INTEGRATED ACTION PLAN

BIELEFELD

European Union
European Regional Development Fund

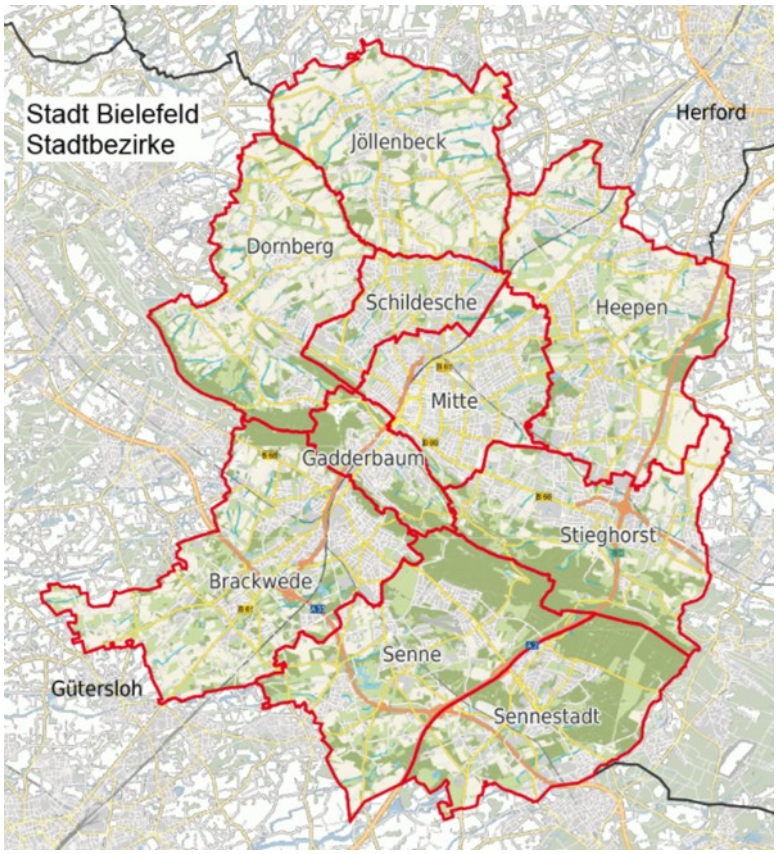
space4 people

Stadt Bielefeld

INDEX

Location and territorial context

Bielefeld is a city with a heterogeneous and polycentric settlement structure. With an area of 258 square kilometers and some 340,000 inhabitants, it is the 18th most populated city in Germany and No. 8 in the federal state of North Rhine Westphalia.The city is divided into ten districts, which, in terms of settlement structure, can be divided into a densely populated center with the city districts “Mitte” and “Schildesche” as well as the more extensive eight outer districts. Due to the partly rural outdoor areas nearly 50 percent of the city are agricultural and forest areas, which is slightly above the average of small cities in North Rhine-Westphalia. A special structural feature of Bielefeld is the division into two parts by the Teutoburg Forest, which is both green lung and "traffic needle".



The city structure can also be seen in the interlinkages. The Bielefeld city center, with its high proportion of jobs, is the nerve center of the path links. The most commonly used traffic links are radially aligned with the center. In addition to the city center, the district centers characterize the city. Thus, e.g. the district centers “Brackwede” and “Sennestadt” south of the Teutoburg Forest and the center of “Heepen” northeast of the city center have high domestic traffic. Important traffic generators outside of the city center continue to be Bethel in Gadderbaum district, with around 8,500 employees the city's largest employer, and the University and University of Applied Sciences Bielefeld with around 40,000 students located west of the center in the districts “Dornberg” and “Schildesche”.

The city of Bielefeld is the economic center of the region of East Westphalia-Lippe. In recent years there has been a trend towards re-urbanization. The city has grown by about 10,000 people since 2010. Forecasts for the future assume that Bielefeld will grow by a further 6 percent by 2025. The city must therefore cope with growing housing development with increasing traffic flows and expect bottlenecks in existing transport infrastructure and services.

Bielefeld is also an urban node in the core network of TEN-V (Trans-European Transport Network) and the North Sea - Baltic Corridor, which extends from Rotterdam via Berlin and Warsaw to Tallinn. As for all the other original 88 European "urban nodes", this results in expectations for the integration of the urban and regional transport network into the European core network, which according to European policy should be developed by 2030. In addition to long-distance commuters, the organization of freight and goods traffic is particularly important in this policy area.

Demography, Economy, Climate, Mobility

Demographics: The city has 339.842 inhabitants with the main share of population being in working age of 18-65. The share of seniors is slightly larger than the one of young people aged below 18. Of the senior citizens, a significant share – more of one-third of the population group, is 80 years old or older. About 16% of inhabitants are of other nationality than German.

Economy: Main economic sectors on Bielefeld are food industry, tobacco industry, private banking, metal industry, health industry. The city centre is home to a high number of retailers and shopkeepers. The GDP per capita is € 38.588, which is slightly below the German average of about €41.000. Bielefeld's unemployment rate is 7,3%.

Topography and climate: The most significant aspect hilly stretch of the "Teutoburger Wald" crossing the city south-west of its central areas. Connections to the area on the southern-western part beyond the hills go through a bottleneck between the hills. Most of the areas of Bielefeld is rather flat with good conditions for active modes of transportation. Climate conditions are moderate with mild winters and summers, albeit the recent years have seen extraordinary hot summers, too. Rain fall is present in all months of the year with only slight peaks in summertime.

Mobility data: About half of all trips in Bielefeld are done by car. The modal choices have changed only slightly between the latest two surveys in 2010 and 2017 showing a small decrease of trips by car as passenger (-4%points) and public transport (-2%points) and increases for walking and cycling of 2-3%points each. The main mode for trips, car as drivers, stayed unchanged. The most significant result is that the total number of trips decreased by 4% while the population grew in the same time by 5%. Average trip lengths almost doubled though, and time invested for transport grew too from 59min to 75min. The main trip purposes are trips to work (24%), leisure (22%) and shopping (18%). Education, business, trips to drive others as well as visits are all ranging between 5-9%. Commuting to Bielefeld increases constantly, too with today more than 82.000 persons coming to Bielefeld each day. The most traffic loaded roads are the "Ostwestfalendamm" with more than 69.000 vehicles / day and other main entry roads to Bielefeld's central areas such as the Detmolder Straße with 36.000 vehicles /day, the Herforderstraße with 33.600 vehicles / day and the Eckendorferstraße with 36.800 vehicles / day. Bielefeld is well connected to the German highway and railway network and offers a good local and regional public transport service by light rail, metro/tram and busses.

Summary of relevant EU programmes covering the city

Bielefeld provides a good history on learning and exchange activities at EU-programme scale adding both to the city: knowledge from other cities and capacities for innovative planning processes:

- Lead Partner of INTERREG IVB NWE, **BAPTS** (Boosting Advanced Public Transport Systems), Topic: Give a boost to public transport solutions in cities, Partners: 10, Role: Lead partner, Life time: 2008 – 2011
- Lead partner of INTERREG IVB NWE Project **SYNAPTIC** (Synergy of New Advanced Public Transport Solutions Improving Connectivity in Northwest Europe), Topic: Seamless travelling by public transport over borders, Partners: Cluster Project of 4 projects with nearly 50 partners, Role: Lead partner, Life time: 2010 – 2013
- Lead Partner of URBACT Project **CityMobilNet**, Topic: Development of Sustainable Urban Mobility Plan, Partners: 11, Role Lead Partner, Life time 2015 – 2018.
- Lead Partner of Horizon 2020 research project **ReVeAL** (Regulating Vehicle Access for improved Livability), Topic: The project deals with the application of Urban Vehicle Access Restrictions to the urban context, Partners: 15, Role: Lead Partner, Life time 2019 – 2022.

Policy context and state of play

Sustainable mobility: In 2016, the City Council decided to develop a sustainable mobility concept according to the SUMP standard. The main objective is to change the mobility behavior of the Bielefeld population in order to optimally use the positive effects of the individual types of traffic and to ensure healthy living and housing conditions. Bielefeld adopted its urban mobility objectives in 2018 with the main goal to change the modal split of trips in the city significantly until 2030. By this year, Bielefeld aims to see an equal distribution of trips among the four main modes of 25% each – car traffic, public transport, pedestrians and cyclists. The background of these ambitious objectives is to some extend pressure from non-governmental organisations on the city to comply with the maximum allowed threshold of nitrogen emissions. These had been above the threshold at several measurement points, foremost the Jahnplatz close to the historical city centre of Bielefeld.

Within this frame, Bielefeld is engaging in a major redesign of the Jahnplatz as its lighthouse project to address the needed changes to the urban mobility reality. The Jahnplatz was one of the central nodes for public transport interchange with metro/tram station and more than 900 busses crossing the square. Additionally, more than 20.000 vehicles were crossing, too. Road design provided motorised traffic with two lanes in each direction and direct connections to the inner-city ring. Within the new design, Bielefeld cuts the connection to the inner-city ring and reduced the lanes to one per direction. In addition, cycling lanes and better connections as well we public transport dedicated lanes were introduced. After a test phase the contruction works started in summer 2020 and got finished in June 2022.

Parking management: The parking strategy is in the responsibility of the Office for Transport. It is yet not incorporated to the general mobility strategy sufficiently, however. The city itself is responsible for the management of on-street parking, including enforcement of paid parking and other restricted areas. Off-street parking is mostly tendered or directly operated by private companies with the exceptions of 3 garages: the Town Hall garage, the theatre garage and the Kesselbrink garage. In terms of pricing, off-street parking is considerably more expensive than on-street parking, which provides a low level for fees with € 0,65 for 30 min. Residential parking permits in paid parking zones are available at a low price, too with €30 / year only and allow residents to park in their own zones as well as any neighbouring zone. Parking in the inner-city area is still free Saturday mornings with the only limit being a maximum stay of 2 hours. The strategy for paid and restricted parking zones is yet not complete being subject to further development needs to arrive at a comprehensive approach. Income from parking fees can be dedicated to transport projects directly given the approval of the city treasurer, who can dedicate these to other use if needed as well.

A recent study on the effects of mobility measures to reduce car use highlighted though the need for changes to parking management: heavy investments to public transportation alone were forecasted with a modal split change of only 4%points from car use to public transport. A cut of parking spaces in the centre by 30% however already effects a modal shift of 10% points without any supporting measures for public transport.

In September 2019, the city council of Bielefeld adopted the development of a new parking strategy introducing more strict regulations on parking by a one-vote majority only. The topic is seen controversial between the parties represented in Bielefeld's city council.

On street parking at Bielefelds Old Town

Focus of the IAP

The main challenge of Bielefeld in the scope of the current urban mobility focus of the city is parking management. The city faces pressure to act from two sides: the need to apply parking management as a central element for changing urban mobility as well as high occupancy rates of on-street parking accompanied by increasing complaints by residents on parking conditions in their neighbourhoods / parking zones. For the first, Bielefeld can rely its coming actions on the results of the before mentioned study testifying that a major change to the modal split in the city is hardly possible without employing parking management for cutting car trips. For the latter, Bielefeld faces the additional problem of more than 82.000 commuters coming to the city each day.

Bielefeld's current parking scheme has its main deficiencies and challenges - aside the lack of being an integral part to the urban mobility strategy - in:

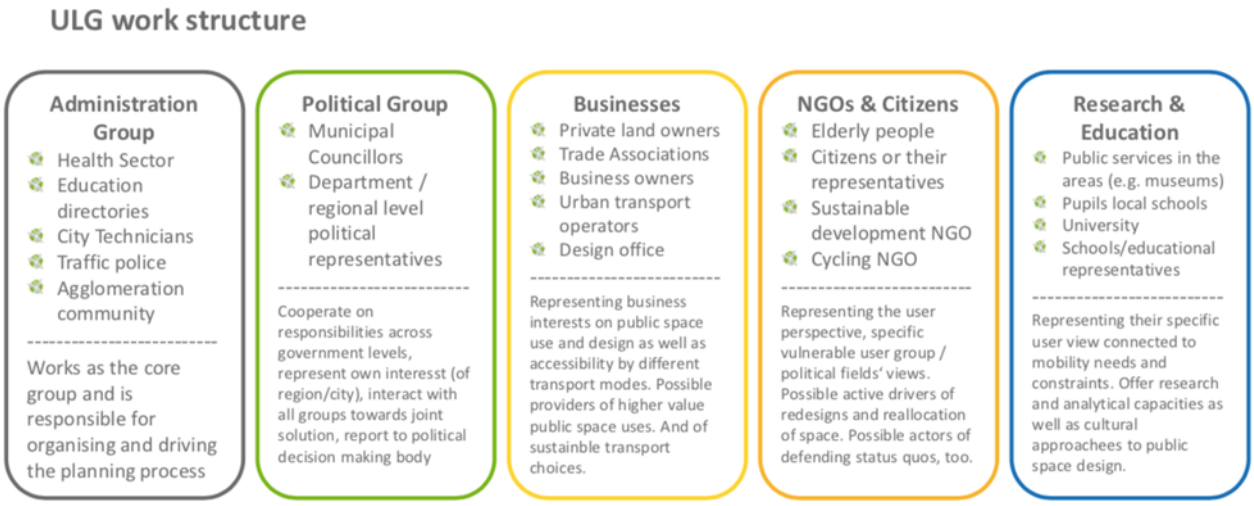
- Low fare for paid parking, especially compared to the costs of using public transport (90 min of PT use cost €2,80, parking € 1,95)
- Very low costs for residential parking of only €30/year plus low-cost for visitor parking cards
- Off-street parking options being considerably more expensive than on-street parking
- Off-street parking being managed mostly by private operators, who are as well responsible for their price level and if providing short-term or long-term parking options
- Low priority for Park+Ride facilities as an option to take parking and car traffic out of central areas
- Free parking at Saturday with only a 2hour time limit in place

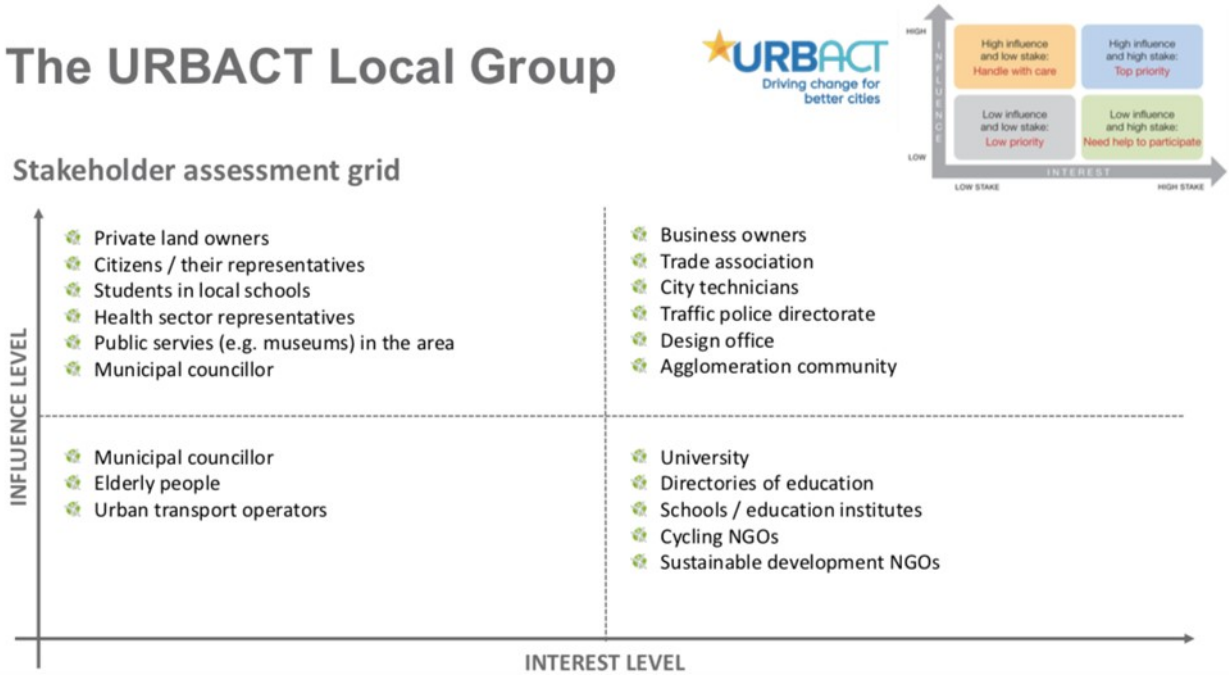
In terms of user needs and public perception, parking is a highly emotional topic for both "competing" main user groups: residents and visitors/commuters. Both are afraid of not finding a parking space due to the existing high pressure to on-street parking. Concerning the latter, an analysis of the city showcased that occupancy rates reach already 94% in the time between 4AM – 6AM in some of the city's parking zones such as the western parking zones neighbouring the city centre zone. At the same time, off-street parking spaces are not well occupied and could form an alternative for a changed parking strategy.

Connected to on-street and on-surface parking provision in central Bielefeld, the city faces an additional challenge by the impacts of parking on the quality and actual use of public space. Outdated design of mainly pedestrianised areas – partially coupled with parking options – result in a low acceptance and use of such spaces by potential users such as residents or visitors.

Description of the process

As part of Bielefelds project “emission-free city center”, various individual measures and projects to reduce emissions, including the conversion of Jahnplatz, are taken place. This includes, among other things, a concept for parking management in the city center of Bielefeld. In the course of implementing the Mobility Strategy 2030, the creation of a city-wide concept for motorized private transport (mpt) was decided by the Urban Development Committee in October 2019. In the mtp concept, both the moving traffic and car parking is considered and based on extensive analyzes measures and scenarios for the target year 2030 get developed. The concept of stationary parking management in the area of the"emission-free city center " is a sub-concept of the city-wide mtp concept.





At the start, existing planning documents, statistics and maps were analysed by an expert in order to get a comprehensive impression of the situation and to identify the strengths and weaknesses of Bielefeld. Based on these results, associations and interest groups in the city center were invited to a digital workshop in January 2021. The workshop served to determine and discuss the needs and interests of the participants in relation to traffic in the city center. Workshop participants were a diverse group with members from the national cycling association, the council for handicapped people, the city centre district mayor, housing association and developers, NGOs pushing for sustainable transport, carsharing provider, parking facility managers, churches, chambers of commerce, of retail and of crafts, real estate service Bielefeld, the fire department as well as representatives of the city administration. The results were incorporated accordingly into the development of measures. Based on the results of the inventory analysis and the digital workshop, the expert recommended the following measure packages as key building blocks for achieving the goals of the mobility strategy 2030 and the "emission-free inner city":

Reduction of parking space

The expert recommends a gradual reduction of parking space in public street space proposed where there is sufficient capacity in publicly accessible parking lots and multi-storey car parks. The focus is initially on a few streets in the immediate vicinity of the pedestrian zones in the old town and the city. In two further stages, adjacent areas and road sections on which cycle routes of the cycle traffic concept are located are prioritized.

Traffic bans

The expert considers traffic bans for motorized private transport in some areas of the old town, the forecourt of Central Station, Jahnplatz (long-term) and *Friedensstrasse,* as an

efficient means of increasing the quality of stay and reducing existing separation effects. The effects, such as shifting traffic to other roads, are to be determined and evaluated here.

Lane reduction

The expert proposes reducing lanes on sections of the higher-level road network in order to reduce the volume of traffic in the inner-city area. In addition, the environmental association can be strengthened, and the quality of stay can be increased by converting the free traffic areas. Sections on *Alfred-Bozi Strasse/Oberntorwall, Elsa-Brändström-Strasse, Herforder Strasse* and *Feilenstrasse* are the focus of this measure. It must be examined to what extent public transport acceleration measures can be taken here or the installation of bicycle traffic facilities can take place.

Reduction of the maximum speed limit

A maximum speed limit of 30 km/h needs to be examined for the higher-level road network in the inner city. This would affect *Herforder Strasse, Feilenstrasse, Elsa-Brändström-Strasse, Oberntorwall/Alfred-Bozi-Strasse, Niederwall, August-Bebel-Strasse* and *Friedrich Verleger-Strasse*. Here, too, a step-by-step implementation and testing, e.g. in the context of traffic tests as currently planned on *August-Bebel-Straße*, is proposed. The area-wide implementation of a traffic-calmed business area with a maximum permissible speed of 20 km/h is planned for the business areas within the old town horseshoe as well as the city and the area around the Central Station.

Adjustment of parking fees in streets:

In order to be able to achieve the goals of the Mobility Strategy 2030 in relation to a reduction in the proportion of mtp, an adjustment of the parking fees for parking in public street space is absolutely necessary according to the expert. This affects the entire area of the study area and will be particularly relevant in those areas in which a reduction in parking spaces is initially not possible due to low capacities in car parks (e.g. area of the district court, *Kesselbrink*). This is intended to create incentives to park the vehicles in the surrounding car parks instead of on the street. A gradual increase is planned for the increase in fees.

Objectives for Space4People work

As a consequence of the analysis phase, Bielefeld aims to elaborate a comprehensive parking strategy working as an integral part to its urban mobility policy. A certain focus of the planning process is put on the high-use zones and general changes to the on-street parking conditions. The work for the parking strategy includes elements such as:

- Create fair on-street parking pricing models
- Reduction of on-street parking spaces in central areas globally
- Work with off-street parking providers to attract more customers in order to enable further reduction of on-street parking supply
- Integration of parking measures into SUMP measure packages to increase their impact and make use of a push & pull approach

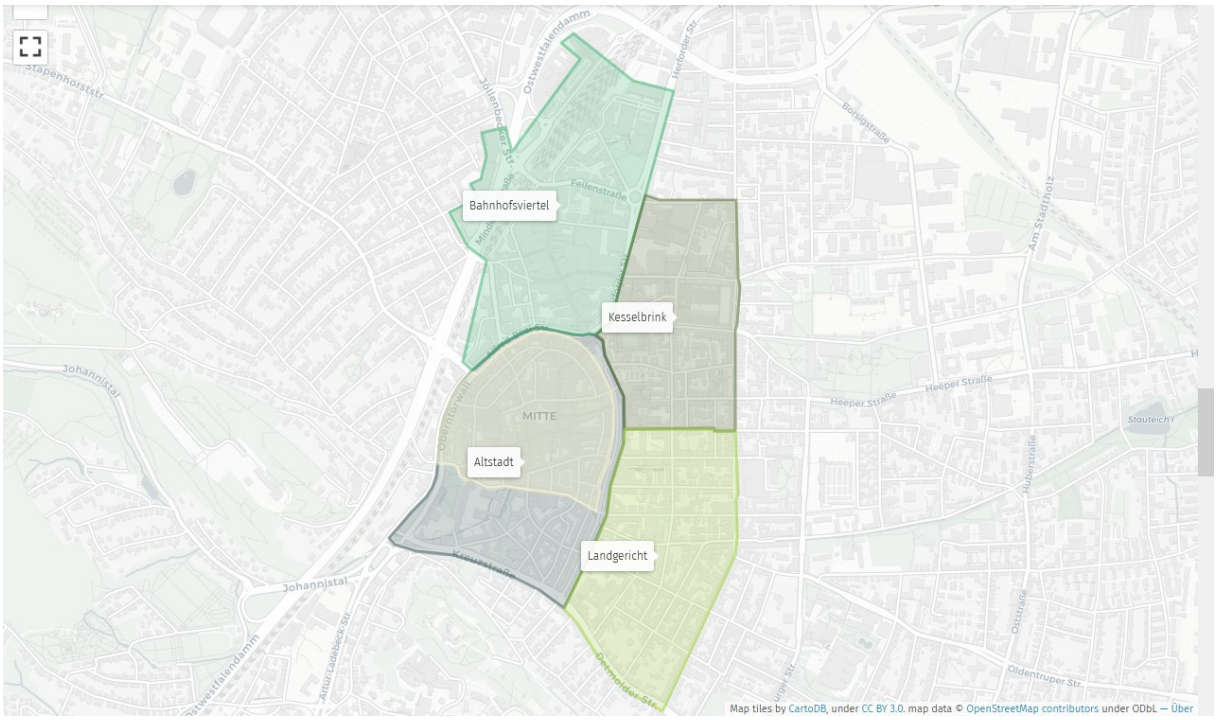
- Communication and campainigng to change perceptions and modal choices of residents & commuters
- Elaborate customer (parking) strategy with inner city retailers
- Public communication campaign to explain changed parking policy
- Define, test and plan pedestrianisation projects / mixed-use road designs to improve user experiences of public space

Elaboration of core principles for the parking strategy

Considering the results of the analysis of car parking in Bielefeld, the city council decided in December 2021 that the following topics should be developed by summer 2022 in citizen participation and political advice:

- Reduction of parking space
- Transit bans
- Lane reduction
- Reduction of the maximum permitted speed
- Adjustment of street parking fees

The focus of the work was put on the inner-city area to develop a parking management strategy for the most pressed area of the city. The intervention area was formulated in four sub-areas: the main rail station (in green), the square Kesselbrink (in brown), the old town (in grey) and the provincial court (in light green).



The first move was in consultation activities with stakeholders. These aimed to define which needs in the conflicting fields of parking and public space use exist and prepare a level of detail for measures to plan and decide on.

On June 20, 2022, the **public participation event** for the sub-areas around main station and old town took place in the lecture hall of the city library. The responding event for the areas around “Kesselbrink”-square and provincial court took place on June 21, 2022, in the Historical Museum.

The events were divided into two main parts, a lecture by environmental scientist Dr. Michael Kopatz and representatives of the Office for Transport, in which the subject of mobility transition and its effects as well as the political mandate for the project and the associated possible effects in connection with the parking space concept in the city center were discussed in general.

In the connected working phase, the citizens were able to comment on four overarching questions (see below) in smaller working groups and to formulate ideas going beyond these. Afterwards, the participants worked on one street example of the respective areas to show which public space use cases are seen as priorities in their opinion (e.g.: car sharing, parking spaces for cargo bikes or rental bikes, furnishing, etc.).

Work exercise on overarching questions

The **four questions** of the first work exercise were:

Question 1: The participants should answer what percentage of the existing parking lots they think should be preserved.

Question 2: Where do you see the biggest challenges/issues/problems in this district in relation to stationary traffic?

Question 3: Which of the building blocks presented are the most important for the district? Each person was given 6 points to assess which building block seemed most important to them. They could place at most 2 dots on each brick (see illustration below for the blocks).

Question 4: Design the street presented without any specifications using the existing building blocks! The citizens had to design an example street with the various building blocks. Each building block is shown with its number on the map.

Work exercise on elements discussing on-street parking

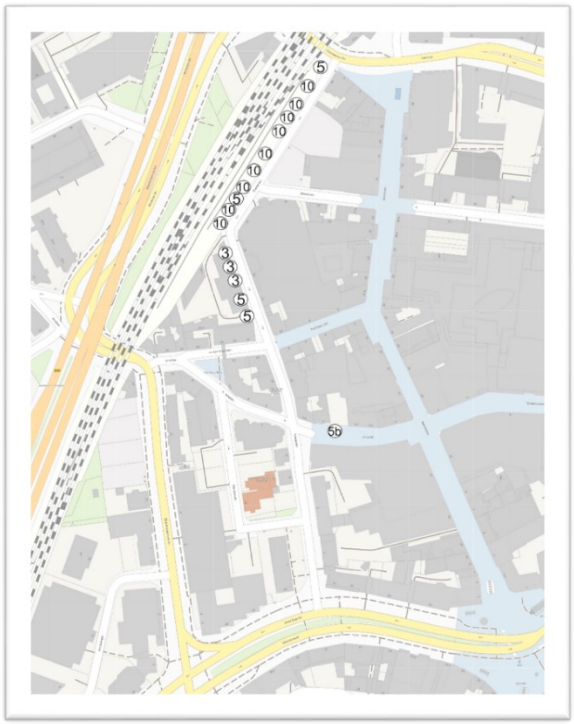
Workshop participants could choose from the following menue of use cases:

Bielefeld

1. Car parking spaces
2. Residential parking spaces
3. Carsharing
4. E-charigng parking spaces
5. Bicycle parking
6. Cargo bike parking
7. Bike sharing parking stations
8. E-scooter parking
9. Loading zones
10. Greeneries
11. Water elements
12. Outdoor furniture

The work groups focused on the following areas

The area around main station



The southern part of the old town

The area around "Kesselbrink"-square

The Regional Court area

Workshop results
The four overarching questions resulted in detailed ideas for the four areas and specific streets of these. Summarised, participants differentiated the necessity for on-street parking streetwise to a large variety ranging from dropping all, keeping some, to keeping all. Argumentations made use of the presented occupancy rates in the areas and included more specific settings like favouring residential parking for on-street spaces and catering for access needs to medial centres. The biggest challenges were the need for residential parking and bicycle parking in general, missing CarSharing concepts, the need to better exploit off-street capacities as well as loading vehicles and e-scooters blocking public space. Concerning specific elements needed for the four areas, most claims were to add residential parking, charging options for e-vehicels, specific parking zones for (shared) bicycles and loading / unloading as well as more greeneries, outdoor furniture, and water elements. Workshop participants located their suggestions to streets of the four areas as visible in the maps above.

The in-person workshops were supplemented by an online participation element at a specific project website. Any website user could place their suggestions following the four main areas of car parking, biycle parking, alternative services for parking and non-transport public space use to online maps of the four inner-city areas. Each suggestion could be commented for further details.
Suggestions focused on residential parking, its pricing and location as well as off-street parking connected to pricing in general, adding more and better-quality bicycle parking options and better cycling infrastructure, improving traffic management for loading / unloading, e-scooters and improved traffic flow as well as adding more greeneries, outdoor furniture and a stop to show-off crusing.

Actions to development the parking strategy

The actions take a two-fold dimension with work tasks allocated with the city admininstation, department for traffic, at the next steps:
First, administration will perform an in-depth analysis e.g. localising the next actions on the workshop results to propose a detailed concept for the parking strategy for the inner-city. The concept is presented to public stakeholders as well as to political decision makers.
Second, administration elaborates on the core principles for the parking strategy city-wide which complement the actions for the inner-city area. Actions planned focus on:

- Simplify parking zoning to one zoning scheme using concentric ring areas reaching out from the old town area.
- Setting a pricing model with 3-4 price steps being highest in the centre and getting cheaper the further the zone is located from the centre. Proposals for pricing are €5 at the centre and €4 in city district centres and general pricing levels of the ring zones using €1 steps. The pricing will not touch the outer residential districts.
- Increase pricing for residential parking from € 30 per year to e.g. a model of € 1 per day = € 365 per year

- Work with parking garage operators to exploit free capacities at price level of on-street parking or below.

Public presentation and consultation as well as political decision-making is scheduled to take place directly after the summer break in autumn 2022.

Risk analysis

Risks to the adoption of the parking strategy and its implementation are generally low to none in the short and medium term. Political power setting got confirmed by 2020 elections with the legislative period continuing until 2025. The currently (and largely as well before elections 2020) governing political parties have adopted the concept for sustainable mobility as well as the creation of a parking strategy and are determined to comply to its decision.