

CITY MOBILITY MANAGERS MEETING
TOMORROW MOBILITY WORLD CONGRESS
BARCELONA, 08 NOVEMBER 2023

PARKING STRATEGIES AND CURB MANAGEMENT

ROME: HOW TO REDUCE CAR PREDOMINANCE WITH NEW RULES, ITS MEASURES AND MORE SPACE FOR ACTIVE





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Rome SUMP approved in 2022



From the old "traffic approach" towards "Plan for people":

- **Multimodality & reduction of private** car ownership
- **Public transport capacity increase**
- Safety levels increase for PT and road traffic
- **Active mobility**, soft & sharing mobility increase (car pooling, car, bike, van sharing, mobility manager activities)
- Less congestion and atmospheric & acoustic pollution - energy consumption reduction – CO2
- Pathway to **Climate Neutrality** according to Rome participation in EU Mission '100 climate neutral cities by 2030'







Car predominance in Rome: 1) Challenges

- Motorization rate: 620/1000 inhab, 1,9 ML vehicles + 0,4 ML PTW with 1,4 ML driving licenses;
- Modal Share: PT: 21%, Car: 52%, Motorbike:10%, Walking: 14%, Cycling+Sharing: 3%
- Road safety: + 120 fatalities per year.
- Air Pollution: non-compliance with EU Directive on ambient air quality for NO2
 & PM10. Obligations to limit mobility of most polluting vehicles

2) Strategies

Implement the approved SUMP with focus on:

- 1. Strong demand management policies with ITS support;
- 2. From car to multimodality: MaaS approach
- 3. Promote recover of urban spaces projects;
- 4. Cycling path extension cutting parking places?
- 5. On-street parking automatic control

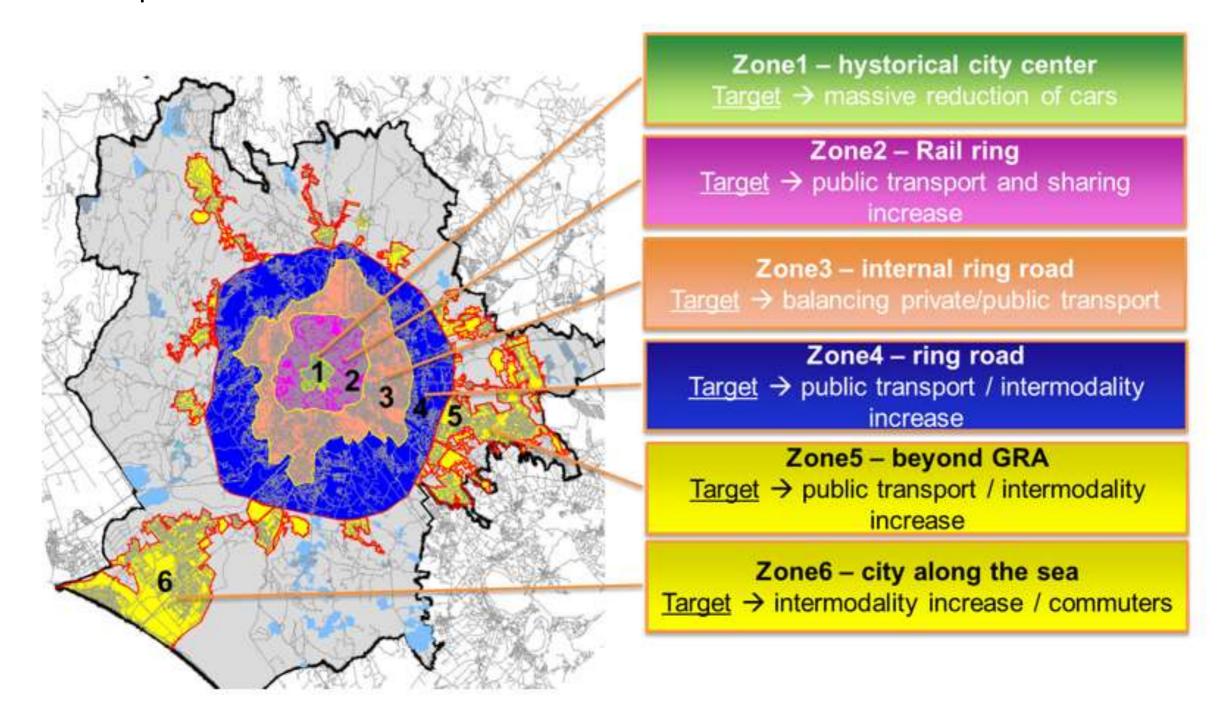






City zoning: 6 areas with increasing constraints to private mobility, supported by ITS measures. 4

From November 2023 new regulations (with gradual bans over the years) with new access and circulation rules to limit air pollution









Zone 1: City Centre LTZs already fully controlled by electronic access control systems

Time-based, Permits given to selected categories decided by Municipal Council, subject to different annual fees.

ANPR based controls carried out remotely by Urban Police. Electronic Systems implemented, centralized and maintained by RSM.





LTZ Historic Center

Mon. to Fri. 6.30 am - 6 pm Sat. 2 pm – 6 pm Fri. & Sat. 11 pm – 3 am

LTZ Trastevere

Mon. to Fri. 6.30–10 am Fri. & Sat. 9,30pm-3am

LTZ Villa Borghese

Mon. to Sun. 0 –24

LTZ San Lorenzo

From Wed. to Sat. 9.30 pm - 3 am(May to July & September- October) Fri. & Sat. 9,30pm-3am (November - April)

LTZ Testaccio

Fri. & Sat. 9,30pm-3am

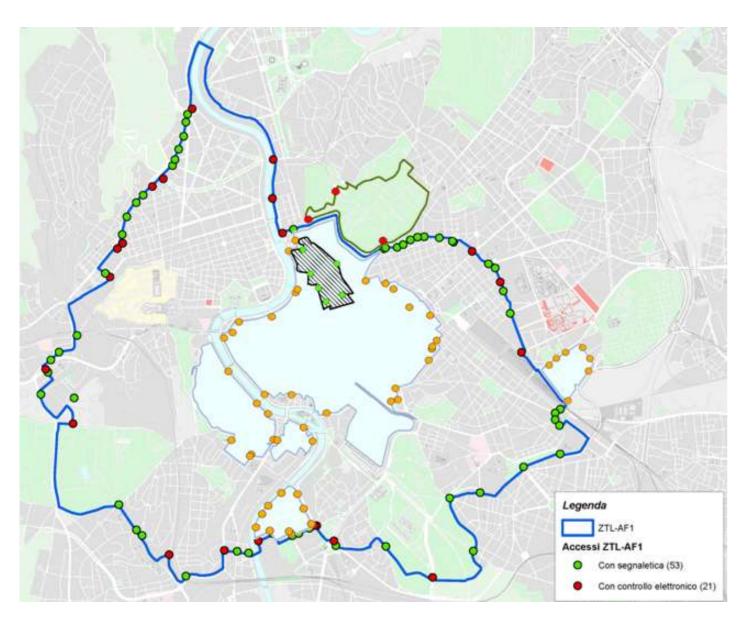






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Zone 2 – Rail Ring: towards an internal control system



LTZ VAM-Rail Ring: 63 electronic gates

Presently operating system

Time-based, Restriction for all vehicles with total length over 7,5 meter controlled on the 21 e-gates in the red dots. Daily or other temporary permits for tourist coaches (or special freight delivery) subject to charge

New operating system

Time-based, Restriction for all vehicles with total length over 7,5 meter controlled on the whole 74 e-gates (red & green dots). Daily or other temporary permits for tourist coaches (or special freight delivery).

2025: ANPR based automatic check of Euro categories for all vehicles accessing the zone

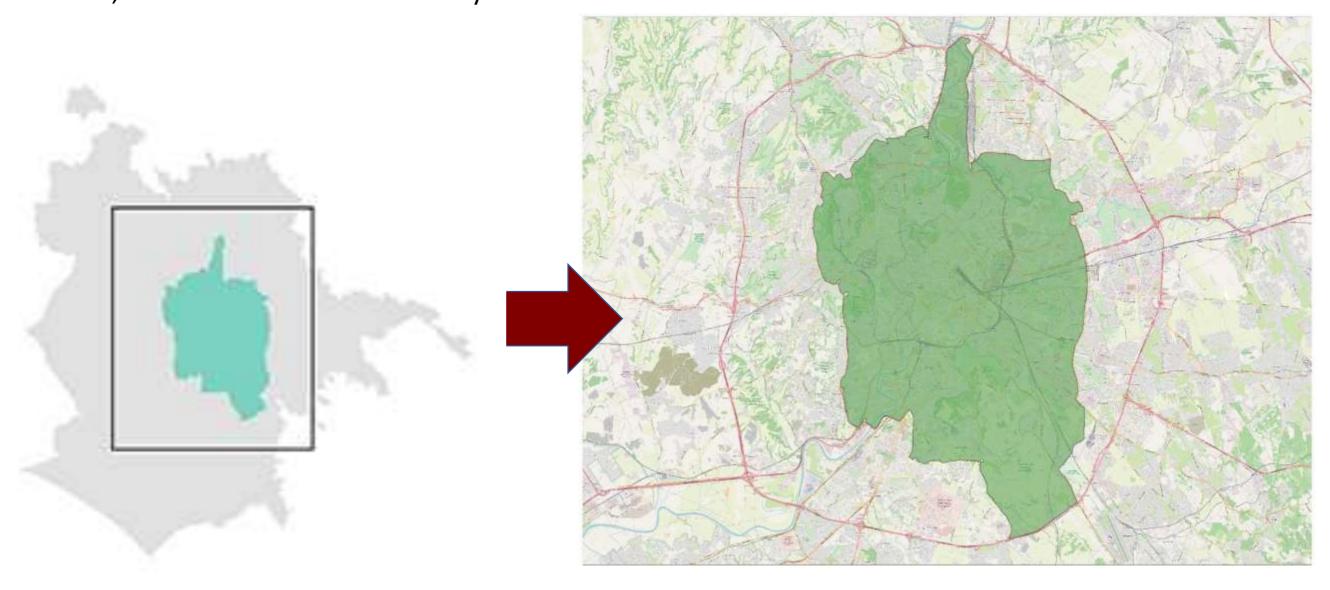






Zone 3: Green Belt LEZ to be controlled by electronic access control systems

A Council Act approved the LEZ in 2022. REACT-EU is funding the first batch of the e-gates project (8 ML€), while the completion is financed by Jubilee funds. 2023: Limitations for vehicles up to Euro 3 Diesel and Euro 2 petrol ANPR based controls on accessing vehicle to be carried out remotely by Urban Police. Electronic Systems implemented, centralized and maintained by RSM.

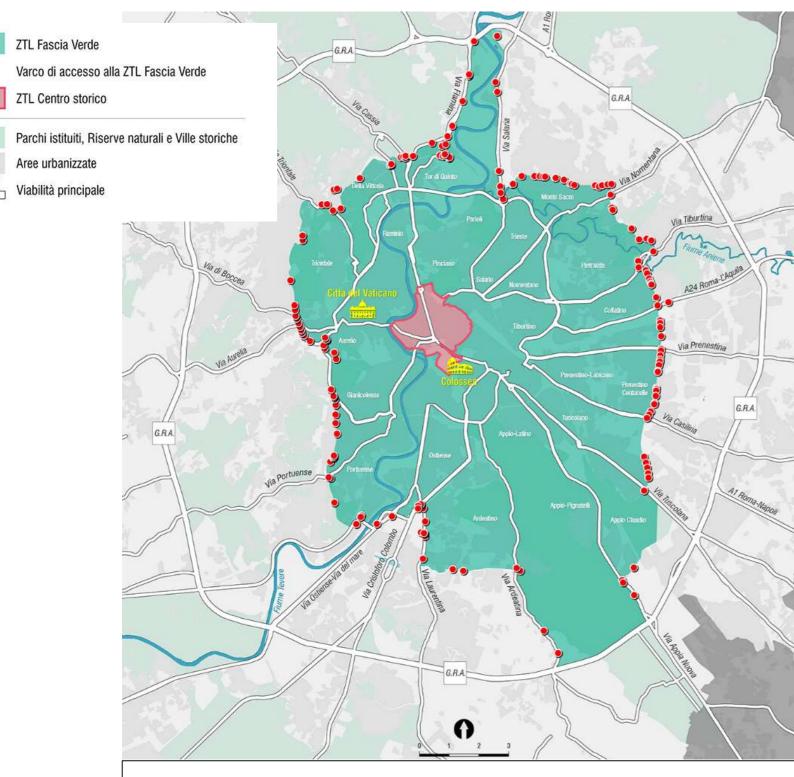








Zone 3: Green Belt LEZ – extension and limits



Surface: 156,16 kmq – 45 % of the area inside G.R.A.

Perimeter; 72 km

Accesses: 154, e-gates I phase 80 controlled paths

Electronic Gates

- System Data Center and first 80 electronic gates (51 access roads);
- Authorization to operate 1st quarter 2024
- Completion within November 2024

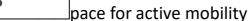
Road Signs

•	Gateway signs	268
•	Signposts	298

• Poles + plinths 1.122

Installation completed in 2023







2) From car to multimodality: ITS support and MaaS approach



- Development of advanced ITS (Intelligent Transportation Systems) systems, enables an integrated, sustainable and innovative management of urban mobility
- Implementation of tools, such as the Data Lake platform and the Mobility Centre, to streamline Rome's transport network and provide information to users on mobility, including use of AI and Machine Learning technologies in order to make forecast estimates on shortterm traffic and correlated emissions
- Implementation of the MaaS platform, making the city more connected and improving the
 quality of services offered, bringing together the offers of mobility service providers and
 providing end users with access through a single integrated platform

Benefici

Real-time information

Smart Mobility

Integration of mobility services

The Mobility Centre

Roma Servizi per la Mobilità Via Silvio D'amico, 40



The Center puts together a series of subsystems, each dedicated to the performance of specific functions of monitoring and / or regulation of traffic flows.

Free acces to all services, codes and open data, updated real-time when available

Pannelli a messaggio variabile (PMV) Infomobilità UTT (<u>Urban Travel Times</u>) – Postazio Paline elettroniche	66 51 300	80 89 320	
	Varchi elettronici ZTL	47	113
	Varchi corsie preferenziali TPL	17	39
	Fotored	1	1
Sanzionamento	Vistared	10	10
	Safety Tutor	2	2
Monitoraggio	Telecamere di videosorveglianza	75	93
Regolazione	Stazioni di Misura	130	64
Controllo	Impianti semaforici	1376	1410



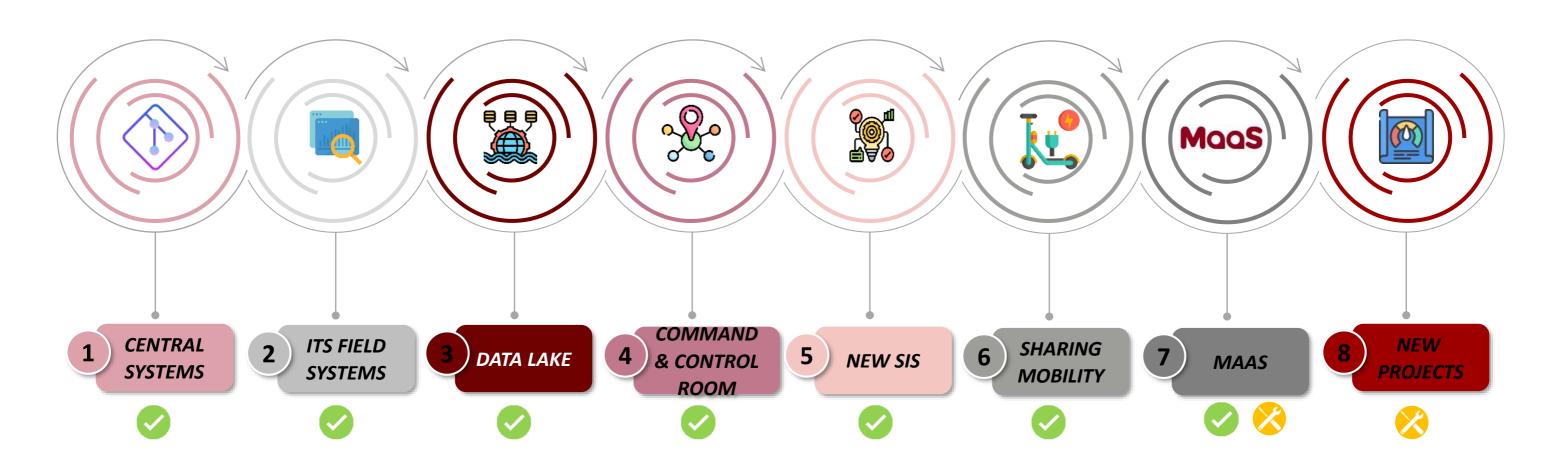




Digitization path of the Rome Mobility Agency

Starting in 2018, Rome Mobility Agency embarked on a path of infrastructural innovation and digitization, also in line with European best practices in the area of Smart Mobility.

This path aims to respond to the growing demand for research and development and services for urban mobility.





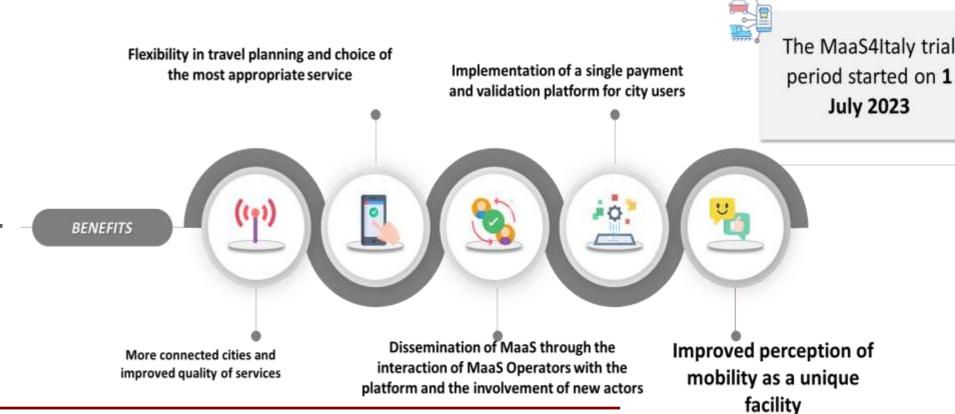




Mobility – as – a – Service (MaaS) in Rome

- MaaS (Mobility as a Service), financed by **REACT-EU** and PNRR funds (RRF facility), presents itself as a single integrated platform, open at regional and national level,
- The offers of mobility service providers are presented to users through digital interface of the MaaS operators.
- Sharing providers are already integrated into this service, making lastmile mobility a reality in Rome;

















1&2) Demand Management Policies and multimodality



Flexibility rules

Introduction of limited number of free permits of entrance into Green Belt for noncompliant vehicles in the first three years (60,30,5) or MOVE-IN distance – based system remotely controlled;

Incentives towards sustainable mobility

A national fund was created in order to adopt interventions aimed at improving air quality in the sectors of mobility, and the rational use of energy.

Lazio Region and Rome Municipality requested their use to support the strong change of habits requested to citizens in the Municipality act.

Rome Municipality has now 13 ML€ to incentivize sustainable mobility and every year 5 ML€ will be available for this scope until 2034.

Proposal per an incentive package for multimodality in case of dismission of the old non compliant vehicle





3) Recover of urban spaces: from car to active mobility









3) Recover urban space: Flavio Biondo square (Trastevere station)

From on-street parking to a multimodal hub with:

- Central area dedicated to PT;
- Special routes to connect the station and PT stops;
- Green areas, pedestrian areas, bicycle parking spaces and parking spaces for car/bike sharing and charging of electric vehicles.
- Presence of parking spaces for loading and unloading goods, Kiss & Ride area.
- Dedicated lighting project









3) Recover urban space: environmental island Casal Bertone











3) Recover urban space: Zone 30 km/h Ostia Antica





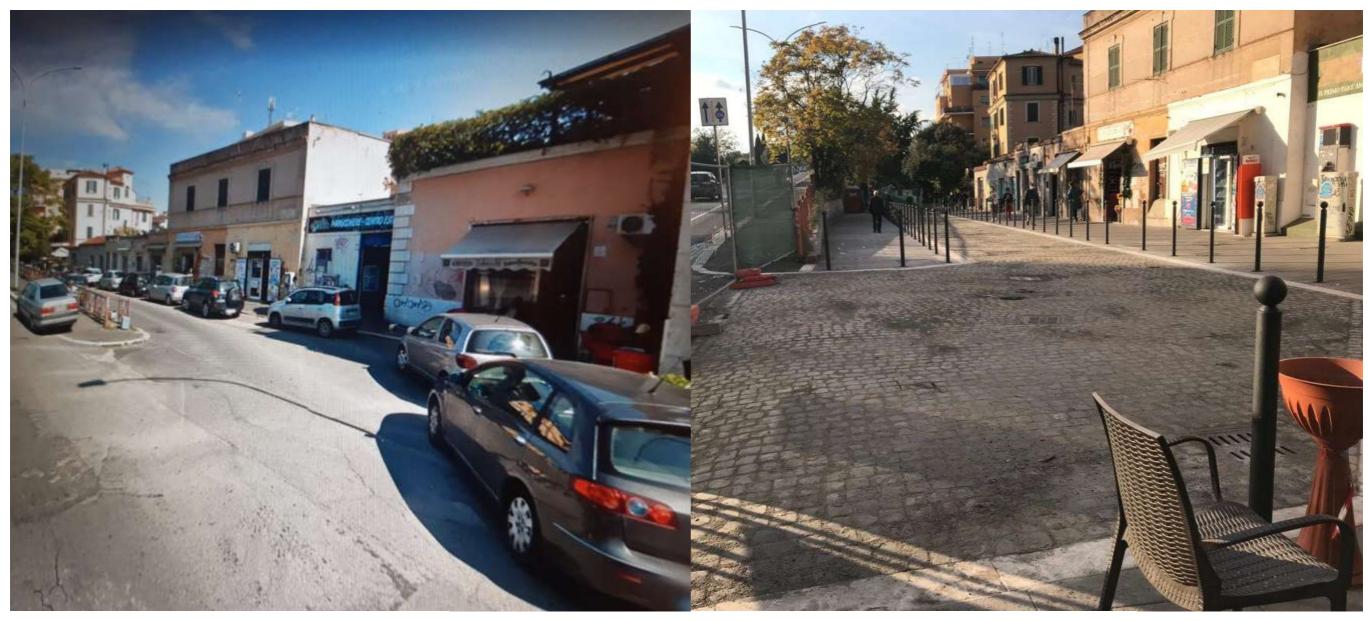






3) Recover urban space: Zone 30 km/h Quadraro Vecchio





Via dei Lentuli - before

Via dei Lentuli – after





4) Cycling path extension – cutting parking places?

Current cycling network in Rome:

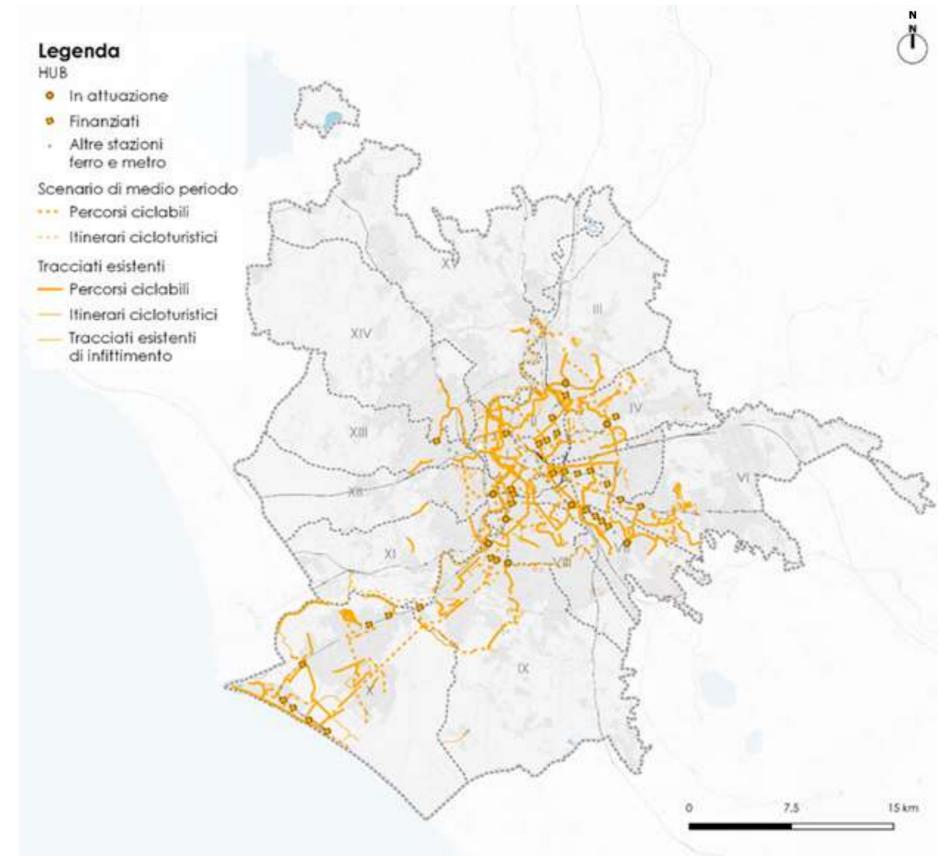
- About 320 km, of which about 100 km in parks and historic villas
- 925 racks for 4,625 bike spaces
- 400 overall Bike Boxes: just installed in 7 mini-hub in metro stations

Short-term scenario (3 years):

- +120 km cycling paths
- +1,600 Bike boxes in further 33 mini-hub in metro & urban rail stations

Medium-term scenario (5 years):

Further + 130 km (48Km every 100Kmg)







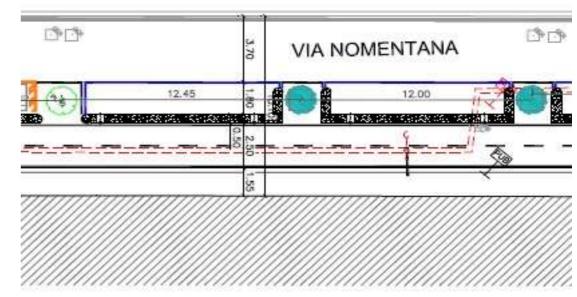


Ciclyng path «Nomentana»

- Extended 3.6 km. It connects Porta Pia with the V. dei Campi Flegrei bicycle path (height V. Valdarno).
- Two-way cycle track in its right-hand lane, 2.5 m in section protected with prefabricated kerb





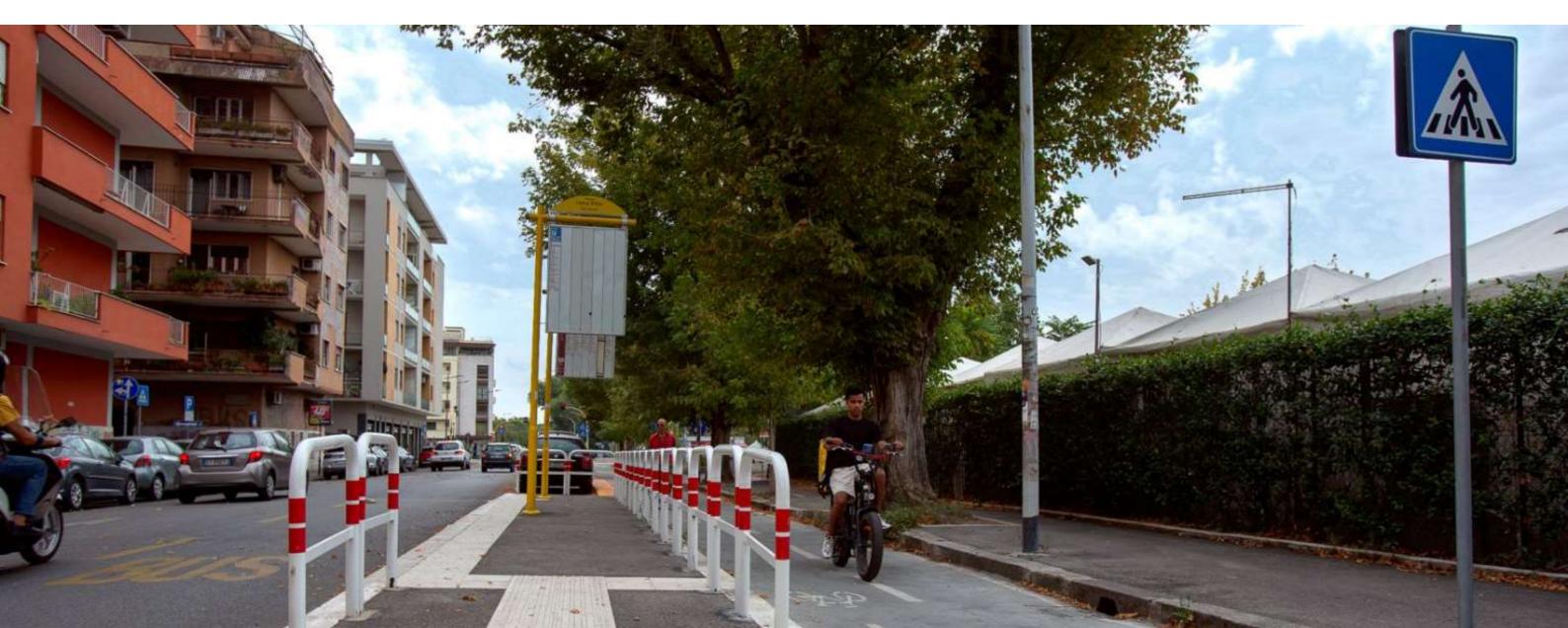








Ciclyng path «Delle Valli»









Ciclyng path «Ostiense»





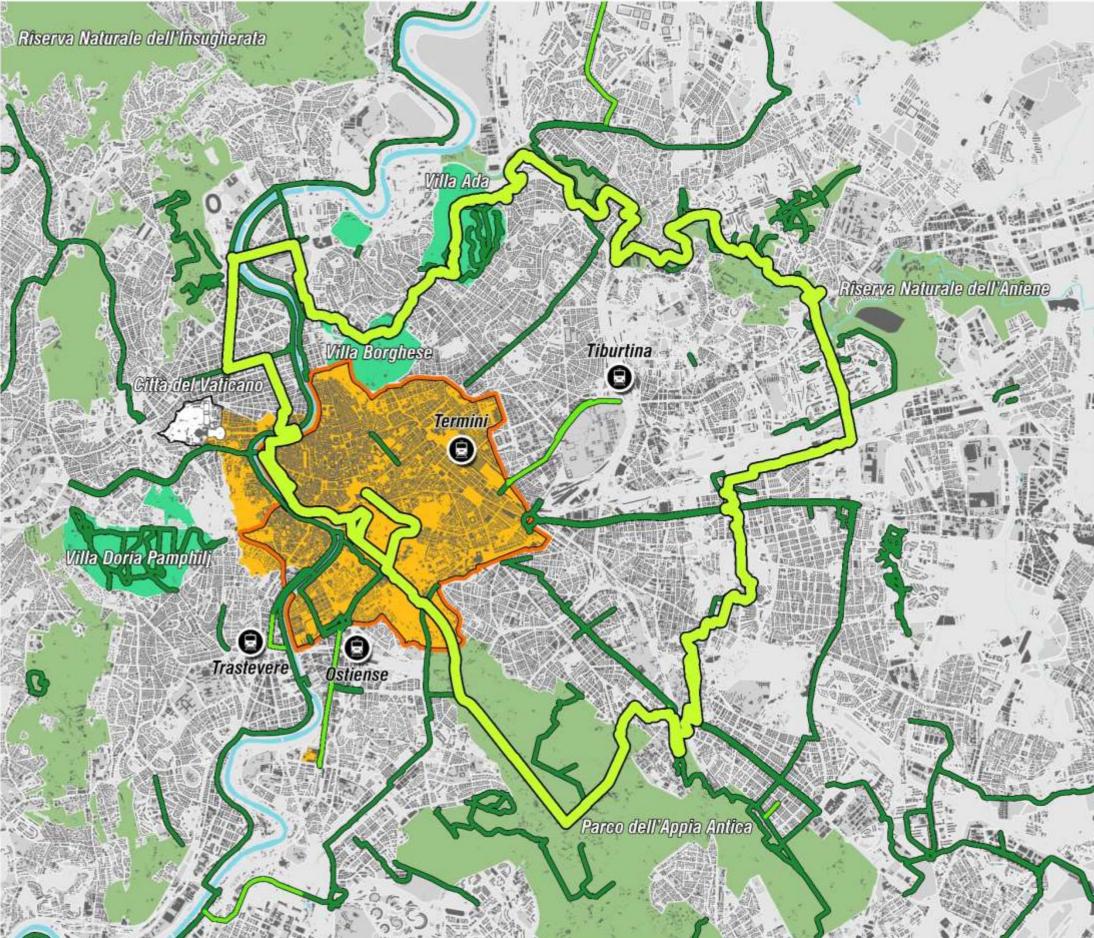




4) Cycling path extension: GRAB Project











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Impacts Tomorrow Iviodility World Congress
Barcelona, 08 November 2023

4) Cycling path extension: GRAB Project

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- GRAB is an **element of conjunction and intermodality**, passing through eight subway stations on four different lines (A, B, B1 and C), as well as 13 stops on six different tram lines and three railway stations.
- In addition, there will be three other railway stations (Roma-Lido, Roma Nord and Roma-Giardinetti) and nine metro stations less than a kilometer from the ring.
- GRAB is included inside the three internal zones of the city
- From the Imperial Roman Fora, visitors on the GRAB will see the contemporary architecture of Zaha Hadid and Renzo Piano, street arts, as well as the historical monuments of the Colosseum, the Vatican and the Trastevere district.
- The ring will also permit connections with the **public parks** (Appia Antica, Caffarella and the Aqueduct) and with the rivers Tiber and Aniene.
- The GRAB is included in PNRR and it will start implementation with Lot 1
 "Arco di Costantino via dell'Almone". It includes a reconfiguration of
 the road axis of Via di San Gregorio in favor of pedestrian and bicycle
 mobility.





Ciclyng path «GRAB»









Multimodal hub: bike-box parking

Integration into PT facilities for 408 bike parking spaces in 7 metro stations, integrated in PT card with dedicated app

- LAURENTINA
- **ANAGNINA**
- SAN PAOLO BASILICA
- **EUR MAGLIANA**
- PONTE MAMMOLO
- ARCO DI TRAVERTINO
- **jONIO**











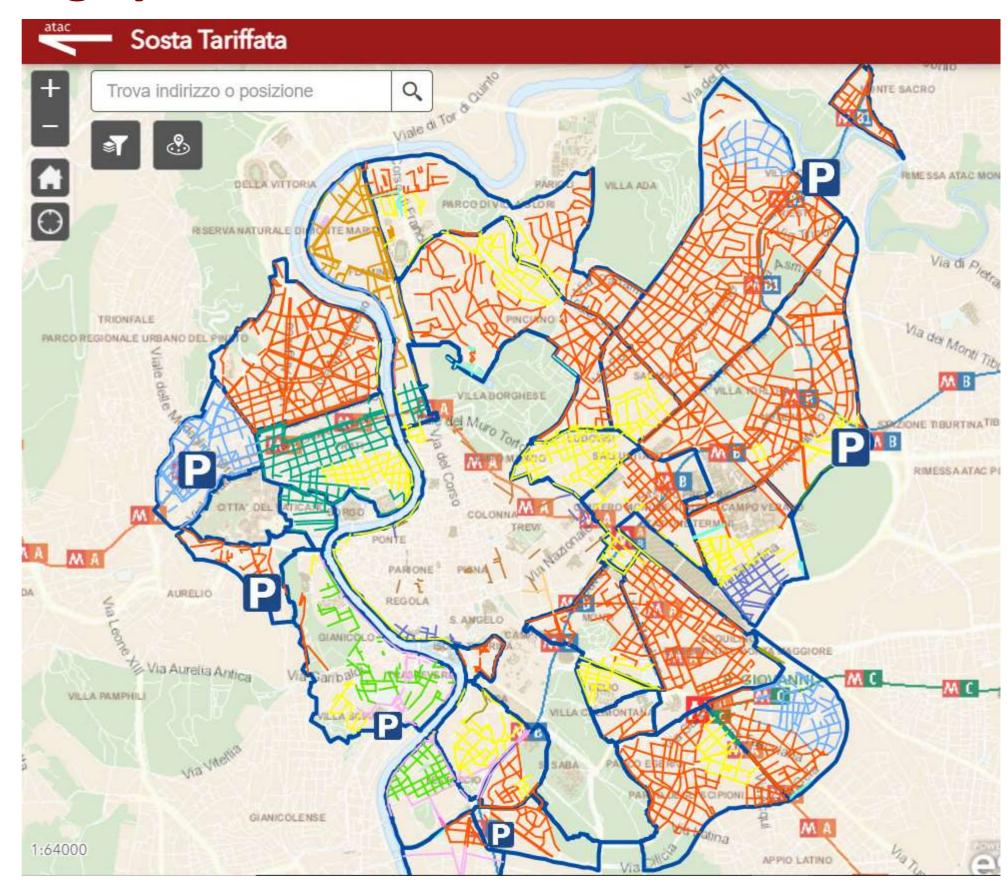


5) Smart on street Parking system

The parking spaces subject to charging should increase from the current 70,000 to 100,000.

15,000 to be established in areas not currently subject to parking meters and another 15,000 will result from the transformation of white lines.

An increase in parking fees could be the easiest to implement and also the fairest when compared to what happens in other Italian cities. But at the same time it is one of the most unpopular measures









5) Smart on street Parking system

Aim of the **SOSPAS** (Smart on-street parking system) project financed by EU structural fund 2021-27 is to facilitate the rotation of parking and logistics spaces in the central areas of the city of Rome.

The project will permit to monitor and consequently manage the occupation of a **consistent share of the parking bays** in the territory of Rome, both the ones charged and those dedicated to loading and unloading goods, in areas already regulated with parking fees.

The SOSPAS system for monitoring parking spaces will permit a precise verification of the occupation of parking spaces and relative **data analysis** in historical series, useful for the management of the charged areas.

A further system integrating permit management and parking occupancy will create the technological basis for an **automatic fining system**.

The infrastructural aspects will concern the individual parking spaces, which will be numbered and equipped with **occupancy detection systems**, and the interaction with the current parking meters and payment apps, which will be adapted to the new charging policies.

What is the optimal solution? Open to best practices.









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