



ACTION PLAN

D.T2.1.5 | Shared Mobility

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1. Project background and programme context

LAirA addresses the specific and significant challenge of the multimodal, smart and low carbon mobility integration of airports in the mobility systems of Functional Urban Areas (FUAs) of Central Europe (CE). Airports are key assets of CE FUAs and important transnational transport gateways for CE citizens. The magnitude and growing trend of air traffic (on average 10% per year in the EU) requires actions for the improved and sustainable landside accessibility of FUAs to airports.

LAirA's ambition is to reduce the energy use and the negative environmental impacts of transport activities in central-European urban centres and their hinterlands by provoking a change of mobility behaviours of passengers and employees of airports. By building novel strategies that are available for public entities low carbon mobility planning should be improved. The 56 million passengers and 39,000 employees of the airport systems in the FUAs of Vienna, Budapest, Warsaw, Bologna, Stuttgart, Dubrovnik and Poznan are addressed by the LAirA developments. LAirA shall develop the capacities of public entities - local and regional authorities and airports -, that jointly plan and implement low carbon mobility solutions.

A transnational and innovative comprehensive approach is used that integrates seven key thematic areas:

- Electric mobility,
- Air-Rail links,
- Walking & cycling,
- Shared mobility,
- ITS,
- Wayfinding,
- Road Public Transport.

LAirA defines in a transnational policy learning dialogue the action plans for low carbon mobility of airport passengers and employees, taking into consideration multiple types of actions/measures (the seven LAirA thematic areas) not only related to public transport (competence of authorities) but also to further integrate other low carbon mobility solutions (e.g. e-mobility, car-sharing).

Strategies for low carbon integration of airports in FUAs are defined in a governance process involving airports, authorities, agencies, transport providers, associations & nodes. WPT2 focuses on action planning low carbon mobility services & changing behaviour for low carbon airports accessibility in FUAs. The expected output is a transnational Action Plan for multimodal, smart and low-carbon accessibility in airport FUAs.



2. LAirA thematic focus: Shared Mobility

a) Definition for the LAirA context

Within the LAirA project, the topic of Shared Mobility covers the shared use of vehicles and rides - both, motorized and non-motorized. In the field of motorised private transport, commercial and privately organised car/ride-sharing exist. Commercial car/ride-sharing is organised and operated by e.g. a fleet manager or a car company (e.g. car2go by Daimler) or (in case of commercial ride-sharing) by companies/associations that operate a platform for matching joint rides. Commercial car-sharing can either be organised free-floating or station based. Examples for a free floating (commercial) car-sharing offer are car2go or DriveNow (BMW). A station-based service requires the user to return the car at designated parking spaces, e.g. Flinkster, which is a service provided by the Deutsche Bahn AG (a German railway company).

Besides the commercial car-sharing, also privates may organise the common use of a vehicle peer-to-peer, either using a platform or just by face-to-face agreements. The same principle can be applied for shared rides, in many cases enabled through matching platforms such as flinc or carpooling (both available in Austria and Germany).

Today, various business models that combine different elements, e.g. private cars that are operated commercially as shared-cars (e.g. 'BeeRides' near the Budapest Airport) or integrated multimodal mobility services (e.g. rentable cars, shared e-bikes and public transport hubs) that include car/ride-sharing and hence, simplify its usage and generate higher acceptance by its (potential) users.

Within the LAirA project, commercial car-sharing services (e.g. DriveNow, Car2Go) that serve the airport and station-based bike-sharing are subject to this Action Plan. Furthermore, peer-to-peer ride-sharing that is enabled through platforms are subject to this document. The content of this Action Plan is created by LAirA project partners and cited from literature and best practice examples, respectively project/company/platform websites. The aim of this Action Plan about Sharing Mobility for LAirA airports is to support decision makers in low carbon mobility planning for airports and their FUAs.

This action plan does not aim at examining commercially operated driving services (e.g. Uber) or taxi services and does not evaluate or recommend any specific ride hailing service within the context of landside airport access. Further, car-sharing/bike-sharing products or services that are co-developed by an airport are not subject to the hereby proposed actions and measures.

b) Current trends across Europe

Station-based and free-floating car-sharing services that are operated commercially by companies are mainly available in urban agglomerations throughout Europe. Free-floating services provided by OEMs that are widely spread among European cities are for example car2go by Daimler, DriveNow by BMW/Sixt or Mol Limo provided by the MOL Group (e.g. in Budapest). However, not just cities/urban agglomerations offer car-sharing services; also rural areas and its smaller municipalities try to enable mobility for those that are not able or willing to own/use a (private) car and lack of public transport offers (e.g. ECARREGIO southern of Vienna).

Daimler operates in total around 14,000 vehicles, also covering the European cities of Berlin, Madrid, Milano, Stuttgart and Vienna. The company registered a user increase of 30 % in 2017. In January 2018 more than 3 million people are registered as car2go users, thereof 1.72 Mio users are registered in Europe.¹

¹ car2go Deutschland GmbH, 2018



In smaller cities down-scaled sharing services are offered, such as in the second largest city in Austria, Graz with around 290,000 inhabitants in 2018. An example can be given with “tim”, which calls itself as an innovative mobility model that combines different modes of transport. Tim is a service of the local transport authority of the City of Graz and founded within a R&D project in Austria. Besides car-sharing and the rental of cars, also public transport, e-taxis and bike-parking are integrated in the service platform; online as well as on-site. Users may activate the tim-card which enables the usage of the car-sharing and rental cars, collects information on the requested taxi kilometres and shows the public transport yearly pass for the City of Graz on the backside. Of course, also the tim service is dependent on a certain density in a region and chooses its locations very carefully. A must-have criterion for implementing a tim-station is the connectivity to public transport, meaning the intermodal interchange opportunity. More information on tim can be found here: <https://www.tim-graz.at/>.

A recently published PwC study assumes that every third kilometre will be driving by any shared mode in 2030.² Here, the concept of Mobility as a Service (“Maas”), meaning the availability of connected and integrated mobility services, plays a major role towards the success and acceptance of car-sharing. Considering the increasing digitalisation of various areas of life, such as mobility, the organisation of trips should be easier and required information should be easier accessible. According to study results from Vienna, 44 Mio car kilometres and in total 7,000 tons CO₂ may be saved through the implementation of car-sharing services (by referencing to a baseline of around 100,000 Viennese inhabitants using car-sharing services).³ According to the Airport of Vienna, the demand for parking spaces for car2go and DriveNow cars is much higher than the available amount of parking spaces.

Across Europe commercial car-sharing offers are available at various airports such as the Vienna International Airport (car2go, DriveNow), Bromma Stockholm Airport (car2go, DriveNow), Brussels Airport (Zipcar, DriveNow), Düsseldorf Airport (car2go, DriveNow), Budapest Airport (peer-to-peer car-sharing service BeeRides), Stuttgart (car2go), Milano Malpensa Airport (e-vai) as well as Milano Linate Airport (car2go, e-vai).

Furthermore, certain smartphone applications (apps) enable and simplify the usage of sharing offers for customers. In a separate report various apps, including the LAirA airport’s apps were analysed and described considering their functions and content of information.

² <https://www.automotive.at/kfz-wirtschaft/pwc-studie-trend-zum-car-sharing-159473>, 3.5.2018

³ <https://www.wien.gv.at/verkehr/kfz/carsharing/pdf/carsharing-evaluierung.pdf>, 3.5.2018



2.1. Relevance of LAirA topic for airports in general

a) Policy background

In neither of the LAirA airport's existing policies (information available for Budapest, Mazovia, Poznan and Vienna in July 2018), the topic of Sharing Mobility plays an important role by now. However, transport/mobility planning strategies as well as spatial planning and regional development plans aim at achieving a sustainable and resilient transport system and airports are mostly highlighted because of their contribution to economic growth.

b) Best practices in/around airports

At **Brussels Airport** car-sharing facilities are provided via two providers, DriveNow and Zipcar, at Brussels Airport. DriveNow also offers a car-sharing service at Brussels airport located at P3 Holiday Parking (long stay) and ZipCar has parking spaces in Car Park 2 Car Rentals.

Car sharing facilities are provided via two providers, DriveNow and Car2Go, at **Vienna Airport**. Schemes operate as free-floating car-sharing schemes, where users that leave the airport can finish their journey in the zone of operation in Vienna. Users must pre-register online or with an app. Car2Go has a dedicated web page for the Vienna Airport. However, there is an additional 'airport fee' to travel between Vienna and the airport or vice versa. Vehicles available include the Smartfortwo, and Mercedes A, CLA and GLA. Payment is per minute, though packages are also available which are time and kilometre based. Car2Go also provides an option for setting up a business account. The same Car2Go account can be used in the other European countries where Car2Go operates. A new account is required for use in the US or China. Car2Go have an arrangement with Austrian Airlines where Austrian Airlines customers do not have to pay a registration fee and get additional credit. Car2Go has a similar arrangement with Lufthansa. DriveNow works in a very similar way, though the vehicle options include BMWi3 electric car. DriveNow and Car2Go schemes are in the process of being combined by BMW and Daimler.

Staff working at employers based at London **Stansted Airport** can register with the car-pooling scheme online. The website allows users to find potential car-pooling partners making similar commuting journeys to them. The car pool is made up of those working for employers based at Stansted airport. The Commuter Centre website provides information about how to share rides safely. A cost calculator is also provided, so users can calculate financial savings. As well as the personal benefits of reduced travel costs, participating staff can benefit from 50 car-pooling priority parking spaces, an Emergency Ride Home scheme where a employees can get a taxi ride home in case of emergency. Members are also able to take advantage of a range of discounts including opticians, local leisure attractions and breakdown cover.

c) Limitations and potentials

The success of sharing mobility offers highly depends on the population density and hence, demanding customers towards this service. Furthermore, such as other offers as well, car-sharing services attract a certain user group (by now a typical car-sharing user is young, male, and well-educated) which may limits the potential amount of users as well. Besides that, also the liability of sharing mobility offers represents a service limitation to a certain degree. Sharing mobility services, especially when it comes to short-term and flexible availability needs, there is no guarantee that offers are available at certain locations and times. Either an early enough pre-booking system should be offered or a so-called "backbone" for this transport service should be available, such as public transport or ride hailing services (especially when it comes to airport accessibility). When having a look at statistics about actual car-sharing users and non-users saying they'd be interested to use it, shares are widely differing. It seems that the barriers of actually using car-sharing offers are still there.



2.2. LAirA key objectives for future developments

Of course, the key objectives within this topic aim at achieving the set overall European/Interreg programme goals as well as the LAirA goals. The programme specific objective is to improve capacities for mobility planning in functional urban areas to lower CO2 emissions. Hence, the LAirA project aims at setting/recommending actions and measures to reduce the carbon foot print of transport activities related to airports landside connectivity in FUAs. LAirA aims at reducing energy use and the environmental impacts of transport activities in FUAs with reference to the landside mobility needs of airports passengers and employees. It aims at reducing air pollution and GHG emissions of transport traffics between the airport and the FUA in which it is located (urban cores and hinterlands) and the neighbouring FUAs which are part of its catchment area. The LAirA strategic goal and introduced change are comprehensive strategies dealing with the dimensions of transport services organization (new services and improvement of existing ones), funding of transport services & infrastructures, technological innovation and behavioural change in transport choices of citizens, towards a low carbon and environmentally sustainable airport landside connectivity in FUAs. This is done by increasing the capacities of public entities in low carbon mobility planning, delivering change in citizens mobility behaviours and by developing novel comprehensive local and transnational strategies in airports - FUAs connectivity.

Within this field, and especially addressing CO2 footprint reductions, LAirA aims at promoting sharing mobility to reduce the amount of single-person travelled motorized vehicle kilometres in respective airport's FUAs. Specific key objectives of this LAirA Sharing Mobility Action Plan are listed below:

- Increase the share of employees and passengers using shared mobility offers (esp. in regions with weak public transportation network/connections/areas of low demand)
- Increase of travelled kilometres in vehicles occupied with >1 person (to/from the airport)
- Expand commercial car-sharing parking spaces at the airport when/where needed (in time)
- Engage employees for paring up for commuting to/from the airport
- Motivate employees (and where feasible passengers) for commuting by bike to/from the airport

3. LAirA actions: Sharing Mobility

3.1. LAirA measures/actions addressing key objectives

According to the key objectives, certain actions and measures are recommended within this action plan, including time periods, responsible/involved actors and risk mitigation measures. The following table shows the objectives and respective recommended actions.

Table 1: LAirA Sharing Mobility Objectives and Actions

Objectives	Actions
<ul style="list-style-type: none"> • Increase the share of employees and passengers using shared mobility offers (esp. in regions with weak public transportation network/connections/areas of low demand) • Expand commercial car-sharing parking spaces at the airport when/where needed (in time) 	(1) Establishment of (commercial) car-sharing services (2) Implementation/promotion of bike-sharing services (3) Promotion of (informal) ride-sharing services/platforms
<ul style="list-style-type: none"> • Motivate employees (and where feasible passengers) for commuting by bike to/from the airport/work 	(2) Implementation/promotion of bike-sharing services



<ul style="list-style-type: none"> • Increase of travelled kilometres in vehicles occupied with >1 person (to/from the airport) • Engage employees for paring up for commuting to/from the airport 	<p>(3) Promotion of (informal) ride-sharing services/platforms</p>
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3.2. Action 1: Establishment of (commercial) car-sharing services

a) Implementation of (commercial) car-sharing services (*category: transport service*)

Commercial car-sharing services are already available at some LAirA airports, such as Vienna, Stuttgart and Milan (e.g. car2go, E-VAI). Of course these airports and respective cities count appropriate citizens numbers, subsequently a required critical mass for commercial free-floating car-sharing services provided by e.g. Daimler or BMW. Station-based car-sharing services also appear successful on a smaller scale, but have the disadvantage that renters/drivers must always pick-up and return the car at the same location. Especially at the initial phase of such a service, it is advisable that the liability (from a user’s perspective) is strengthened and the demand would not lack of appropriate offered/available services. Either way seems tricky for Hinterland airports with a smaller and irregular volume of passengers. The aim of this action plan is to give a guideline for airports to initiate a process of implementing sharing mobility offers.



b) Overview on measures

The following Table 2 shows the proposed measures, actors to be involved, arising barriers, a rough timeline as well as accompanying changes and improvements.

Table 2: Measures Sharing Mobility Action 1 - Commercial car-sharing services

Measure	Actors involved (Target groups and agents of change and their role)	Barriers	Timeline	Estimated changes/improvements in general addressing airports and their FUA
Internal Airport Meeting	Airport staff/decision makers	Willingness to offer new services or to provide sufficient parking infrastructure	Short-term	Dialogue and initiation on serving the airport with commercial car-sharing offers
Meeting with relevant car-sharing companies / start of cooperation process	Airport staff/decision makers, car-sharing companies	Willingness to cooperate from car-sharing companies	Short-term	Setting first impulses for initiating car-sharing services that serve the airport
Test trial for commercial car-sharing services	Airport staff/decision makers, car-sharing companies, test/end-users	Willingness to cooperate from car-sharing companies, willingness to offer new services or to provide sufficient parking infrastructure from the airport's perspective	Middle-term	Increasing of user acceptance towards the new service by providing hands-on trials
Contracting of (commercial) car-sharing services	Airport staff/decision makers, car-sharing companies	Agreement upon the conditions accepted by the airport's decision makers and car-sharing companies	Long-term	Gaining of prospective customers and hence, increasing of car-sharing users commuting to the airport, especially those preferring individual motorised transport (<i>threat: shift from public transport usage to car-sharing</i>)
Monitoring of implementation process and user behaviour	Airport staff, external consultants	Data collection and respective careful handling of data (for monitoring purposes), cooperation with car-sharing companies when it comes to data exchange (anonymous data) for monitoring purposes; barriers for the usage: especially for non-local passengers, the barrier of a new system in a foreign city/country may arise and impede the usage	Long-term	Knowledge building regarding the usability and user acceptance of the new service and ability to react by improving the service



c) Information on other modes/topics that would be affected

The advantage of car-sharing or bike-sharing offers especially arises when it comes to intermodal/multimodal mobility behaviour and offers. Having the possibility of choosing between various modes of transport and not solely being dependent on individual private cars, may mitigate emissions in transport. Therefore, seamless travels (e.g. having continuous transport options between A and B), where sharing mobility options play a major role, may be highly demanded (in the future) and strongly promoted by transport policies. This means, that also other need such as the availability of integrated mobility platforms or travel planners as well as (physically installed) mobility points (such as tim in Graz) are needed. Of course, also electric mobility and soft mobility actions are affected by the measures stated in this action plan. Furthermore, also the overall area management of the airport must be involved, since the implementation of car-sharing offers also depends on the availability of respective parking spaces and accessibilities.



3.3. Action 2: Bike-sharing services

- a) Implementation of bike-sharing services for immediate surrounding areas
(category: transport service)

In order to enable and foster shared (soft) mobility offers, the implementation of bike sharing services can be considered from an airport’s perspective. However, the installation and maintenance of this service depends on the reasonable accessibility of an airport and its FUA when it comes to bike use. Though, this service could also be installed for employee’s on-site mobility, such as at the Airport of Vienna. Two stations of the local provider “nextbike” are available at the Viennese Airport. At the Copenhagen Airport, it is even possible to make use of free bicycle parking spaces within walking distance of the terminals.⁴ Since the Airport of Copenhagen is accessible within a distance of only 6km from the City Centre, biking also seems appropriate for passengers in this case. The City of Vienna, on the other hand, is located ca. 17km far from the airport and hence, not really attractive for (mainstream) travellers to commute by bike. The most likely use case for bike sharing use for most of the bigger European Airports would be the employees’ mobility.

- b) Overview on measures

Table 3: Measures Sharing Mobility Action 2 - Bike-sharing services

Action	Actors involved (Target groups and agents of change and their role)	Barriers	Timeline	Estimated changes/improvements in general addressing airports and their FUA
Internal Airport Meeting	Airport staff/decision makers	Willingness to offer new services or to provide sufficient parking infrastructure	Short-term	Dialogue and initiation on serving the airport with bike-sharing services
Meeting with relevant bike-sharing companies / start of cooperation process	Airport staff/decision makers, bike-sharing companies, municipalities (that offer such a service)	Willingness to cooperate from car-sharing companies	Short-term	Initiation of process for having bike-sharing services
Test trial for bike-sharing services	Airport staff/decision makers, bike-sharing companies, municipalities (that offer such a service), test/end-users	Willingness to cooperate from car-sharing companies, willingness to offer new services or to provide sufficient parking infrastructure from the airport’s perspective	Middle-term	Hands-on trials and increasing of user acceptance towards the new service

⁴ <https://info.parkering.cph.dk/en/bicycle-parking> (11.7.2018)



Contracting of (commercial) bike-sharing services	Airport staff/decision makers, bike-sharing companies, municipalities (that offer such a service), airport's construction department	Agreement upon the conditions accepted by the airport's decision makers and car-sharing companies	Long-term	Increasing of bike-sharing users commuting to the airport
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c) Information on whether also another mode/topic would be affected

This topic also affects the soft mobility actions set-up/recommended within LAirA.

3.4. Action 3: Promotion of informal ride-sharing (for employees)

a) Implementation/promotion of existing (informal) ride-sharing platforms
(category: awareness raising)

By 2018 a broad range of informal ride-sharing platforms such as “Drive2VIE”, a service promoted by the Vienna International Airport and Austrian Airlines, do exist. These platforms match requested and offered rides with the aim of saving resources. For users, the main motivation for sharing rides is the financial benefit on individual level (e.g. shared gas costs), subsequently, also transport-related emissions can be reduced and capacities of roads and parking spaces may be enhanced. Roles and duties have to be allocated among different involved actors, e.g.: There must be an organiser/‘match-maker’ defined that is responsible for the enabling of matching rides and people, there must be a platform provider (e.g. “flinc⁵”), there must be ride providers as well as ride demanders. The following chapters cover (b) proposed measures, (c) potential sustainability impacts and (d) risk mitigation measures.

b) Overview on measures

Table 4: Measures Sharing Mobility Action 3 - Ride-sharing for employees

Action	Actors involved (Target groups and agents of change and their role)	Barriers	Timeline	Estimated changes/improvements in general addressing airports and their FUA
Screening and best practice analysis of existing ride-sharing platforms	Airport's human resources department (and others)	Lack of financial and human resources for investing in market research, lack of perceived need for such a service	Short-term	Awareness raising among human resources departments and potential users regarding ride-sharing and emission mitigation
Meeting with respective (platform providers)	Airport's human resources department (and others), platform providers	Lack of suitable platform providers and lack of integration possibility	Short-term initiation, fostering cooperation on a long-term basis	Initiation of cooperation processes between airports and ride-sharing platform providers

⁵ <https://flinc.org/> (11.7.2018)



Test trial for ride-sharing platform	Airport's human resources department (and others), platform providers, test/end-users	Difficulties regarding the identification and acquisition of test users (critical mass for demanded/ offered routes)	Middle-term	Try out of the service's/platform's functionality and the user's needs and behaviour towards the new service
Ste-up of backbone for ride-sharing platforms (e.g. provision of emergency ride home scheme)	Airport's human resources department (and others)	Lack of (financial) resources for backbone solutions	Middle-term	Enhancement of reliability of the transport system for airport employees
Contracting of ride-sharing platform/ airport's company branding	Airport's human resources department (and others), platform providers, test/end-users	Difficulties regarding the identification and acquisition of test users (critical mass for demanded/ offered routes), maintenance of users (and the platform)	Long-term	Mitigation of individual car rides by matching rides on certain routes



3.5. Sustainability Potential/impacts

Table 5: Sustainability Impacts Sharing Mobility

Sustainability area	Potential impacts on defined actions
Ecological	Sharing mobility measures are aiming at saving energy/polluting emissions in motorised transport. In relation to airport accessibility, the implementation of sharing mobility systems may reduce the CO2 emissions per capita when commuting to/from an airport; either by sharing a vehicle, a ride or by enjoying the advantages of a shared bike. Of course, car-sharing cars do not necessarily replace a private car (ride to/from the airport) per se. However, many car-sharing companies offer electrified vehicles (e.g. HEV, PHEV, BEV) and therefore the ecological footprint per capita may decrease. Indirectly, having the offer of car-sharing offers for commuting to/from the airport (especially in regions with lack of public transport), the purchase of a second car within a household may be mitigated and CO2 emissions may be saved in a broader context (considering employees' mobility within the respective FUA).
Social	Especially in locations and/or occasions where people not owning a private car but would benefit timewise (due to enhanced accessibility, reduced travel times) from driving by individual motorized transport, car-sharing complements weak public transport networks or enables longer-distance rides, e.g. in Hinterland regions. In terms of bike-sharing active mobility and health would be promoted and this could contribute to the well-being of a society or more specific, employees. Furthermore, as part of the sharing economy, sharing mobility enables and (somehow) encourages social interactions/exchange and collaboration between individuals.
Economic	Sharing mobility offers are aiming at saving financial investments and maintaining costs regarding individual mobility. Further, financial advantages may be generated for airports as well through collaboration and parking space rentals on-site. When it comes to informal car/ride-sharing, financial benefits for individuals (e.g. airport employees) may be generated through sharing ride costs/vehicle maintenance costs.



3.6. Risk mitigation measures

New actions and measures may contain certain risks when it comes to their implementation and subsequently, their impacts. These risks should be taken into account in an early stage and mitigation measures must be considered. The following table shows potential risks and mitigation measures/strategies.

Table 6: Risk Mitigation Measures Sharing Mobility Action 1 - Commercial car-sharing services

Potential risks	Mitigation measures/strategy
People that usually use their bike or public transport shift to car-sharing	Extra fees for parking at the airport (e.g. as practiced in Vienna), so it attracts a certain user group (e.g. business travellers, people that travel at times where no public transport is available and cabs are way more expensive)
Lack of usage of the service/absence of a critical mass of car/bike/ride-sharing users	Early marketing initiatives and cooperation with Airlines with the aim of promoting the car-sharing services as added value travel option to/from the airport
Missing knowledge at the airports regarding responsibilities/responsible departments	When decisions for implementing sharing mobility services at airports are made, respective departments should be getting involved in the process and the commitment of the airport's decision makers may be advantageous
Lack of usage of the service	Early marketing initiatives and cooperation with Airlines with the aim of promoting the car-sharing services as added value travel option to/from the airport
Mitigation of user acceptance and subsequently declining of user rates due to seasonal variations of the service provision	On-time availability of shared bikes (e.g. after Winter) at respective stations and ensuring of continuous maintenance of the service
Uncertainties regarding service maintenance and responsibilities	Early definition of distinct responsibilities and respective monetary (company/department-wise) budgeting for a certain period of time (for which the service should be operated)
Error susceptibility of the hard- (e.g. bikes, stations) and software (e.g. booking system)	Profound market research regarding best practices and thoughtful selection of well-functioning services
Non-acceptance by users due to lack of matching between demand and supply	Early/offensive marketing initiatives for promoting the service especially driven by the Human Resources Department, incentives for users (e.g. gas vouchers, benefits provided by the employer)
Safety doubts and compliance issues	Set-up of socially and ethical acceptable rules for the usage of the service and safety/security measures for strengthening the subjective perception of safety of the users, also by implementing <i>experience sharing</i> options (e.g. reviews of rides).
Low liability towards available rides/matches due to lack of low informal ride-sharing offers (in a region)	Establishment of joint groups for people commuting in similar directions, marketing throughout the whole company, collection of user feedback and adaption of the service where needed, incentives



4. Sources

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