresh. Quite honestly, I enjoy the car rides even though they are on a long distance. But it gives me some time for myself, which is nice."* 

Why women experience mobility restrictions has a number of different reasons. One important reason is that the places they are allowed to travel are restricted. While men are free to go everywhere, women are restricted to places they already know. Furthermore, these places must not be dominated by men because this would damage a woman's good reputation: "Places where there are men drinking and smoking, usually women would not go there" (unmarried woman in her 20s). Another important reason is that their mobility is restricted to those times of the day that are not considered unsafe and indecent in conservative families, i.e. especially in the evenings: "Regarding timings, for a conservative family it matters. Because it's dark outside and not safe. For example, for me we can't go out after 10 pm. Sometimes even the curfew is 9 pm. It depends on the mood" (unmarried woman in her 20s). That is why women need to be accompanied by family members in the evening, even when driving their own car.

These restrictions are often based on religious morality: "We have limitations from religion first. We are not forced but we have the borders defined" (student in her 20s) or are imposed by the husbands: "We [women] are more limited, especially when you are married. Before marriage you go out and drive where you want but then after marriage you are limited. The man can go out whenever he wants, he is the boss" (teacher in her 30s). Only one older well-off divorced interviewee felt no restrictions: "I never felt restricted to go anywhere unless me myself I feel I cannot go there."

The women's statements show that all gender specific mobility hypothesis summarized by *Scheiner* and *Holz-Rau* (2012) apply in the specific case of Muscat. The women formulated both gender specific preferences and norms ('preference hypothesis'), they argued with their social roles as mothers and daughters that are connected which specific daily tasks ('social role hypothesis'). In addition, they reported unequal power relations within the households ('economic power hypothesis') and more general patriarchal society structures ('patriarchy hypothesis') as reasons for existing mobility restrictions. It has to be emphasized, however, that these aspects cannot be analyzed separately from each other. They are closely interlinked and, considered together, they highlight the importance of cultural and social constraints to women's everyday mobility in Oman.

#### 5.2. Mobility patterns of Indian women

In order to be mobile and commute to work, obtaining an Omani driving license is one of the first important things Indian migrants need to accomplish: "Anybody from India, in order to get a vehicle, the first thing they do is to go for driving [lessons]" (teacher in her 30s). The connection between employment and car ownership, which is perceived as inevitable, therefore applies not only to Omani families but also to Indian families. Thus, all Indian families with whom we conducted qualitative interviews owned at least one car.

However, only one employed Indian woman (a medical employee) has a driving license. The manager of the beauty salons twice tried to take the driving test in Oman without success and then resigned. She walks to work because she lives near one of the beauty salons. For all trips (errands, leisure activities) she can rely on the driving service of her sponsor and his wife. The teacher can also walk to work as the family lives across the street from the school. Although her husband encourages her to obtain a driving license in Oman, she has not yet made the effort. In the interview, she expressed a lack of time and fear of driving, as she did not have a driving license in India either. The second medical employee, who works in alternating shifts and has a commuting distance of 34 km, uses a private driving service. The homemakers without a driving license and without a car depend on their husbands' driving services. Their daily necessary journeys (accompanying the children on their way to and from school, small errands etc.) are mostly done on foot (*Photo 3*).

The daily walking distances are felt to be manageable due to the short distances between home and school. All interviewed Indian women with school age chil-

dren have moved on purpose to be near one of the six major Indian schools of Muscat. As a result, the working fathers' commuting times have often become much longer. However, this is accepted in order to offer the children (and the mothers accompanying them) short walking distances.



Photo 3 Indian family walking to run an errand. Photo credit: Nebel (2017)

Indian women take taxis only in emergency cases. In contrast to the Omani interviewees, fear of harassment is not mentioned, but "they don't like it" (manager of the beauty salons with regard to the reluctance of the female employees to take a taxi). A young mother and homemaker explains her aversion to taking a taxi with communication problems: "It's very difficult to explain where I have to get down and where he has to drop us. *That was very difficult part."* However, the fact that fear of harassment was not mentioned as a reason why they do not use taxis does not mean that this fear does not exist. Instead, it might suggest that Asian migrant workers in Oman generally do not want to be guilty of anything in order not to risk their residence permit. This includes accusations against Omani citizens, even if they are justified and verifiable.

Using the new public buses was also not considered an option by our Indian interview partners. Although only some rejected the use of the buses as unthinkable ("*No, thanks to God, I never had the need to*"; homemaker in her 40s). They generally rate the new buses as obviously comfortable ("*I have seen the buses are very good, so comfortable, when I see from outside*"; teacher in her 40s). However, the buses are considered suitable for a one-off family trip rather than an everyday means of mobility.

For everyday mobility, thus, most Indian women depend on their husbands, relatives and family friends. A young mother and homemaker finds this dependence on her husband very stressful: "When I was in Chennai I would never depend on anybody. I had a bike. If I want to go out, I'll just take my bike and go. I didn't have the habit of depending on anybody. But here to buy the milk or whatever I have to depend on [him]. That is the biggest drawback here I felt. Everything, whatever it may be, I have to depend on him." A homemaker, who lived with her family in Saudi Arabia and the Emirates for several years before her stay in Oman, explains that her husband gives her clear guidelines for her mobility: "We lived in Saudi Arabia, so my husband has that [Saudi Arabian] mentality. He doesn't let me go alone that easily. If there is something special, he will ask a friend to drop me, otherwise, I don't go much."

While Indian women without a car are thus tied to the house and immediate living environment during the day due to a lack of mobility resources, they are more mobile in the evenings and on the weekends when accompanied by their husbands. The families then go shopping, visit dancing or language courses, go to temples, churches, or mosques (depending on the denomination), visit a park or cinema, or go on a day trip.

Different from Omani women, Indian women are not only responsible for chauffeuring their children but also for running smaller errands, however, not by car but on foot. For this purpose, their place of residence is deliberately chosen. And yet, our Indian female interlocutors are significantly more immobile than the Omani women we interviewed. Indian homemakers in particular are extremely limited in their mobility and socially excluded because they lack the resource and competence to drive a car in their car-dependent environment.

# 5.3. The men's perspective on women's mobility

In the interviews, many men stated that in principle they do not see any difference between the mobility patterns of men and women. By this, they mean in particular the structural conditions that enable women to acquire skills and access to car-mobility to the same extent as men do. At the same time, they always acknowledged culturally determined differences in terms of time and place.

Four of the twelve Omani men we interviewed were married to non-employed women. The interviews with them give us an insight into the mobility situation of Omani homemakers who could not be included in the selection of the interview partners for cultural reasons. Three of these four interviewees reported that their non-employed wives had a driving license and their own car: "My wife has her own car; she can drive wherever she wants" reported an engineer and well-off family man (in his 40s) with three children. He also considers taxis as an unsuitable means of mobility for the women in his family ("To be very frank I will not allow my wife and my daughters to go and take taxi. Unless it is necessity or something pushes them") and explains this with religious guidelines: "In the Islamic tradition or teaching, women are not allowed to be with men unless there is a man with them like son or husband or father or brother or uncle. So, having a woman with a taxi driver alone is not allowed. It's not about trust, it's about the way things have to be done."

The only Omani interviewee whose wife does not have a driving license (a self-employed entrepreneur in his 30s) has hired a driver for the family, who is ordered by phone when his services are needed. To make his wife's mobility more flexible, he would prefer to introduce women's taxis: *"She will be more comfortable traveling with a taxi, especially if the driver is a woman. She will be more comfortable in going out. Even me, like my wife. When she wants to go out, I know that the taxi driver is a woman. I will be more comfortable to let her go with the kid."* 

The social norms also include the fact that women are dependent on male company for evening activities. This also applies to older women who have their own car. For the husband this means that he has to chauffeur his wife in the evening: *"For example, when my wife is going to a wedding [the female wedding party] she needs to leave home late by 10:00 pm and return by 1:00 am or 2:00 am. So, she prefers that I drop her and pick her up because it is late, it is not suitable. So, this is my duty to pick her and drop her"* (60-year-old ministerial civil servant).

# 6. Discussion and conclusion

This article aims at analysing women's possibilities in Muscat to participate in society by being mobile. We took different nationalities and social positions into consideration. The specific spatial context of a fast growing and widely dispersed urban corridor is one of the reasons why individual mobility is predominantly car-based. In the following, we first set our results in the context provided by the recent studies in other Arab and Islamic countries which we introduced in the second section. Secondly, we discuss our findings with regard to the aspects of competences, access and appropriation as outlined in the conceptual framework.

In comparison to recent studies in other Arabic and Islamic countries, our results show that female mobility in Oman differs significantly from female mobility patterns for example in Egypt (see de Koning 2009a and 2009b and El-Dorghamy et al. 2019). In Cairo, female mobility strongly depends on the family's social position. Personal car use is reserved for the upper and upper middle class, whereas in Muscat, due to general (oil-based) wealth, driving licenses and car ownership are widely accessible to Omani nationals. In contrast to Muscat, the - chaotic and sometimes informal - but still widely developed public transportation system in Cairo offers alternative means of transportation and can be used as a coping strategy for women who do not have a car at their disposition. Interestingly enough, in Cairo, these means of transportation are considered to be culturally acceptable in lower-income contexts (see El-Dorghamy et al. 2019), while they are equally dismissed as unsuitable for cultural reasons by the upper and upper middle classes. In Muscat, most Indian families can be regarded as part of the local middle class, who experience at least some economic constraints but less cultural constraints in comparison to Omani families with regard to their mobility. Our interviews revealed that women of these middle class families resort to walking as a coping strategy and choose their residential area in close proximity to schools and everyday facilities, which allows for walking even in the challenging climatic circumstances.

The comparison of female mobility in Oman with women's mobility in Saudi Arabia, which is characterized by similar climatic and economic conditions, offers interesting insights into the particular impact of cultural restrictions. Extremely rigorous limits set by individuals and authorities beyond the family circle, such as the controls by religious police and the harassment by groups of young men, which *Le Renard* (2014) describes for Riyadh, are not observable in Muscat. Our interviews showed that in Oman cultural restrictions are experienced as a form of religious and moral norms, which are widely accepted and internalized as part of the habitus. Only few of the interviewed women questioned the norms. Mostly they accepted the limits set by family members, e.g. curfew time. In conclusion, even if cultural restrictions and gender segre-

gation are a common factor in both local contexts, the degree of limitations differs substantially.

In the following last section of our article, we discuss our empirical findings referring to the conceptual framework of motility (see section 2) and using the categories of access, competence and appropriation as a guideline (see *Table 3* below). Our results show that competences of being car-mobile, i.e. possessing a driving license clearly differ between Omani and Indian women. Possessing a driving license is not easily feasible for an Indian woman because it is rather costly. The differences extend when it comes to owning a car. In general, Omani women who have a driving license often own a private car (access) while Indian women have to share the family car with their husband, who needs the car for commuting to work. This insight corresponds to the results of our quantitative survey (*Didero* et al. 2019a).

Even if the interviewed Omani and Indian women have access to a car and if they have the necessary competences, appropriation is restricted due to cultural norms. The interviews revealed that restrictions are experienced especially with regard to time and destinations. Even for Omani women who have a driving license and own a private car it is not appropriate to drive their car alone, e.g. to a female only wedding party, in the late evening. However, our female interviewees did not criticize these restrictions. As *Iqbal* revealed for the case study of Karachi (2019: 181), women in the MENA-Region often do not raise their voices against inequality in public because they are taught to behave in a socially acceptable way. Additionally, incorporated norms become part of the habitus and thus are rarely questioned.

With regard to other means of transportation, there are cultural reasons that restrict appropriation even more, and this is true irrespective of the time of day. Although taxis are accessible for women in general, Omani women are faced with a fear-based as well as cultural exclusion, e.g. negative effects on the personal reputation. For Indian women, taking a taxi is restricted because of a lack of competence (language skills), costs (economic exclusion) as well as fear of being harassed (fear-based exclusion).

Concerning the newly established public transport, access to it is first of all limited because of a lack of bus stops in the residential neighborhoods and the existing bus stops being inaccessible. Our interviews revealed, however, that even a well-developed and accessible public transport system which might emerge in the upcoming years would not be regarded as appropriate by our female Omani interlocutors for social reasons ("their buses"; class distinction) and for cultural reasons ("lack of privacy").

Overall, our results show that the mobility patterns of both Omani and Indian females are shaped by their social positions as well as the cultural constraints related in particular to gender segregation.

**Dimensions of Motility** Means of Access Competence Appropriation Nationality transport limited because of long no because of cultural limited in case of health issues Omani distances constraints (habitus) walking ves because of short yes yes Indian distances yes yes (some cultural limitations) Omani yes private car limited (except working limited because of costs limited because of costs Indian women) no because of cultural yes yes Omani constraints (habitus) taxi use limited because of language limited because of costs limited because of fear Indian issues no because of long no because of cultural Omani no distances to bus stops constraints public transport no because of long no because of missing yes, in many cases Indian distances to bus stops accessibility

Table 3 Access, competence and appropriation of Omani and Indian women. Source: own elaboration

It should be noted that gender segregation is not a specific characteristic of the mobility system. To the contrary, gender segregation is deeply rooted in the Omanis society and is reflected in female spheres in work and education. As an example, secondary education in Oman is separated in different schools for girls and boys. At Sultan Qaboos University in Muscat, female and male students are educated simultaneously in the same classrooms but they sit in different seat rows, have separate cafeterias, and separate library entrances.

In traditional Indian families, gender segregation is similar to the one in Omani families and access to different means of transport equally differs due to cultural constraints. However, most of our Indian interviewees did not complain about missing access to mobility. This was partly surprising for us, because the lack of access to mobility means that they are often confined to their apartments and the surrounding building blocks during weekdays. Unless they have relatives or friends living in the neighborhood itself, they are deprived not only of shopping facilities or leisure activities but also of any kind of face-to-face social contacts.

The fact that most Indian women did not deplore their restricted mobility during the interviews might partially be explained by the fact that their precarious legal status dissuades them from voicing open criticism on their living situation in Oman. Open criticism is only articulated in very private settings vis-a-vis good friends and relatives. Since we were not able to attain this status during the two months of our fieldwork, we can only call for further in-depth studies to answer the question whether the restrained mobility is truly experienced as unproblematic because it corresponds to these women's habitus.

As a final point, we would like to use our results to discuss the question if and how the options for women to participate in society and economy (e.g. to work, meet friends and family members or pursue other activities) could be enhanced through increased access, competences and appropriation of different means of transport. It is important to consider that increased motility (= potential for mobility) and independent mobility options for women might, but will not always increase the number of trips or kilometers covered since currently many trips are made via pick-up and drop-off services by relatives who often have to cover long distances to start these trips. In our study, we wanted to take into account both the influence of social inequalities and the importance of physical infrastructure as well as incorporated cultural values and discursively constructed significances of different means and aspects of being mobile. Social and cultural change that would significantly alter the motility of Indian and Omani women in Muscat can only be expected in a very long-term view. Different aspects of the transport system can be adapted quicker and such a change is much more likely. We therefore focus our final discussion on the physical transport infrastructure in particular. The measures described in the following could at least partly attenuate the restrictive effects of social inequalities and incorporated cultural norms.

Our interviews revealed that access to the public transport system can and should be expanded because easily accessible (shaded) bus stops in the residential neighborhoods and a densified bus network would at least facilitate access and appropriation of the public transport system for Indian women and other expatriates with middle and low income. While many Omani women already have access to private cars, many Indian women do not due to economic restrictions. The rather high cost of obtaining a local driving license tends to stand in the way of gaining the necessary competence to drive a car which would enable Indian women to use the family car when the husbands do not need it for working purposes. Achieving this competence could be facilitated only by reducing those costs. However, unlike the measure of improving the bus system and the bus stops, lowering the hurdles of obtaining driving competences for Indian women is not a measure which is to be expected.

As far as taxis are concerned, for both Omani as well as Indian women, cultural and gender-specific issues are the biggest obstacles for appropriation. These could be avoided by the introduction of female (shared) taxis, driven by women and taking only women as passengers. The introduction of female taxis, however, has not been prominently discussed although this measure would hardly face any infrastructural obstacles. This might hint to the conclusion that women's mobility until this date is considered an individual or family issue and not a need that has to be met by governmental authorities.

Looking beyond the specific local context to our study, our findings stress that measures striving at the enhancement of motility in general and women's mobil-

ity in particular, should not be undertaken without analyzing and understanding the socio-economic and cultural context. These socio-economic and cultural constraints may restrain appropriation even when - objectively - access to certain means of transportation might be given. This resonates with Kwan and Schwanen's (2016: 252) advice that Western theories cannot be "simply exported as if they were universal tools for making sense of other parts of the world". While we are convinced that our analytical concept has enabled us to understand individual mobility patterns from a subjective and culturally sensitive perspective, we are well aware that the ensuing analysis remains anchored in a Western gaze. Further research on mobility in Oman from a genuinely local (and female) viewpoint, contributing to a further decentering not only of topics, but of theories as well, is therefore highly recommended.

# Notes

- <sup>1</sup> Originally, we had planned to ask the interview partners to write a mobility diary (solicited diary; cf. *Lathan* 2014: 100) and to record in it how everyday mobility is experienced. On site, this did not prove to be realistic, as writing diaries is unusual in Oman. In discussions with the local research assistants, an alternative approach to the everyday experience of mobility was developed ad hoc, based on the intensive use of smart phones, especially by the younger generation. We are not aware of any other studies in which people themselves document their mobility on film. Instead, the activities and talks of people are usually recorded by a fixed camera (cf. *Laurier* and *Philo* 2006, *Laurier* et al. 2008, *Erickson* 2011).
- <sup>2</sup> The selection of both Omani and Indian interview partners includes women who have the means to choose at least to some extent from different existing mobility options even if they do not have a driving license themselves.

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