

17. New bus grid model: new high-service RetBus lines and development of conventional lines

MUNICIPALITY

Barcelona

HEADING

The RetBus, a new on-road public transport system with high level service for Barcelona. A first step towards a new grid model for Barcelona.

DESCRIPTION

The RetBus is a new grid bus network integrated with other forms of group transport. Its configuration is adapted to the octagonal grid of the Eixample district, extending to the rest of the city of Barcelona with interchanges at the intersections. With the implementation of this new network a hierarchisation is created in the bus service:

- RetBus service, with superior features and travel time similar to private vehicles.
- Conventional service, which in its second phase will develop and be adapted to a grid and diagonal shape.
- Neighbourhood bus service, local mobility.

When designing the main structure the objective was to ensure:

- Insertion in the corridors bordering the super-blocks, or groups of macroblocks (equivalent to three blocks in the Eixample district), adapted to the city's new planning model.
- Improvement in public transport cover in residential areas and poles of activity (22@, Sarrià, etc.).
- Connectivity and complementarity with other transport modes, both under- and over-ground.

The high-level service lines will provide over-ground transport with tram-type features, overcoming the limitations of conventional buses and attracting new users by higher frequency and lower journey time.

These advantages are achieved basically by increased spacing between stops and providing higher speed of circulation through the creation of green waves (semaphore priority) for buses in the corridors and also at some crossroads and creating separate lanes. The position and design of each interchange has been studied to improve inter-line connectivity.

IDENTIFICATION DETAILS

- Total length of network: 227.3 km
- Grid configuration: 7 in sea-mountain direction, 5 in Besòs-Llobregat direction
- Distance between stops: 400 m
- Special priority and segregation from private vehicles and conventional buses
- Fleet required: 280 vehicles
- Progressive implementation in three phases of four lines each (2012-2014)

PROJECT ADDRESS

www.tmb.cat

RESPONSIBLE

Barcelona City Council and TMB.