

Objectives of the measure

• At measure level:

- Amplified cycling infrastructure planning;
- Minimize gaps in the city's cycling network;
- Expand bike sharing network towards neighbouring municipalities of Lisbon;
- Improve bicycle lanes network connecting to neighbouring municipalities of Lisbon.

Contributing to city level objectives of:

- Increase cycling;
- Reduce trips made by private vehicles;
- Reduce the number of cars entering in the city;
- Improve intramodality offer.

Description of the measure

Situation before:

Lisbon has come a long way from the first bicycle lanes in 2001. In 2009, a network of bicycle lanes designed for leisure began connecting some of the city's green spaces. Only in the last few years, bike use as a mode of transport has increased, and expansion of the GIRA public bike share system as well as the increase in cycling infrastructure have contributed to this phenomenon jointly. Currently the bike network in place or under construction (approx..) is 150 km long.

Still, the Cycling network in Lisbon is sometimes incoherent and poorly connected, with variable dimensions, types of protection, signals, materials, and even different colour scheme, resulting in a negative context for a more generalized uptake of cycling alternatives.

On the other hand, the municipal bike sharing system, although very well accepted by the population, is mostly located at the central part of the city, excluding potential users from neighbouring municipalities to use it.

General description:

Through the implementation and dynamization of the two sub-measures, it is intended to improve the city's cycle path network, providing greater security, connectivity, comfort, coherence, intermobility, etc. In parallel with the expansion of the shared bicycle network, a greater percentage of the population may start using this service, hoping that, as in the past, it will be a means of expanding and attracting users to this mode of transport.

• Sub-measures description:

- LIS_05_01: Review the cycling infrastructure plans, to facilitate integration with other municipalities: Through an audit of the city's cycling network, we intend to find out the existing problems and establish a prioritization of the interventions to be carried out, improving security, attractiveness and coherence of the network;
- LIS_05_02: Plan for the expansion of the bike sharing system towards other metropolitan municipalities: Expand the municipal bicycle sharing service network to the periphery of the city (where viable) or to the major interfaces that relate to neighbouring cities.

Measure outputs:

This measure will deliver:

- Report on the evaluation of the city's cycles lanes;
- Bike sharing systems expansion plan.

- Supporting activities:
 - Conducting an audit of the network of existing and planned bike lines;
 - Communication of the changes in the network to the potential users.
- Interaction with other city measures: UPPER and non-UPPER measures
 - **LIS_09:** To improve the integration of PT and active travel modes.

Target groups and/or geographical impact areas

- Target groups: All current and potential bike users.
- Geographic impact area: Lisbon Metropolitan Area.

Stakeholders

The following stakeholders will be required for the implementation of this measure.

- **EMEL:** Municipal company responsible for the implementation and management of the bike-sharing system;
- **Municipality:** Decision-maker in terms of continuity of the project and its expansion, planners, communication;
- Parish councils: Decision-maker in terms of the project and its expansion, planners, communication

U-tools support

The implementation of this measure will be actively supported by one IT tools from the UPPER toolkit:

• **U-SIM.plan:** This tool might be interesting to model the design and integration with PT of the cycle mobility network addition.

Link to other UPPER measures

This measure is similar to UPPER measures implemented in other cities, especially:

• VAL_01: Redistribution of urban space with a focus on Mobility as a Right.

Process of implementation of the measure

Stages	Description	Intermediate milestones
Design	Data collection, geospatial analysis of routes used from bike sharing users. Geospatial analysis of bikes lines.	 Data collection: number of cyclists; number of users; preferred routes and trips from the bike sharing system; Data analytics; Identification of main areas of use the bike sharing system.
Preparation	Specification of locations for cycling network improvement actions. Selection of areas to expand bike sharing network.	 Identify critical location and prioritizing interventions in the cycling network; Identify locations for network expansion of bike sharing system.
Implementation	Approval of the cycling network improvement plan. Expansion of bike sharing system network approved	 Delivery of the cycling network improvement plan; Delivery of the bike-sharing system expansion plan.

Sub-measures and preliminary indicators

Measure	Sub-measure	Impact indicators
LIS_05	LIS_05_01: Review the cycling infrastructure plans, to facilitate integration with other municipalities.	 Number of cyclists within the city; Number of cyclists using the 3 metropolitan access points; % cyclist/user at 3 metropolitan access points.
LIS_05	LIS_05_02: Plan for the expansion of the bike sharing system towards other metropolitan municipalities.	 Bike-sharing system coverage (km²); Number of bike stations (added to ensure network linkage to other metropolitan municipalities).