



European Commission

Next steps for EU urban mobility policy and initiatives

Luana Bidasca

MOVE B4

14.12.2020



The European Green Deal is an invitation for all to participate. It is on the one hand about cutting emissions, but on the other hand it is about creating jobs and boosting innovation.

It sets the roadmap for decarbonisation, including for transport:

„Transport should become drastically less polluting, especially in cities. A combination of measures should address emissions, urban congestion, and improved public transport.”

Smart and Sustainable Transport Strategy

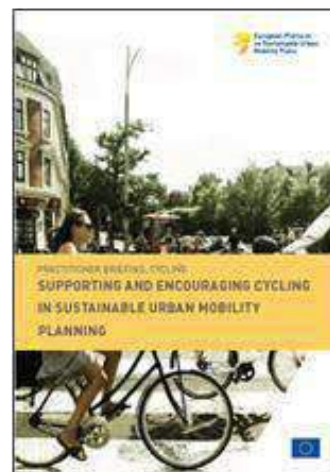
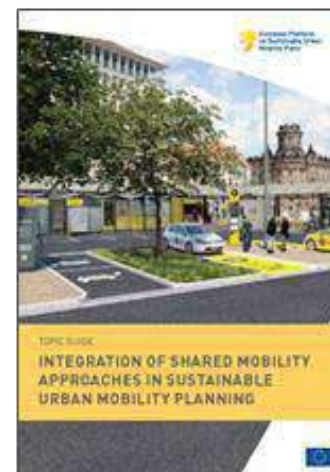
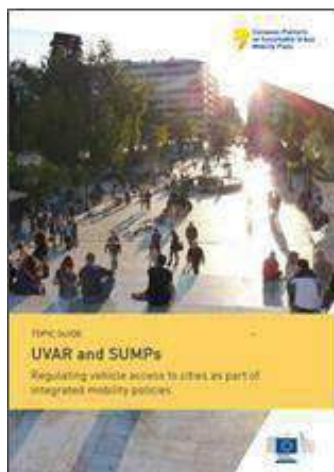
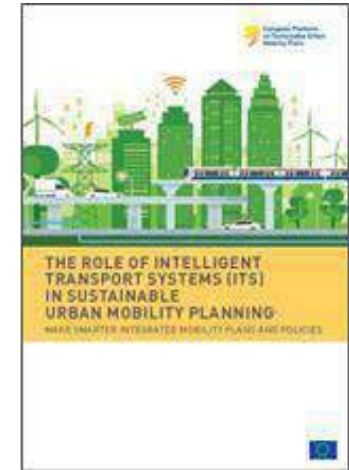
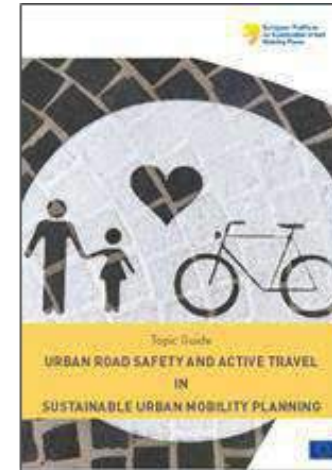
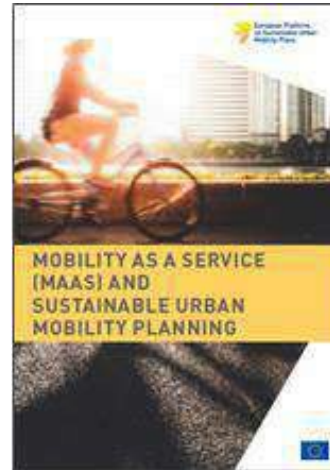
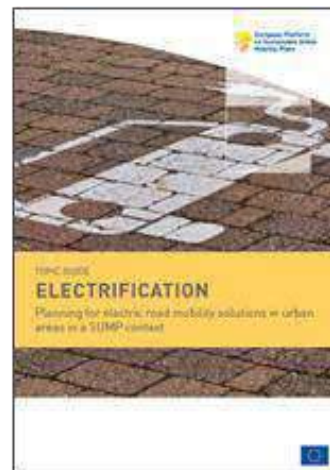
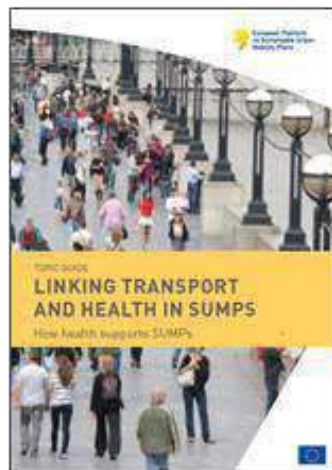
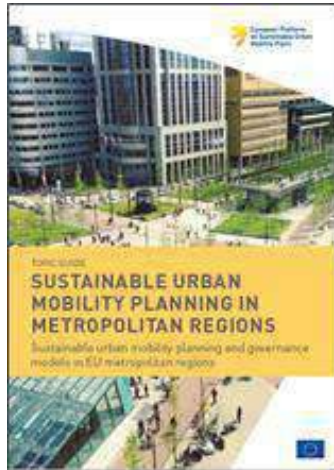
- 'Increasing modal shares of collective transport, [walking](#) and [cycling](#), as well as automated, connected and multimodal mobility will significantly lower [pollution](#) and [congestion](#).
- Active transport modes, such as [cycling](#), have seen growth with cities announcing over 2300 km of extra cycling infrastructure. This should be doubled in the next decade towards 5000 km in safe [bike](#) lanes'.
- The COM will also help [cities](#) modernise their policy toolbox in areas such as [micromobility](#), support for the [procurement](#) of zero-emission vehicles and associated infrastructure.
- Boosting innovation and the use of data and artificial intelligence (AI) for smarter mobility
- https://ec.europa.eu/transport/themes/mobilitystrategy_en

Urban mobility – what is the future?

- **Investments:** substantially more budget at EU level in the next few years + new **Recovery and Resilience Facility** with billions of euros for the green and digital recovery, also for clean urban mobility
- **Legislative and policy elements**, in particular:
 - new **Sustainable and Smart Transport Strategy** to set the course for the years to come in making transport smarter, greener and more resilient + it will target all transport modes (some urban flagships to be included)
 - new **Urban mobility initiative** (3Q2021): need to strengthen the SUMP framework, extend it to mobility management (in particular on TEN-T urban nodes) + MS have to be more involved + coherent EU approach to urban mobility data.
- **Tools for cities:** Sustainable Urban Mobility Indicators project with a benchmarking tool was finalised:

https://ec.europa.eu/transport/themes/urban/urban_mobility/sumi_en

Recollection of 2019: topic Guides and Practitioner Briefings (below)
+ **new in 2020:** *COVID and urban mobility* (briefing done in July, full guide in preparation); coming soon: *Gender and vulnerable groups* and *Freight and logistics planning in urban nodes of TEN-T*



Evaluation of Urban Mobility Package (UMP)

- An evaluation of the [2013 Urban Mobility Package](#) is under way, to finish in December 2020.
- [New Urban Mobility Package expected for 2021](#). It will be also informed by the results of a Fact Finding Study 'Status and future needs regarding zero-emission urban mobility' (over 120 cities)
- Despite progress done – [congestion, poor air quality, CO2 emissions and road accidents](#) – still persist. New challenges to consider:



1. Poor connectivity of peri-urban and rural areas



2. Accelerating climate and environmental crises



3. New mobility services enabled by digitalisation



4. Impact of Covid and changes in mobility, work and consumption patterns

Fact Finding Study – Low and zero emission mobility

- Status update of current urban mobility situation and trends, indicating gaps and needs in the specific subject areas when it comes to achieving safe, accessible, affordable, smart, and low-and zero-emission urban mobility at city level.
- Focusing on four domains and surveying a representative sample of **125** cities on:
 1. SUMP frameworks
 2. Urban Logistics
 3. UVARs
 4. Sustainable Urban Mobility Indicators and data collection
- Interim report due in November and a validation workshop planned February 2021

Research and Innovation: Horizon Europe

- **Horizon Europe Work Programme - CIVITAS 2030**
- Horizon Partnership on Cities - “Driving Urban Transitions” – co-funded
- Horizon Cities Mission – 100 climate neutral cities by 2030 -
- Green Deal Call https://ec.europa.eu/info/research-and-innovation/strategy/european-green-deal/call_en - open until 26 January
- Knowledge and Innovation Communities – Urban Mobility (EIT)



Thank you for your attention!

- Luana-maria.bidasca@ec.europa.eu



Project Overview

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MaaS
Lab



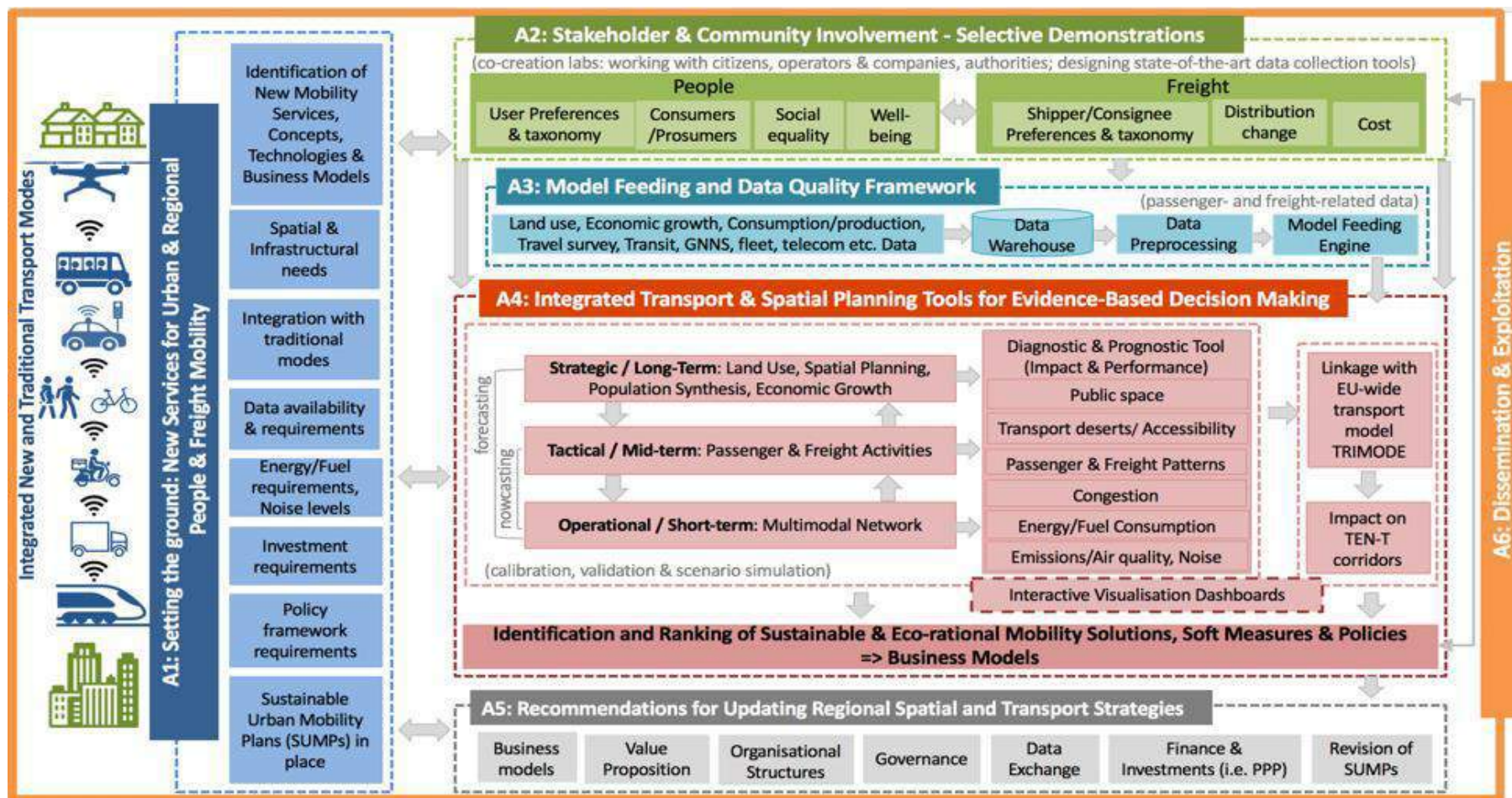


Vision

Develop a **new generation of harmonised spatial and multimodal transport planning tools** which comprehensively model the dynamics of the changing transport sector and spatial organisation, enabling metropolitan area authorities to lead the transition to a low carbon new mobility era in a sustainable manner.



HARMONY architecture





HARMONY Metropolitan Areas' Activities



Rotterdam

- Electric AV demonstration - Freight
 - HARMONY MS - Freight

Oxfordshire

- Electric AV demonstration - Passenger & Freight
 - Drones demonstration - Freight
 - HARMONY MS - Passenger

Athens

- HARMONY MS - Passenger

Turin

- HARMONY MS - Passenger

Trikala

- Drones demonstration for medical purposes

Katowice (GZM)

- Adopter metropolitan area

Trailblazing

Aspiring

Follower

Main outcomes

- The HARMONY MS (software)
- AVs and drones demonstrations
- Training material and activities for using the HARMONY MS
- Recommendations for SUMP's update (AVs & drones included)



HARMONY consortium



21 partners from 9 European countries



HARMONY
SPATIAL & TRANSPORT PLANNING FOR A NEW MOBILITY ERA



www.harmony-h2020.eu



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Harmony_H2020



This project has received funding from the European Union's Horizon 2020 research and innovation programme under grant agreement No 815269



Managing the unexpected

SUMP and new mobility services during COVID-19

Webinar - 14 December 2020 - 14:00 CET

14/12/2020



The impact of COVID-19 on HARMONY's SUMPs

Stefano Borgato
TRT Trasporti e Territorio



What is a SUMP?

“a strategic plan designed to satisfy the mobility needs of people and businesses in cities and their surroundings for a better accessibility and quality of life. It builds on existing planning practices and takes due consideration of integration, participation, and evaluation principles.”

- **Integrated, strategic, long-term** plan with clear goals.
- Solving **urban transport problems** and contributing to reaching local and higher-level objectives for environmental, social and local development
- **Set of guiding principles** that can be **adapted** to the specific circumstances
- More than **1,000 SUMP**s in EU
- Major **contributors**: countries where it is mandatory by law or supported by significant incentives (e.g. BE, FR, ES)
- **New SUMP Guidelines** published in October 2019





-

... and
more will
follow



SUMPs of HARMONY metropolitan areas

Quite **heterogeneous picture**: in some cases a SUMP has been developed and it is planned to be updated or integrated with action programs for specific aspects, in other cases it is under definition for the first time, while in some others similar planning documents (sharing most of the basic principles) are being developed.

For each **case study**, based on a common template (*HARMONY D1.1*):

- description of metropolitan area,
- overview of the status of urban planning
- focus on the key elements of the SUMP or the similar planning document





SUMPs of HARMONY metropolitan areas

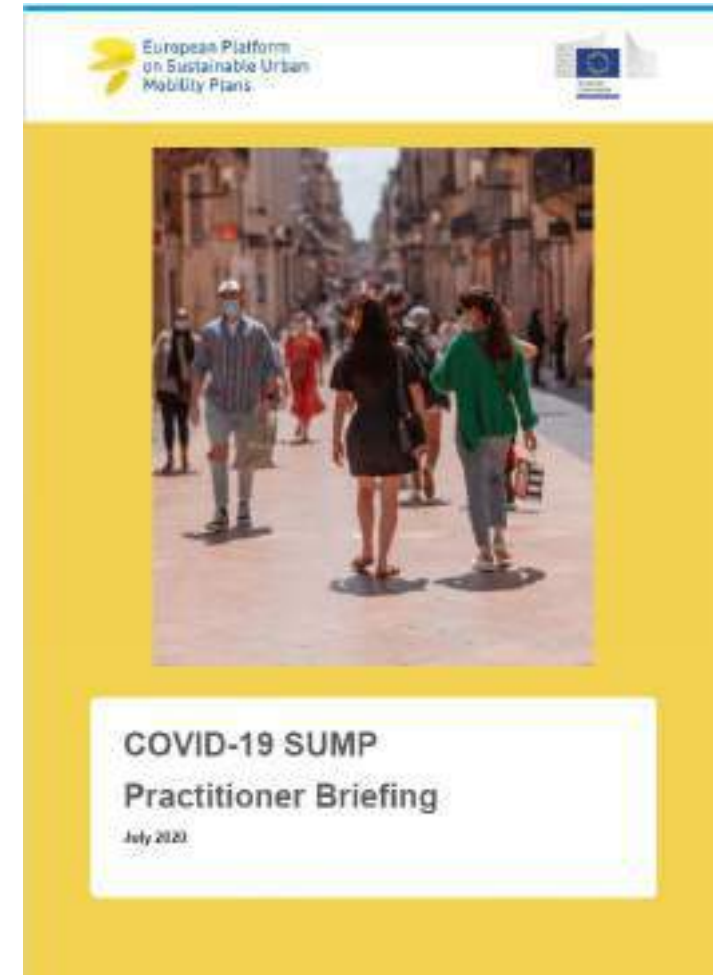
	Rotterdam (NL)	Oxfordshire county (UK)	Torino (IT)	Athens (GR)	Trikala (GR)	Upper Silesian-Zaglebe (PL)
Population						
Municipality	640,000	154,000	886,000	660,000	81,355	296,262 (Katowice)
Metrop. area	4,000,000	666,000	2,277,000	3,750,000	138,047	2,300,000
Mode split						
Car	49%	87% / 67%	56%	45%	60%	65%
Public transport	17%	(Oxford city) about 20%	16%	35%	15% (incl.bike)	24%
SUMP						
	SUMP in 2017	Local Transport Plan (SUMP) in 2016	SUMP (municipality) in 2010	26 SUMPs in progress	SUMP developed in 2020	SUMP for central sub-region in 2018
	Upcoming detailed action programmes and updates	Update started and planned for 2020	Update started (Metrop. Area) and planned for 2021	16 municipalities launched SUMP in 2019, 10 in 2020 2 of them are at the final stage	Upcoming detailed action programme	New SUMP for GZM started in Oct. 2019, will be ready by end of 2021. Policy of Sustainable Mobility (mini-SUMP) ready in January 2021



SUMPs in tackling emergency situations

- Response to the **COVID-19 crisis**
- **Lessons learned** (until June 2020) for immediate, mid-term, and longer-term actions from European cities and regions
- Understanding **mobility impacts** (offer and demand, behaviour, attitude) and new **challenges** ahead
- Cities transforming mobility challenges into **opportunities**: new mobility solutions

The SUMP process has provided cities with a portfolio of fit-to-purpose measures to be fast-tracked to combat the impact of COVID-19 on mobility in urban areas and to create opportunities for people to make best use of the city and its public spaces





Measure area 1: Walking, cycling, and reallocation of public space

- Give more **space** to pedestrian: more room to move, more room to queue

The London's Mayor's Streetspace Plan →



- Create safe and segregated **cycling infrastructure** to ensure cyclists safety

Ile-de-France →



- **Speed reduction** measures and slow streets

Brussels region's slow streets

- **Spatial design** opportunities

Lisbon's A Rua é Sua (the street is yours)

- **Open streets**

Milan's Strade Aperte (Open Streets) →





Measure area 2: Public Transport

- Think **multi-modal** to de-crowd and keep the city moving
- Infrastructure measure to allow for **safe and comfortable waiting** at bus stops and interchanges
- **Money** matters

Good practice: Madrid

- *De-escalation plan: guarantee health, provision of service, and restore confidence*
- *Additional 45km of bus lanes*
- *New communication campaign for people with reduced mobility*





Measure area 3: Shared mobility

- New **public-private partnerships** and business models are needed to support the transition to integrated sustainable mobility
- While public transport remain the backbone of urban mobility, shared mobility present itself as a **key alternative** to help increase capacity
- Ensuring the **financial viability** of the shared mobility sector
- Multimodality and full integration in transport should be embraced, accelerating the rollout of **MaaS**

Good practice: Brussels

- *E-bike sharing tripled its users compared to pre-lockdown*
- *Sustainable alternative for short-medium distance journeys*
- *Users invited to become shareholders to help bike sharing become a pillar of public transport*





The importance of SUMP during the pandemic

- During a crisis directly affecting mobility, **SUMP** could be the **leading process** for local and regional coordination of mobility **measure implementation**
- The crisis has the potential to **raise awareness** among actors that **integrated processes** are necessary and support a **rapid response** in a coordinate manner
- More **agile planning** is required
- Temporary measures could become the norm in order to serve **broader sustainable mobility goals**
- The pandemic could be an opportunity for a **better “new normal”**

January 2021, New **SUMP topic guide**: *Planning for sustainable and resilient cities in time of crisis*



14/12/2020



Thank you!

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Session 1

SUMP in the COVID-19 era



Maria Konstantinidou

Researcher at OASA



Laura Peacock

Innovation Hub
Manager at
Oxfordshire County
Council



Maria Kamargianni

Associate professor at
UCL, Head of MaaS
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Emergency measures for the enhancement of public transport systems (Athens, Greece)



Maria Konstantinidou
Athens Public
Transport Organization





The Covid-19 pandemic and public transport

- The social distancing requirements that the pandemic imposed could not be disregarded by the Greek Government who has set high standards for the operation of the mass transit systems of all cities.
- As such, in August 2020, the Greek Government issued a legislative act entitled "**Emergency measures for the enhancement of public transport systems**", whose main objective was to increase the scheduling frequency of the mass transit systems.
- On top of that, the pandemic speeded up the adoption of other **sustainability measures** and made the public more aware of personal hygiene measures.



Modifications of public transport operations

Modifications of the transport operations unfold on the basis of **five pillars**. These include:

1. **Limitations on the allowable passenger capacity:** The allowable capacity is now set at 65% for both the seated and the standing passengers. Stickers mark the seats that are not allowed to be used. However, it is up to the standing passengers to conform to the social distancing restrictions.
2. **Contracting with transport operators:** OASA has cooperated with an intercity bus operator in order for the latter to assume the operation of 60 bus lines that lie in the peripheral districts of the OASA service area. By the end of November 2020, the 200 buses added to the fleet brought the total number of operating buses to 1300, marking a 53% rise when compared to July 2019.





Modifications of public transport operations

3. **Leasing of buses:** OASA is planning to procure an additional number of 300 buses (aged up to 10 years) through a leasing scheme.
4. **Hiring of personnel:** OASA proceeds with 609 recruitments of drivers and technical staff via fast-track procedures in order to more efficiently cope with the intensified transport needs. The recruitments will not only serve the current circumstances, but the personnel will remain in place even after the pandemic ends.
5. **Metro headways:** The service frequency of the Athens subway has increased. During peak hours, from Monday to Friday, itineraries on Line 2 are scheduled every 4.5min and on Line 3 every 4min.





Urban transport sustainability measures

With respect to the sustainability measures, four initiatives are currently taking place in Athens:

1. The “Great Walk of Athens” is one of the greatest urban initiatives ever held in the capital. It commenced on a “pilot basis” at the end of June 2020 with gentle road re-configurations through signage and coloring of the lanes and the installation of plants and urban equipment. The project will take its final form in the second phase, with completion expected by 2022.
2. The introduction of DRT for the first time in Attica is expected to attract passengers from private modes of transport and, even slightly, alleviate congestion effects. If successfully implemented, this first DRT line will work as a pilot for the introduction of other lines as well.





Urban transport sustainability measures

3. The tender for the renewal of the Athens and Thessaloniki urban bus fleets includes the purchase of buses and will be done in two installments. The tender for the procurement of the first 800 buses is under preparation and it is expected to be launched at the end of 2020.
4. Electric vehicles are considered as one of the possible options in the tender. As such, demonstrations of electric buses are planned to be carried out until June 2021. The first electric bus is already running on the streets of Athens and it will, for the next two months, be carrying passengers on selected itineraries.





Other health protection measures

A series of measures have been taken against the spreading of the coronavirus. These include:

- **Face masks**: must be worn by all passengers and personnel without exception (while travelling and at the stations).
- **Social distancing**: must be retained at all times.
- **Information provision**: all screens at bus and metro stations display information messages on a loop, reminding citizens to pay attention to personal hygiene measures.
- **Disinfection of vehicles**: takes place on a daily basis, cleansing measures at the stations are intensified.
- **Antiseptics**: intended for employee use only, placed at various points at the stations (offices, ticket counters etc).





Possible long-term effects



Since the onset of this pandemic, OASA is continuously trying to adapt to the new circumstances and retain flexibility in the management of its fleet. However, as the effects of this crisis are yet to unfold, OASA watches rigorously for any possible **long-term differentiations of the urban travel patterns**, as these could possibly be induced by the extensive adoption of tele-working and distance learning.



Thank you!

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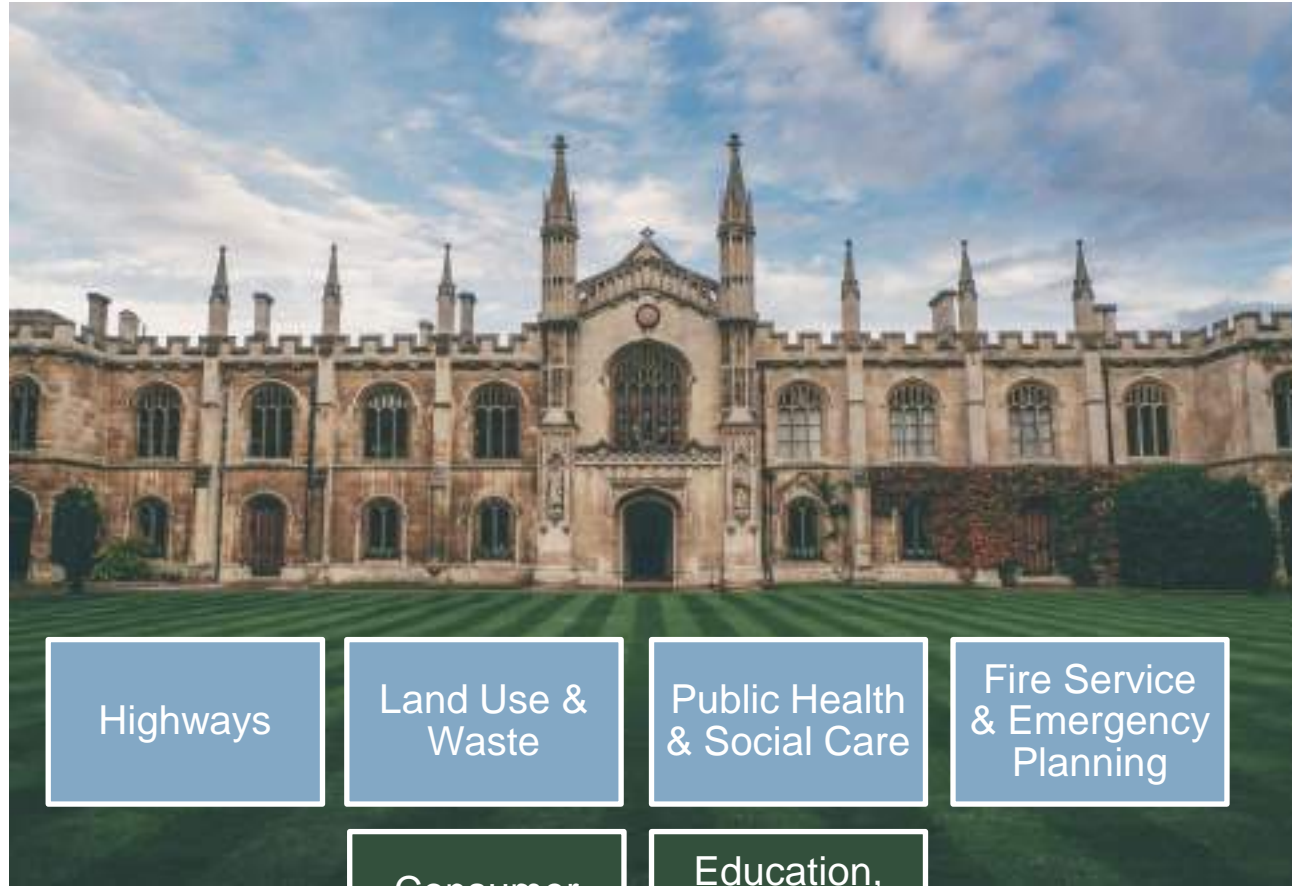
COVID-19 Innovation Responses

Laura Peacock
Innovation Hub Manager
Oxfordshire County Council





Who are we



Highways

Land Use &
Waste

Public Health
& Social Care

Fire Service
& Emergency
Planning

Consumer
Protection

Education,
Libraries &
Museums



OXFORDSHIRE
COUNTY COUNCIL



Our Approach

COVID-19 has been a major disruption in all function of OCC: as a highways, cultural services, death management, public health and education authorities. It was also stretched our business continuity plans



Adapting our Services

Delivering during crisis



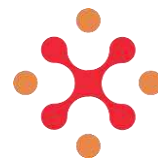
Supporting the Effort

Combating the Disease and its impacts



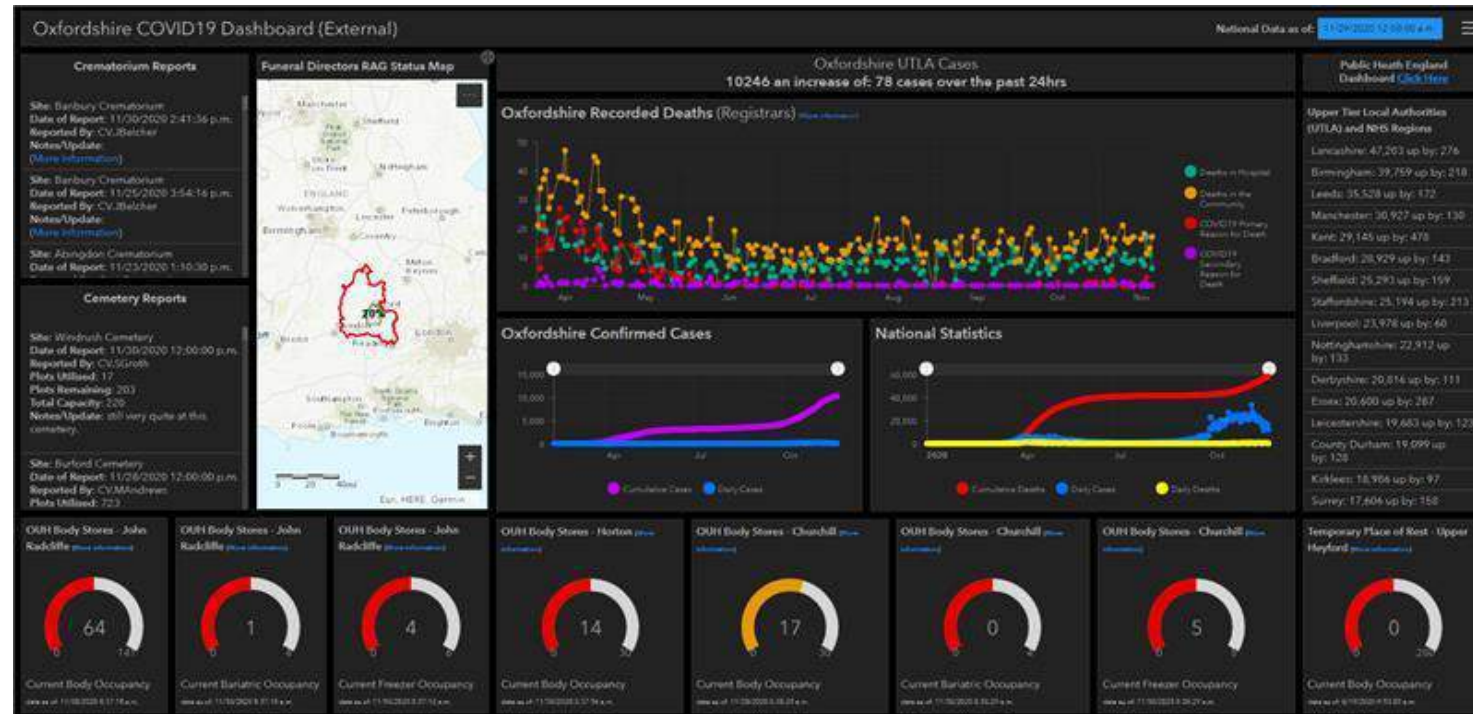
Disruptive Innovation

Building back better



1. ADAPTING: EDAG

One responsibilities of the council stretched at this time is the death management. iHUB were part of the Excess Death Advisory Group, creating an MVP and digitising for the first time the end-to-end service with relevant stakeholders

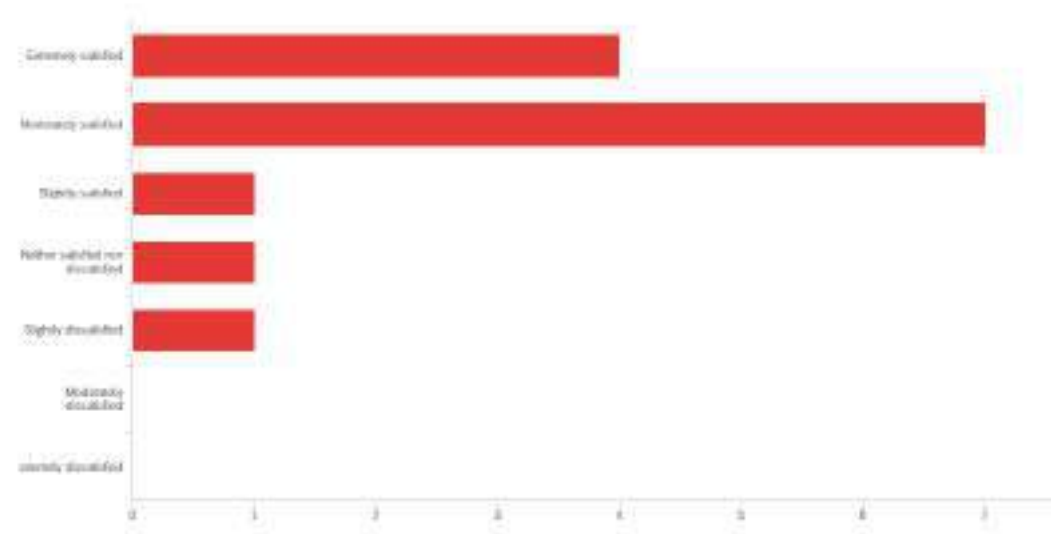




1. ADAPTING: WFH

iHUB staff have now been working and been productive remotely for more than 6 months. In that time, our business continuity plan has been used and extended adaptably, to ensure everyone has enough provisions such as chairs, screens and back support.

Q6 - How satisfied or dissatisfied are you with the provisions to work during COVID-19?



iHUB staff satisfaction survey Oct 2020

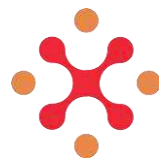


2. RESEARCH: SOCIAL DISTANCING

During this time, we have used our existing data sources, and adapted them to new algorithms to use them for social distancing. Data from our sensors have been shared with DfT (in aggregated form) to support decision making.



Example of Vivacity Lab Sensors



2. RESEARCH: SOCIAL DISTANCING



Example of Vivacity Lab Sensors



2. RESEARCH: F@W

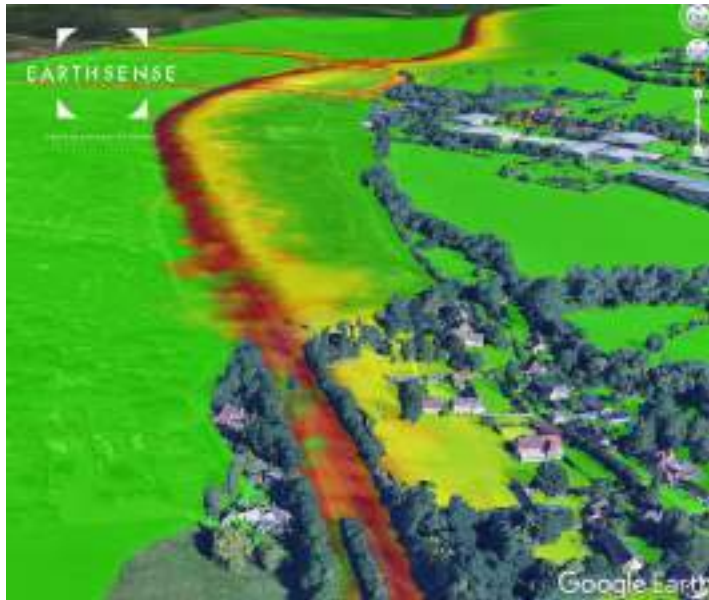


We have been supporting the Folding @Home project with our considerable computational power at the innovation hub. This is a collaborative project led by Stanford university to understand how the virus interacts with the human receptors.

This research might lead to better medication against the virus.



2. RESEARCH: Environmental Impacts



In collaboration with the University of Birmingham, University of Oxford and the Oxford City Council, OCC have been successful in their application to take advantage of the reduced traffic to better understand the impact of vehicles on air quality.

This project, will utilise existing tools, and install new sensors to model and analyse to the level of individual vehicles the ground-level dispersion.



2. RESEARCH: UAV Medical Deliveries



In collaboration with Unmanned Life, OCC have been successful in their application to trial medicine delivery between a pharmacy and a care home in the next 6 months.

This project takes advantage of the reduced traffic to push innovation that will both decrease the risk of transmission in the short term, but also provide a scalable business model to reduce costs and emissions.



3. RECOVERY: ACTIVE TRAVEL



The re-introduction of traffic to the network after the lockdown is a rare opportunity to alter the way people and goods move through the county.

OCC has been prioritising active travel measures, in total securing more than £3M funding for the government for low traffic neighbourhoods, bus gates and traffic filters, as well as cycle lanes and complimentary measures.



3. RECOVERY: ROAD CONDITION



In the time of COVID-19, our highways teams have taken advantage of the reduced traffic to accelerate the repair works in the traffic network, fixing sensors, potholes and other measures.

We have also initiated major transport infrastructure schemes, such as the A40 works. In planning these schemes, iHUB has provided insights for the need to futureproof and live monitoring.



Summary

The time of the pandemic has been challenging to everyone, and added stress to our resources. Yet, we have been able to push the boundaries of innovation in the delivery of essential services and trial new models.

While COVID-19 is not foreseen to be a long-term effect, and thus not a direct policy measure, we are now more experienced and knowledgeable in the response of such major disruption and more aware of their likelihood. This will also be reflected in the upcoming business continuity and policy plans.



Thank you!

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Results of HARMONY Stakeholder Study for COVID-19 Effects on Transport Planning



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Christina Georgouli

Research Assistant – Transport Planning
MaaSLab, Energy Institute, UCL



MaaS
Lab





Objective of the study

- The objective of the study is to capture changes in policy objectives and planning actions due to Covid-19 outbreak.
- An online survey and 1:1 interviews were conducted with representatives from different European cities, to learn more about responses to the pandemic.
- The results of the survey and interviews aim to reveal new practices and tools for confronting emergency scenarios such as Covid-19 pandemic.



Profile and location of participants

Online survey

- Data was collected for 3 weeks
- 30 responses were complete and valid
- 12 public authorities, 7 research institutes, 6 consultancies, 5 other
- 15 large organisations (>250), 8 micro (<10), 4 small (10-49), 3 medium (50-249)
- 14 respondents were 35-44, 8 between 45-54, 5 between 25-34, 2 between 55-64
- Majority of respondents were male (8 female)

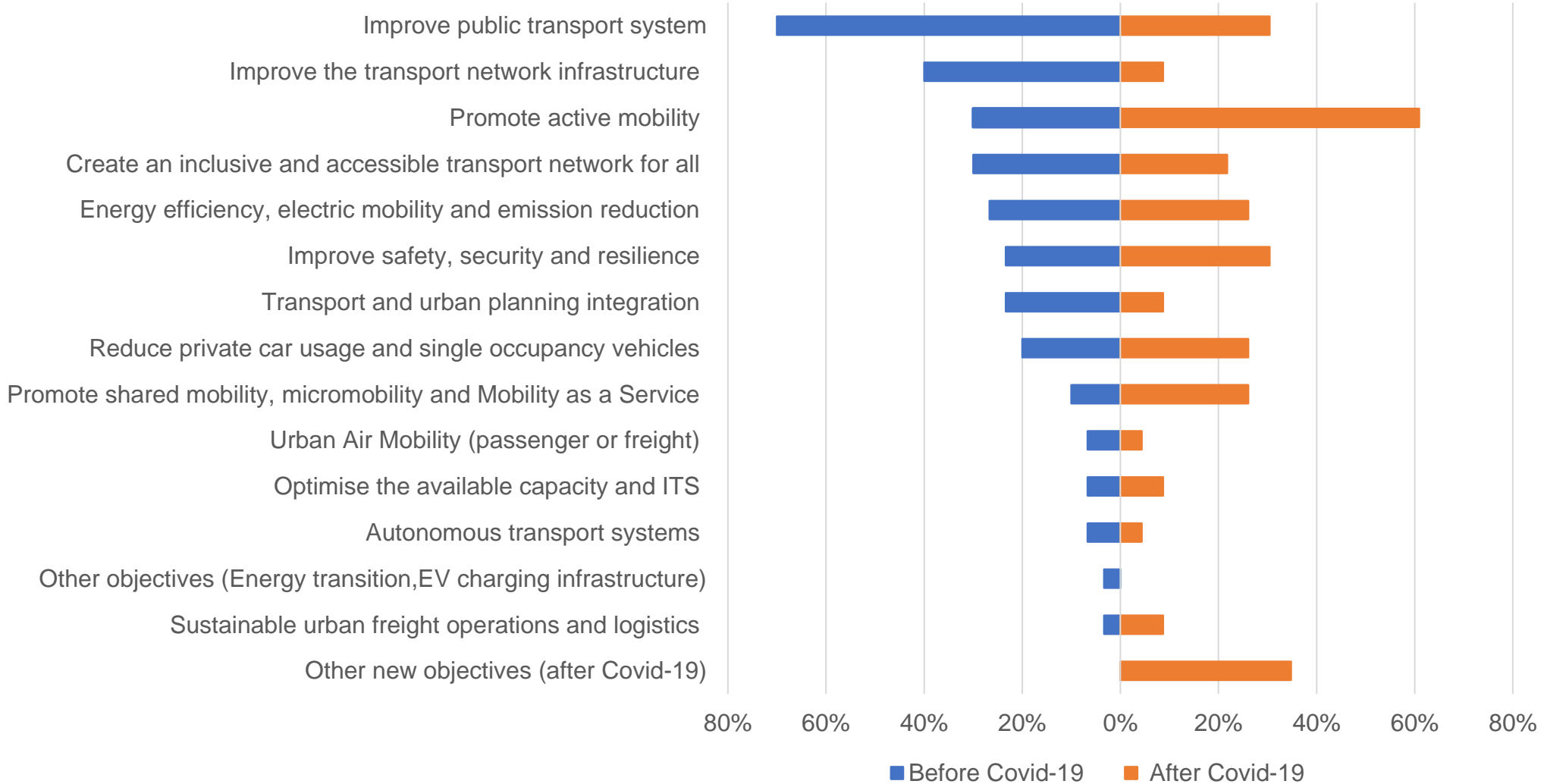
Interviews

- 7 public authorities participated to online interviews
- 1 hour focusing on planning priorities and actions





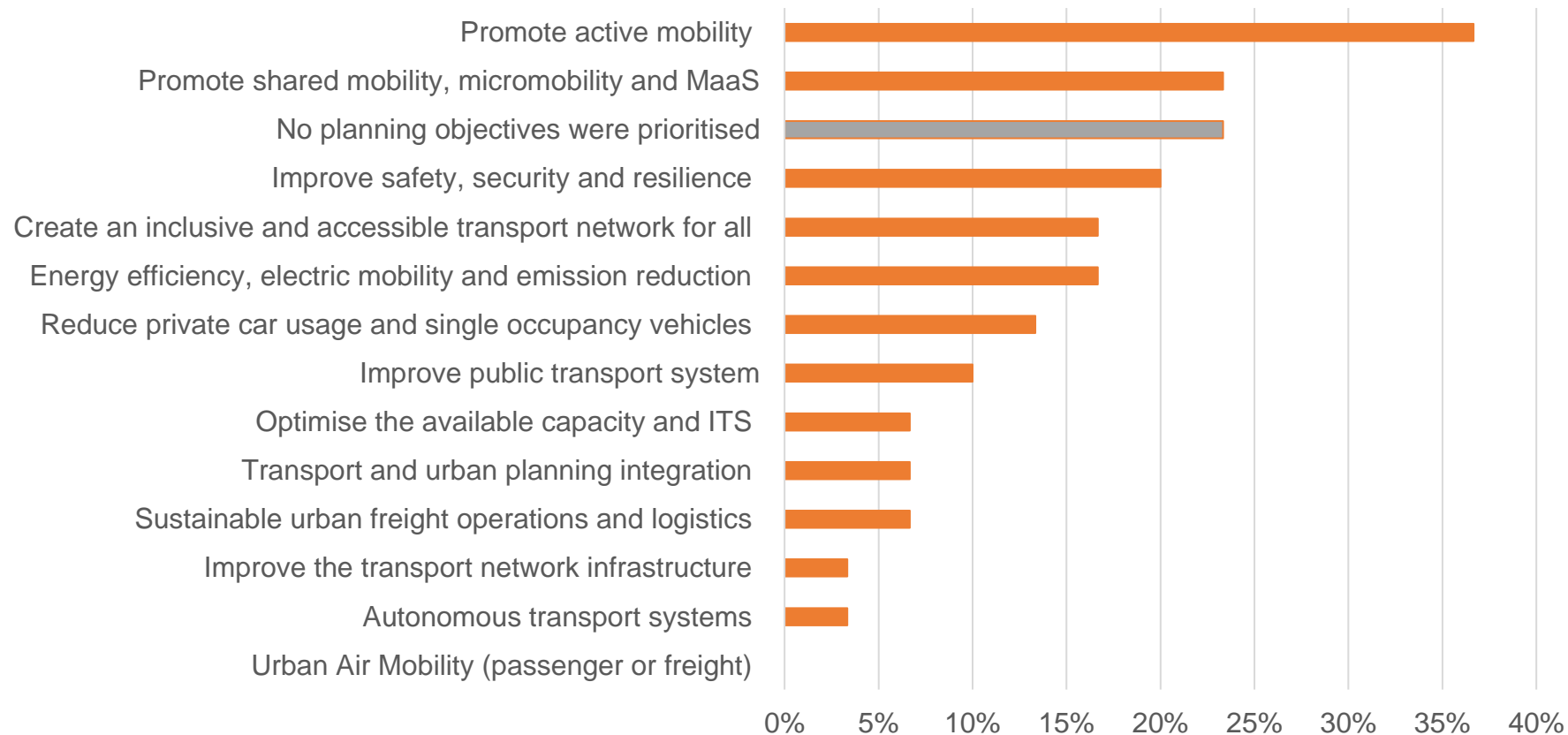
Planning Objectives before and after Covid-19



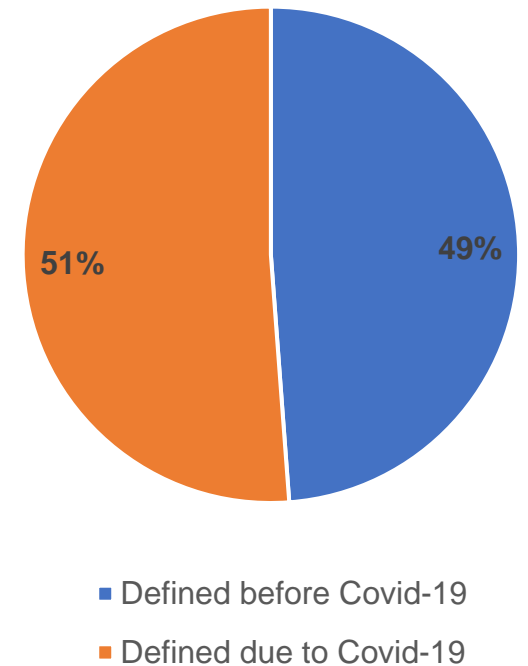


Prioritised or introduced planning objectives and adopted actions after Covid-19 outbreak

Planning objectives

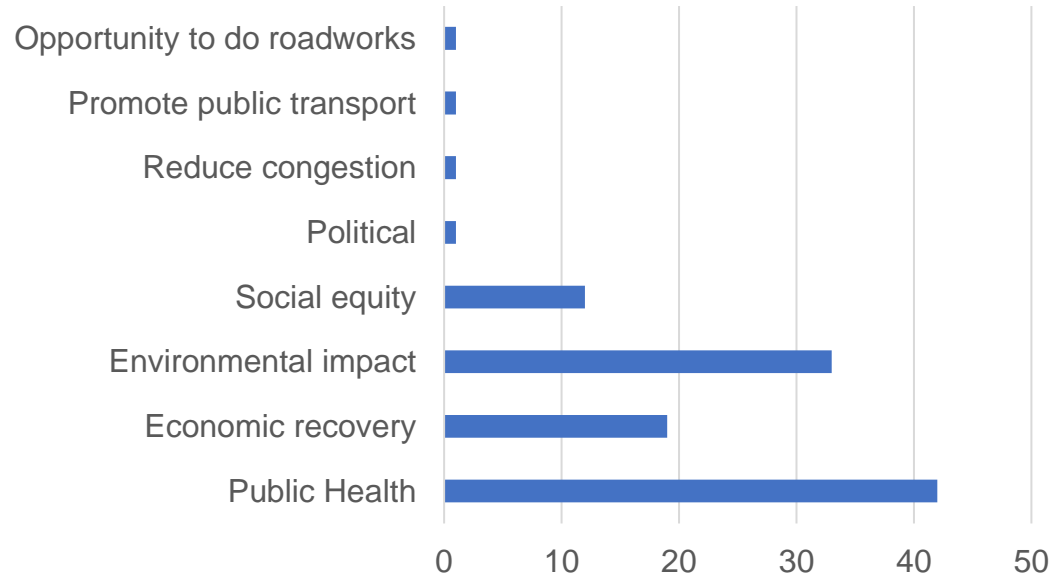


Actions

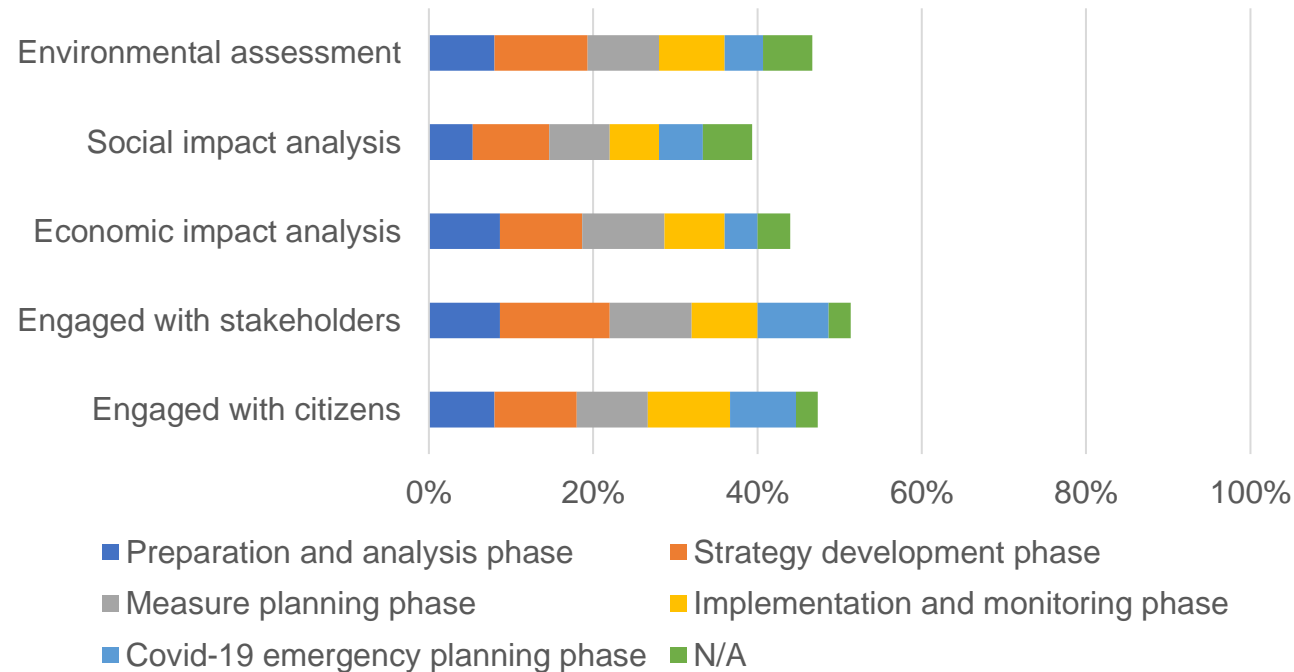




Reasons that triggered changes in planning objectives since Covid-19



Activities across planning phases





Key findings from interviews

- **Top-down prioritisation:** national policy, measures and guidance were triggers for the introduction or prioritisation of objectives and actions at local level
- **Change of priorities is informal** and not integrated in planning process – emergency planning
- Shortcomings in planning phases depend on the type of organisation
- **Data quality and availability** is mentioned as a **key factor** in planning process
- Level of stakeholder engagement and information sharing is diverse
- Covid-19 is identified as an **accelerator of measures** towards sustainability

14/12/2020

Thank you!

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