



Smart and Inclusive
Solutions for a Better
Life in Urban Districts

Smart City Toolbox

Replicable measure:

Vienna - E-car sharing in social housing

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E-car sharing in social housing

Presentation of the measure

In Vienna, electric cars are shared on a residential neighbourhood scale. This included the installation of the hardware (e-cars, loading infrastructure, booking platform) and facilitation of the car-sharing business model at existing social housing and tenant communities.

The station is located in a semi-public area (on the ground of the social housing company called BWSG, however openly visible and accessible) in order to address more tenants. Some of the existing parking slots are reserved for e-car sharing. Four charging points have been installed: three for the sharing cars and one for a potential private e-car charging.

Three e-cars are at the disposal of all tenants with different types of cars targeting different needs and core publics:

- Nissan E-NV200 Evalia: dedicated to serve transport needs,
- Nissan Zoe: dedicated to serve for city excursions,
- BMW i3: dedicated to a public acting especially as change agents in the neighbourhood.

Some tenants are actively involved in the management of the service and are thus called the “active group” as they are acting as a contact point, are involved in the cleaning etc.

The basic fee is 1 euro per hour and 10 eurocents per kilometre. The “active group” benefits from a lower fee of 50 eurocents per hour.

Budget needed

EUR 66.750,00 of investment in cars, loading stations etc.

Funding sources

The investment was done by BWSG (social housing company) with a SMARTER TOGETHER funding of EUR 66.750,00 representing 100 % of the total investment.

Implementation timeframe

Approximately:

- 6 months dedicated to the planning and preparation phase
- 2 months dedicated to installation and testing (hardware, software)

- 1-2 years dedicated to running, support and mentoring

Partners required to implement the solution

- BWSG (social housing company) for the commissioning of equipment
- Caruso as provider of e-cars, loading infrastructure and software solution (booking, billing etc.) and operation
- Wohnbund:consult in charge of the connection to the user target group for information and introduction to the service; daily Questions & Answers

Preparation of the ground to create a fertile ecosystem for this measure to be set up

Partners involved in the preparation:

- SMARTER TOGETHER initiated the process at its very beginning; it finances its implementation and stands as innovation authority backed by a European vision for the global message and goal of the project. As such, SMARTER TOGETHER is key in all field communication events and media communication and promotion.
- BWSG takes decisions and clarifies various framework conditions.
- Caruso provides the vehicles and its expertise in all technical and economic matters related to car sharing.
- Wohnbund:consult communicates to tenants, informs and activates them to get involved in the e-car sharing.

In order to achieve the goals, conception workshops, events, resident talks and an online survey were conducted in advance, as follows:

- In several design workshops between May and September 2016, the framework conditions were analysed, various implementation options discussed and the concept elaborated.
- In order to inform the tenants, two events and communication set-ups were organised in November 2017.
- All residents had the opportunity to participate in a survey on the future electric car rental (e-car sharing) in the residential complex of BWSG. In total, more than 120 people took part in the survey. Thanks to these numerous answers and feedback, it was possible to adapt optimally the mobility offer to the needs of the residents. In addition, a segment of the residents was activated for the offer.

The results of the above-mentioned actions were designed to lead to a tailor-made concept for the housing estate of Hauffgasse and its inhabitants.

Car sharing projects usually take some time to gain widespread acceptance. Therefore, the essential offer of the BWSG and SMARTER TOGETHER was to ensure a long term accompanying of the project process by Caruso and wohnbund:consult. However, the project would have no basis without the energetic and dedicated support of active e-car sharing users.

Step by step approach

- One e-car was offered for testing
- Four charging points installed – three for the sharing cars and one for a potential private e-car charging.
- Three e-cars are in operation (one small car, one transporter and one high class car)
- Mid of September until mid of October there was a survey among the tenants, about their interest and the potential usage of the e-car sharing.
- Setting up the “active group”
- On-site support from independent persons is necessary for answering questions and reduce fear of something new.

Steps for usage:

- Registration via the platform (zukunfwohnen.net/e-carsharing) or during the inauguration event at Hauffgasse
- Getting a customer card at the info point (drivers licence and cash card necessary)
- Booking a car via carusocarhsaring.com

Results/benefits available at this stage

Number of cars	3
Registered users	ca. 70
Active users per month	15-25
Users in April/May	22

Currently (as of October 2018), all three electric cars are in operation. The usage figures are very good, also in

Members of the Active Group	13
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Current figures	Jan	Feb	Mar	April	May	June	July	Aug	Sept.
Kilometres driven [km] - BMW i3	1.772	1.507	2.650	1.876	1.994	1.790	2.132	2.292	3.395
Kilometres driven [km] - Nissan E-NV200 Evalia	308	796	864	451	1.007	1.047	601	1.244	1.427
Kilometres driven [km] - Renault Zoe	-	788	2.302	1.398	2.657	2.237	2.308	2.822	3.894
Kilometres driven [km]	2.080	3.091	5.816	3.725	5.658	5.074	5.041	6.358	8.716
Rental duration day [h] - BMW i3	247,5	242,0	275,0	221,5	243,0	260,5	339,0	313,0	377,0
Rental duration day [h] - Nissan E-NV200 Evalia	67,5	126,0	148,5	98,0	194,0	161,0	113,5	194,0	185,0
Rental duration day [h] - Renault Zoe	-	259,0	267,0	177,5	223,5	277,5	231,5	232,5	399,0
Rental duration day [h]	315,0	627,0	690,5	497,0	660,5	699,0	684,0	739,5	961,0

comparison to other car sharing offers and are still rising.

The “Active Group” continues to be very committed to the cause and makes it possible to look positively into the future. There is also a small increase in the number of active members since the beginning of the project. The figures for use and utilization (until May 2018) of the cars can be found below:

80 users registered to the online app and there are 40 active users of the app, mainly retired persons.

The figures for use and utilization (until May 2018) of the cars can be found below:

Is this measure a low hanging fruit?

This measure is not a low hanging fruit as a lot of planning and convincing was necessary and the economic feasibility after the end of the SMARTER TOGETHER project is still unclear.

Lessons learned, enablers, barriers, solutions found

Communication work is very necessary:

- Several information events were carried out on-site for the target group before the installation. This was important in order to avoid mistrust and wrong interpretations as several tenants thought that all of them would have to pay for the e-car sharing regardless of the usage.
- The high support and accompaniment by wohnbund:consult was urgently needed.
- The strong involvement of the sharing provider (Caruso) and the cooperation with the tenants and future users was very important.
- On-site support was required from independent persons and the “Active group” for answering questions and reduce fear of something new.

A specific highlight needs to be set on the “Active Group” who are proud of the e-car sharing in Hauffgasse and they take responsibility for the cars and their role.

They actively recruit new users for the sharing system. Via this group, the new technology is accepted in a better way resulting, among others, in a positive impact on the economic efficiency.

Initially, the fact that the concept was new attracted the users as they had the opportunity to test e-cars, however, it is not yet known how they will react after they get used to this concept.

The business model is the critical point:

- Using a proven business model is very important.
- The “Active Group” increases usage and the economic liability of the business model because the tariff of the users is subsidised by SMARTER TOGETHER and the tariff will increase at the end of the project.
- The higher tariff was previously foreseen, planned and communicated to the tenants.
- The impact of a higher tariff on the usage is not yet known.
- At this stage it is unclear whether the tenants are setting up a new company in the future, as currently it is the housing company that pays and collects the income of the usage, while all the other expenses are covered by the SMARTER TOGETHER project.

As a conclusion, the business model is not well defined at this point.

Replicability

The solution is replicable in Vienna via other social housing companies as well as private housing ones. Potentially a new service company would be needed to “build the bridge”.



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Further information:

<http://www.smartertogether.at/start-e-carsharing-in-der-haufigasse>

<http://www.zukunftwohnen.net/>