





# **BLUE GREEN CITY**

# **Blue and Green Infrastructure for Sustainable Cities**



**Action Plan** 

City of Ingolstadt

#### I – General information

Project	Blue Green City
Partner organization	City of Ingolstadt
Country	Germany
NUTS2 region	DE21 Oberbayern
Contact person	Thomas Schneider
Email address	Thomas.schneider@ingolstadt.de
Phone number	(+49) 841 305 2603

## II - Policy Context

The Action Plain aims to impact:	
	Investment for Growth and Jobs programme
	European Territorial Cooperation programme
☑	Other regional development policy instrument

#### The Stadtpark Donau Policy

The Stadtpark Donau Policy has been established by the City Council of Ingolstadt to advance an integrative approach to the sustainable development of the urban Danube floodplains with respect to ecological and social requirements.

The policy has to be re-sharpened in the light of the growing challenges of climate change. The importance of blue and green infrastructure (BGI) for wildlife and recreation increases. Reconciling such diverse – and sometimes contradictory – goals requires an inclusive and sustained dialogue with the general public and specific stakeholders. Moreover, science must be consulted as well, in such a way as to develop ecologically sound conservation practices that can be integrated neatly in European networks such as Natura 2000 and the network of Danube-wide protected areas. We developed three actions that, while aiming at specific targets (general public, urban wildlife, and peri-urban species) and focusing on different scales (local, city-wide, and regional), seek to develop concurrently and coherently the great potential of blue and green infrastructure for the quality of life within the city and biodiversity conservation in the region. We mainly expect changes in the way citizens relate to the river and its floodplain (identity-related dimension) as well as in how urban BGI is managed by the administration (governmental dimension); yet, we are certain that the implementation of the actions will reshape the practices and conceptual schemes of all stakeholders involved, and promote the importance of BGI for the sustainability transition within cities.

### III - Details of the actions envisaged

#### **ACTION 1: BGC HYBRID PARTICIPATION PROCESS**

To grasp the importance of the Danube to the citizens of Ingolstadt, one must visit the riverbank on a warm summer evening. The floodplains provide a common place for recreation, communication, and leisure activities, while the river itself shapes the identity of the city-dwellers to a great extent. Therefore, an inclusive and participatory planning process for the development of BGI is of great importance, not only as a way to cater as well as possible for the needs of the locals but also as a pathway to strengthen the identification of the citizens with their city, knowing that this is the place where they can shape their living environment. Thus, we sought to develop actions that would enhance the capacity of the administration to collect and harness the creative input of citizens. Furthermore, in respect to our general policy Stadtpark Donau, we aimed to raise awareness of the importance of BGI for sustainable cities and strengthen the acceptance for landscape and recreation development measures on the floodplains. This action aims to ensure a better acceptance of the Stadtpark Donau policy among the citizens.

#### A. Interregional exchange of policy and experiences

As a part of the Blue Green City (BGC) Interreg project, we first consulted with our partners and inquired what they had done to enhance the amenities provided by BGI to city-dwellers. Following the idea of a healthy and sustainable city, the Växjö example gave us inspiration concerning the discussion of values and the benefits of ecosystem services. It is very much based on evidence with regard to data collection, analysis, and presentation, which is done exclusively by experts. As a conclusion for the BGC activities of Ingolstadt, it became clear that the discussion should not be left to experts and administration alone: data analysis and interpretation can be seen as one part of BGC development activities, but as a second part the involvement of citizens, their ideas and opinions are also important, most of all to gain their acceptance. In that sense, our project goes one step further by offering hybrid options for participation.

The BGC hybrid participation process is influenced by additional practices drawn from other projects that have been discussed at the kickoff meeting in Nice in 2019: The Urban Green Belts project illustrates that changing administrative procedures may be key to making green area management more effective and efficient in providing vital ecosystem services to citizens, such as recreation and biodiversity. The approach of Budapest (Tree council and capacity building) gives us inspiration for further development of our BGC project in the nearer future.

Finally, the CULTUR-ES project inspired us to integrate the perception of residents of the green environment in our action. At the online project meeting on June 29, 2021, we learned that it is not enough to consider ecological variables alone. Green areas do not only represent pure patches of nature, but they serve multiple purposes for various user groups. As a consequence, different perspectives and meanings attached to green spaces need to be integrated into management approaches. We found another similarity to BGC Ingolstadt in the ESMERALDA-project, which aims explicitly at decision-making too. It is expressed through a public participation process which, in the end, is intended to help the decision-making bodies of

cities and other administrative units to find the best solutions. All these gave practices the hybrid participation process of Ingolstadt valuable inputs; yet, they need to be adapted to the local context.

#### B. Implementation strategy and timeframe

The main pillar of the action is an ongoing hybrid participation process that has been planned since 2020 in stakeholder workshops and has been publicly initiated at the Donaulust festival in September 2021. The venue of this festival consisted of a shoreline road that normally has heavy traffic and was closed for ten consecutive days for the festival. We assumed that this setting would stimulate citizens to reflect on the future development of the city in general and its Danubian floodplains in particular. To collect these thoughts, we offered the visitors a variety of digital and analogue participation formats. In quantitative terms, we registered 562 contributions during the ten days of the festival – a clear sign that citizens take great interest in the future of the city's BGI. In qualitative terms, we were positively surprised by the breadth and depth of the ideas stated by the participants. The participation event yielded a great number of salient contributions that can be integrated into the future planning process.

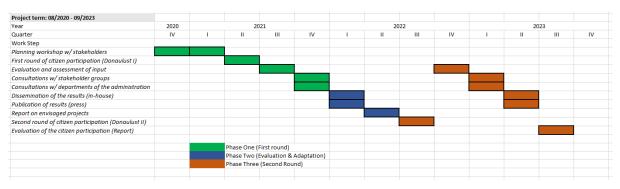


The hybrid participation format succeeded in attracting a diverse group of participants (picture taken at the first "Donaulust" festival in September 2021)



The hybrid participation offers also the opportunity to use digital tools for expressing ideas and opinions for participants (screenshot taken from the survey on the website www.ingolstadt-macht-mit.de)

To this end, we have planned several workshops with different stakeholder groups. The main goal will be to discuss the input provided by this first round of the participation process and to develop short-term projects as well as long-term goals in accordance with the ideas of the citizen and the comments of the stakeholders. Moreover, the information gathered at the festival will be processed and forwarded to the departments of the city administration, in such a way and format that it may prove relevant and valuable to future decision-making. Finally, we are currently planning several PR measures (leaflets, press articles, websites) to inform the general public and specific stakeholder groups about the evaluation process. All these measures are to be sustained at least until 2023, as the Donaulust festival is planned to be repeated in 2022 and will feature a second round of the participation process.



#### C. Involved stakeholders and assignment of tasks

Several stakeholders are involved in this action. Administrative departments (Bavarian State Ministry of the Environment and Consumer Protection, the Water Authority of the Bavarian State Administration, and several departments of the City of Ingolstadt) provide expertise and juridical council, while politicians like the representatives in the City Council of Ingolstadt support the participation process through public presence and appearances at events such as the Donaulust festival. The Catholic University of Eichstätt-Ingolstadt is charged with developing and implementing online-participation tools. Commercial companies such as Studio Animal Aided Design and Uniper Power Stations as well as citizen groups (Schanzer Fischerstecher, Freunde der Donau, Bund Naturschutz, IN-Zukunft, LBV) provide important input on the further development process of BGI and allow for the results of the participation process to be critically assessed. Finally, and most importantly, the general public contributes to the action by communicating its ideas and opinions.

#### D. Costs and funding

The expenses for this BGC action are estimated to amount to EUR 20.000 for PR material, moderation activities and consultation with experts; this calculation does not include the costs of the festival (EUR 100.000). The funding is provided by the City of Ingolstadt, as well as by other funds from the Bayarian and the federal level.

#### E. Milestones and indicators

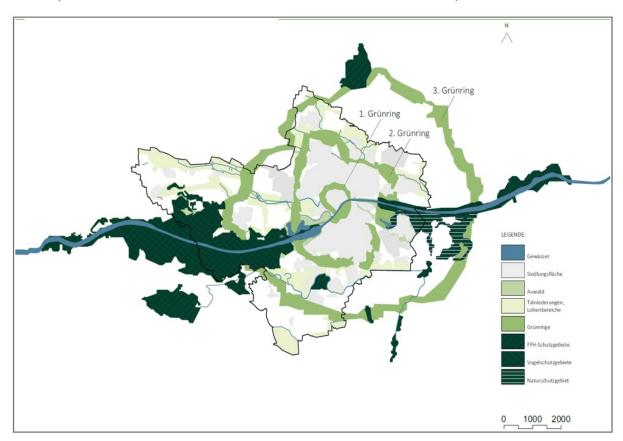
The action will be subjected to a continuous evaluation process. The main milestones of the project are:

- the second Donaulust festival, as planned for September 2022,
- and the publication of the report on the citizen's participation process in December 2022.

The impact of this action on the general policy will be assessed based on a multi-indicator approach in the report.

#### **ACTION 2: FAUNISTIC SPATIAL RESISTANCE ANALYSIS**

It may seem surprising to speak of city development in terms of biodiversity conservation — yet, the city of Ingolstadt offers a wide variety of habitats to various urban wildlife species. The main conservation issues appear to be the poor connection between these different habitats, which restricts animal species to certain locations that are separated one from the other by busy streets, paved areas and concrete buildings. In an effort to restore the connectivity between these habitats, and thus enhance the integrity and resilience of urban ecosystems, we wish to develop some policy that reduces the obstructiveness of human settlements on the animal world. Again, we aim for change at the governmental level, as we want to adapt the administrative procedures in such a way as to allow them to take into account the needs of urban wildlife species. In respect to the Stadtpark Donau, this action will enhance habitat structure in the city in general and the areas adjacent to the Danube in particular, as well as raise awareness about urban biodiversity. Our vision is that of an urban biotope network, integrated into a city where wildlife can move unhindered between green areas and open spaces. The action aims to gain scientific knowledge on how to optimise the ecological functionality of BGI and to handle restrictions which hinder the continuity of bio-corridors.



The three green belts of Ingolstadt provide ample room for urban wildlife; yet, these habitats are poorly interconnected.

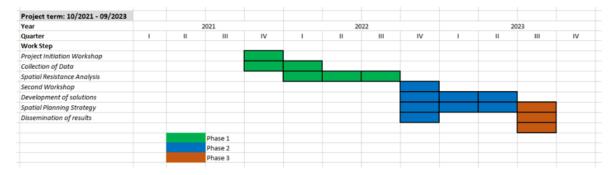
#### A. Interregional exchange of policy and experiences

Our inspiration for this action mainly comes from the good practice of the City of Nice which sought to mitigate the negative effects of human settlements on nocturnal animals. We chose to retain the methodology of our French partners: identification of critical sites, development of multidimensional mitigation measures, and close monitoring of the results. In comparison

to the French project, which focused on Chiroptera, we wish to develop more general policy guidelines that can be adapted to suit the needs of different taxa. Moreover, we want to integrate our good practice on Animal-Aided Design as an active mitigation tool.

#### B. Implementation strategy and timeframe

The action is divided into three phases. The goal of the first project phase (Winter 2021 – Autumn 2022) is to identify the main barriers to animal locomotion in the city. Together with our partners from the Technical University of Munich and the Technical University of Vienna, we shall analyze the movements patterns of selected animals and identify critical sites that require innovative solutions to restore connectivity. The main activities in this first phase will be the organization of a project initiation workshop, the collection of the necessary data, and spatial resistance analyzes. The findings of the first phase will be presented at a second workshop and will serve as the basis for the development of innovative solutions to enhance the connectivity of urban biotopes in the second phase of the project (Winter 2022 – Summer 2023). In developing these solutions, we shall draw on Animal-Aided Design, which presents a suitable framework to integrate the demands and preferences of urban wildlife in city design. In the final phase (Autumn 2023), the exemplary solutions will be integrated in the spatial planning strategy and disseminated by the State Ministry for the Environment.



#### C. Involved stakeholders and assignment of tasks

With regard to stakeholder involvement, the *Technical University of Munich* will be charged with the scientific implementation of the Faunistic Spatial Resistance Analysis, as well as with the development of appropriate solutions and mitigation measures. Reporting will also be mainly provided by *the Technical University of Munich*, while the *Technical University of Vienna* will assist with scientific support. The city administration will provide data (maps, statistical assessments), and manage the integration of the proposed solutions in the Landscape Plan as well as other spatial planning strategies. Organizing and managing the workshops will also be the responsibility of the city. Research assistance as well as financial support is provided by the *Federal Institute for Research on Building, Urban Affairs and Spatial Development*. The *Bavarian State Ministry of the Environment and Consumer Protection* will disseminate the project results.

#### D. Costs and funding

The costs of this action amount to EUR 66.000; funding is provided by the *Federal Institute for Research on Building, Urban Affairs and Spatial Development* (EUR 50.000) as well as by the City of Ingolstadt (EUR 16.000).

#### E. Milestones and indicators

As the project is set to last until 2023, we can only assess the preliminary results that will have been established by the end of the second phase of the INTERREG-project in 2022. Until then, the main milestones are:

- the workshop meeting of the involved stakeholders in February 2022. The protocol of this meeting will serve as an indicator for the progress of project implementation.
- the report on the results of the Spatial Resistance Analysis, set to be published in December 2022.

# ACTION 3: Integrating the Stadtpark Donau in the landscape planning process and the protected areas network

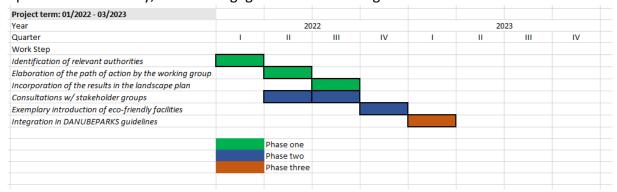
The main goal of action 3 is to establish the Stadtpark Donau (City Park Danube) as an urban stepping stone for plants and animals living in the protected areas adjacent to the city. Ingolstadt is located in the direct vicinity of a Special Protection Area under the Directive on the Conservation of Wild Birds, two Special Areas of Conservation under the Habitats Directive, and one Nature Conservation Area protected by the Bavarian Nature Conservation Act. In an effort to enhance the connectivity between these areas, as required by the NATURA 2000 network, the European Strategy for the Danube Region (Priority Area 6), and the EU Biodiversity Strategy for 2030 (Chapter 2.1), we want to foster an environment that may serve as a corridor for migrating plants and animals. The change to be expected from this action is mainly ecological; yet, we are sure that sustained cooperation between the city administration and nature conservation authorities will lead to a gradual change in the governance arrangements around the management of (peri-)urban green areas. This action aims to consolidate the knowledge gained, to strengthen the Stadtpark Donau policy in the urban planning process and to showcase good practice for BGI on rivers along the Danube.

#### A. Interregional exchange of policy and experiences

As the most important water-bound migration corridors pass through the recreational area of the Stadtpark Donau, we had to find ways of how to develop biodiversity conservation and amenity simultaneously. We found inspiration in the two Irish good practices and decided to try to downscale some of the ideas of the *Tralee Bay Wetlands Eco & Activity Park* to create eco-friendly recreational amenities in the area. Moreover, we resolved to stick to minimalistic, non-invasive Nature-Based Solutions, as Waterford City did with the *Waterford Greenway*.

#### B. Implementation strategy and timeframe

In Phase one of the project (01/2022 - 06/2022) we will establish a working group that will bring together all relevant departments of the City Council and the authorities of the protected areas to develop a shared and coherent path of action. The results will be incorporated into the City of Ingolstadt's landscape plan, which will form the basis for further urban development. Concurrently, we shall engage in an active dialogue with local NGOs and other stake-



holders to develop joint projects and establish the Stadtpark Donau as a patch of wilderness within the city (Phase two: 06/2022 - 12/2022). By the membership of Ingolstadt in DANUBEP-ARKS, the Network of Protected Areas in nine Danube countries, the results will be spread not

only by the Interreg Europe channels but also along the whole Danube in and between the protected areas (Phase three: 01/2023 - 03/2023).

#### C. Involved stakeholders and assignment of tasks

The Major Mrs. Petra Kleine, assisted by the *Department for Climate, Biodiversity and the Danube*, will head the working group and will be in charge of the coordination between the public authority and the associated stakeholder groups. Moreover, it will supervise the implementation of the joint projects. Other departments, as well as public authorities, will contribute their expertise on nature conservation and spatial planning. Finally, stakeholder groups such as local NGOs and the DANUBEPARKS association will provide input, contribute to joint projects and disseminate the achievements.

#### D. Costs and funding

As the costs are integrated into the Landscape Planning Process, they will be covered by the city administration.

#### E. Milestones and indicators

The main milestones of this project include:

- First Report on the proceedings of the Working Group on potentials and challenges of an ecologically sound planning process for urban BGI, to be published in June 2022.
- Implementation of exemplary eco-friendly amenities (resting facilities, artificial nesting sites, establishment of flowering meadows, etc.) in November 2022.
- Presentation of the results achieved so far at the General Assembly of DANUBEPARKS, set for December 2022.

Date: 18.02.2022

Name of the organization: City of Ingolstadt

Signatures of the relevant organization:

Stadt Ingolstadt Stabsstelle Strategien Klima Biodiversität & Donau Mauthstr. 4 85049 Ingolstadt