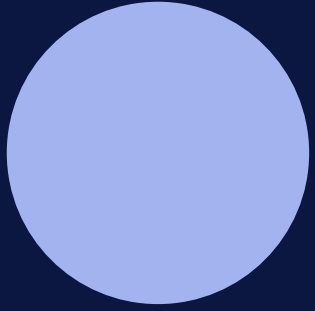


// **ESPO LORDIMAS** - Monitoring and measuring digital transformation at local and regional levels

Martin Gauk (martin.gauk@espon.eu)

Specificko teritoriju loma krizes

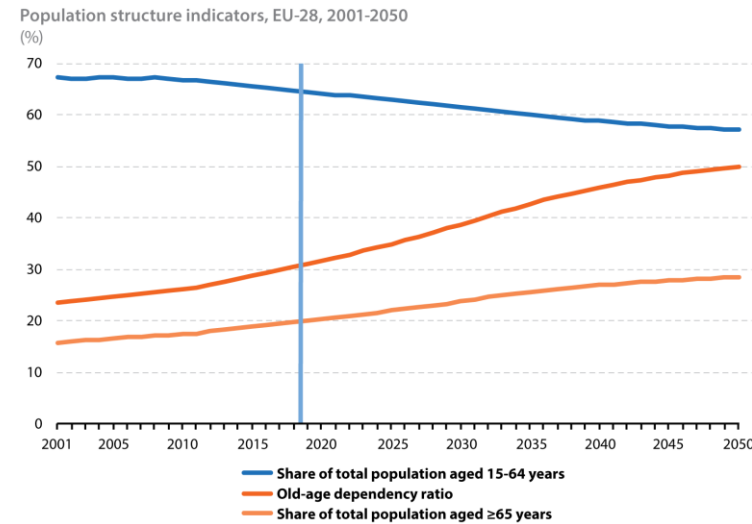
27 November 2024



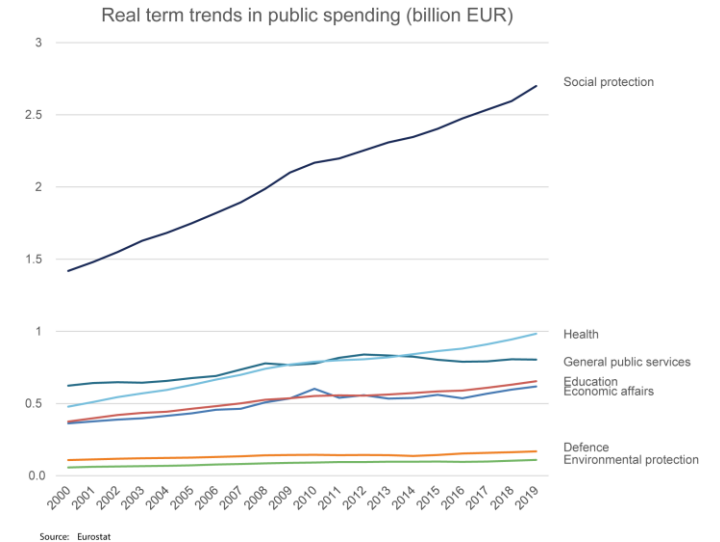
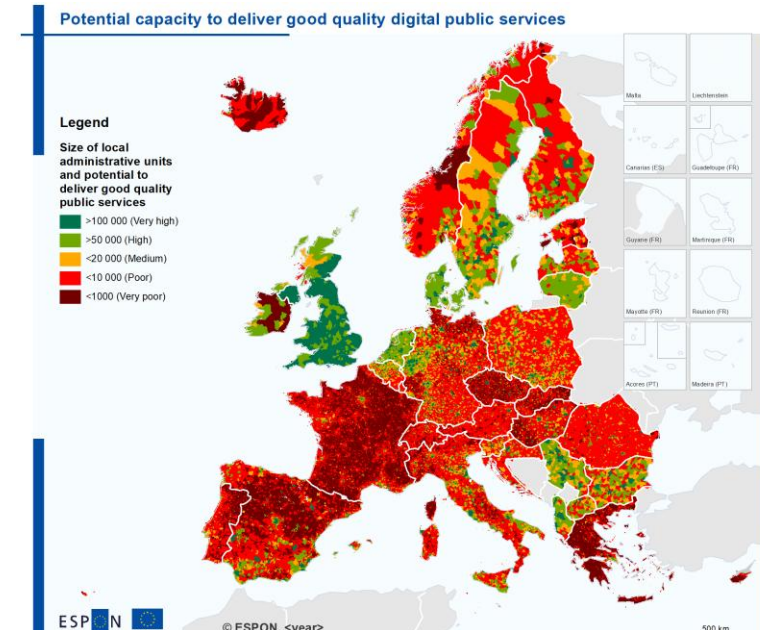
Context and grand challenges

Why measuring and monitoring are vital?

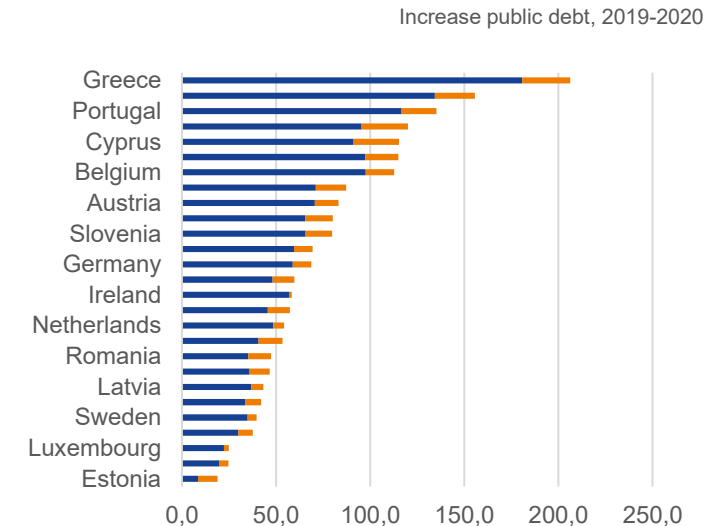
- Demand for public services is on the rise
- So is the need for expenditure
- But capacity to deliver is uneven across the board
- And the government's fiscal situation is under an increasing strain



Source: Eurostat



Source: Eurostat



To sum up:

Endless/increasing demand

but

infinite/less resources to deliver

Local context matters but needs addressing in a wider (EU) perspective

- Cost of ageing:
 - Healthcare: 10 % GDP
 - Pensions: 13 % GDP
- Cost of climate change: 4% of GDP/annually
- Cost of recovery from the pandemic: 6% GDP

In addition, global instability hikes up costs for living, defense, subsidies for energy and other supply chain disruptions.



How does digital fit in?

The real prize and productivity gains are not in:

- automation of existing processes.
- isolated success stories in advanced communities.

The real prize is in adoption at scale!



Creating, adopting and following digital commons: standards, building blocks, platforms and services, APIs together, in an open innovation ecosystem.

Only transforming at scale can result in large scale can lead to increased productivity, not only in the public sector, but consequently also across the broader tax base..

What is being done about it?

THE EUROPEAN DATA STRATEGY



European Digital Innovation Hubs (EDIH)

Green Deal Dataspace



EIP-SCC
European Innovation Partnership on Smart Cities and Communities

ENVIRONMENT



INFRASTRUCTURES

LORDIMAS

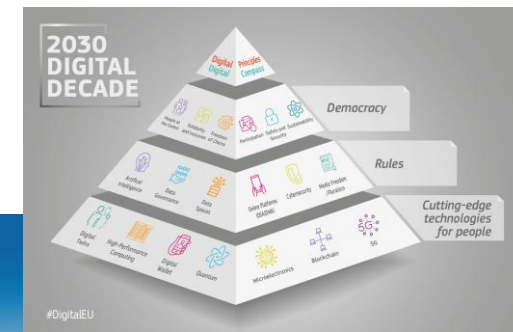
LIVING-IN.EU

AI Package and Coordinated Plan on AI



Data space for smart communities

DestinationEarth



100 INTELLIGENT CITIES CHALLENGE
THE SUCCESSOR TO THE DIGITAL CITIES CHALLENGE



AURORAL
6Aika

OPEN & AGILE SMART CITIES

Minimal Interoperability Mechanisms (MIMs)



LIVING-IN.EU
The European way of digital transformation in cities and communities

Digitalisation - a key priority in the EU policy frameworks

However, lack of data and evidence on the developments at regional and local levels

How can ESPON help?

2017-2018

Policy Brief on digital transformation of **Public Services**

Targeted Analysis on **eHEalth** (EE, FI, SI, BG)

2019-2020

Methodology and indicator list
Local&Regional Digital Transformation LORDI

Policy Brief on **Digital Innovation** in public sector

2021-2022

European Research on Digital Governance
DIGISER

Targeted Analysis and Working Paper on **Digitalising Spatial Planning**

Thematic Paper on **eHEalth**

2023

Methodology and self-assessment tool **LORDIMAS**

2024

Work with **LORDIMAS** continues

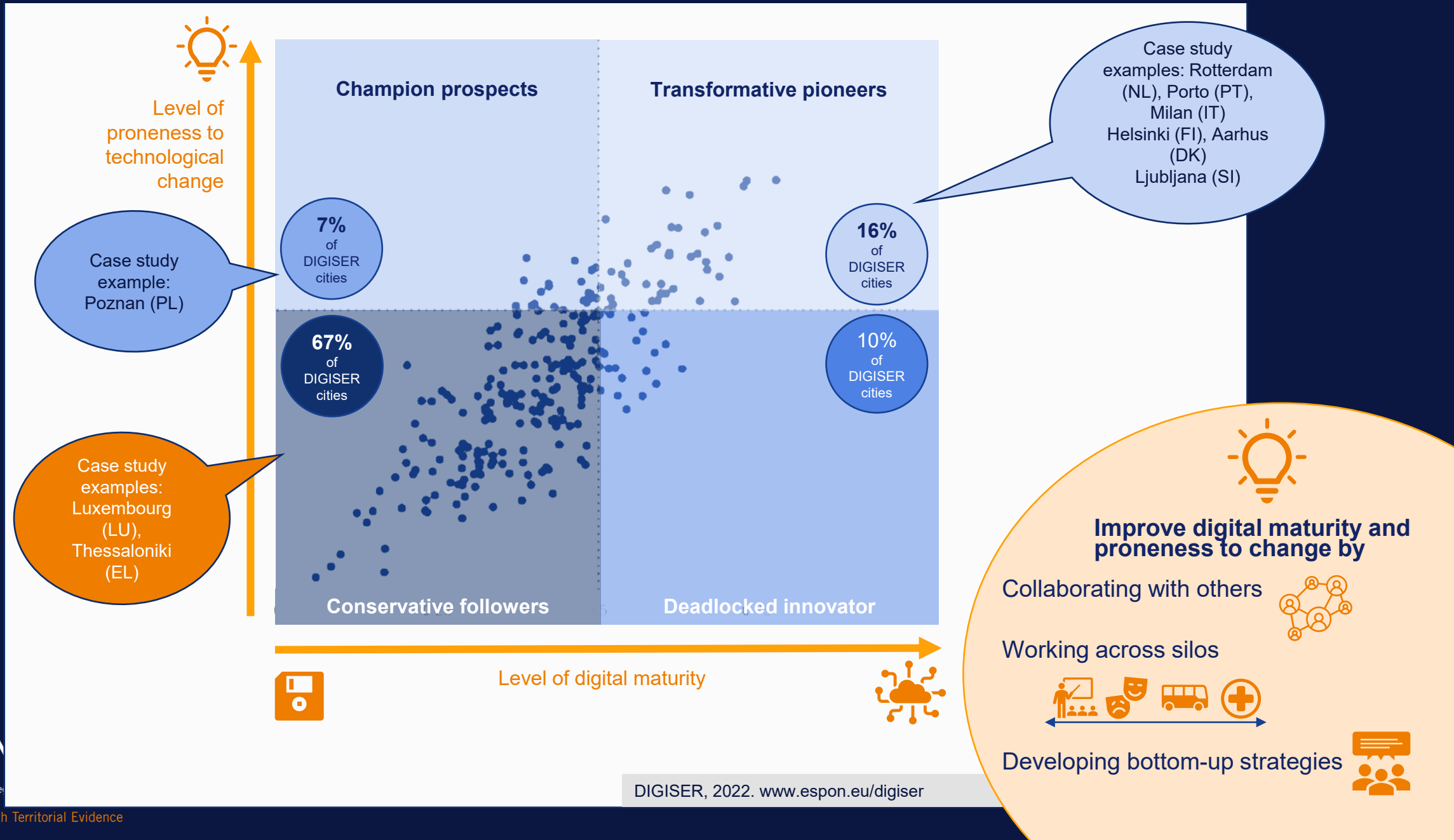
Launch of a new European research on digital divides **DIGIREG**

Launch of a new Targeted Analysis on digital helpers **DHAK**

2

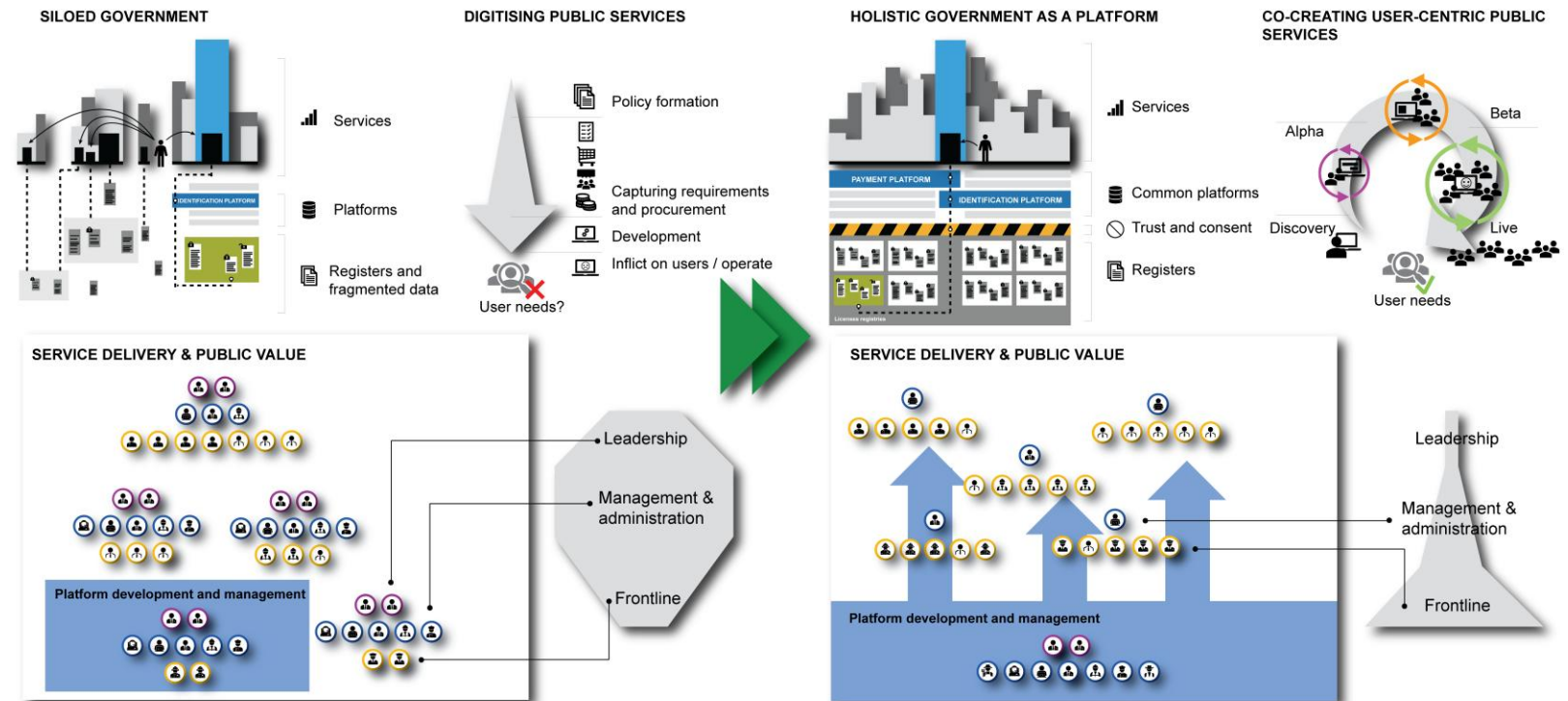
State of play of digitalization of public sector and its services: insights from ESPON DIGISER

Digital maturity and proneness to technological change differ among European cities



Grand challenges:

- Scaling
- Structure
- Processes
- Capacity



Grand Challenges addressed in DIGISER

- **Scaling**
- **Structure**
- **Processes**
- **Capacity**

There are 32 national, 304 regional, 1034 intermediary and `95000 local governments in the ESPON countries (EU, EFTA, UK)

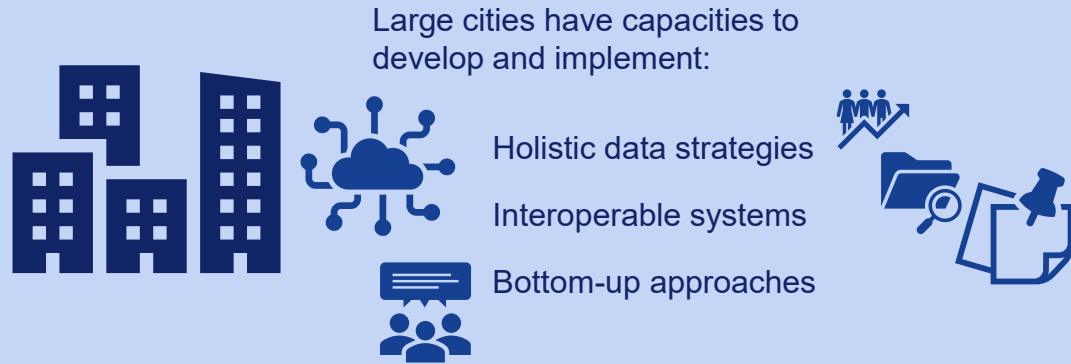
Each surrounded by administrative, health, social care, education, transport, emergency and third sectors.

Each with its own, largely duplicated digital infrastructure, roles and institutional processes.

Each piloting solutions that already exist elsewhere.

Scaling governments and markets to take full advantage of the digital revolution

Large cities benefit from sufficient capacities



In medium sized cities much data is collected and processed separately per sector



Smaller cities focus on data collection



35% of DIGISER cities operate or work with urban data platforms. This rate rises to **58%** for capital cities but drops to **31%** for non-capital cities

Possibilities to scale government activities and markets for every city

35%

of DIGISER cities report the use or production of big data

Develop data management strategies

Based on participatory approaches
Use (big) data, re-use data



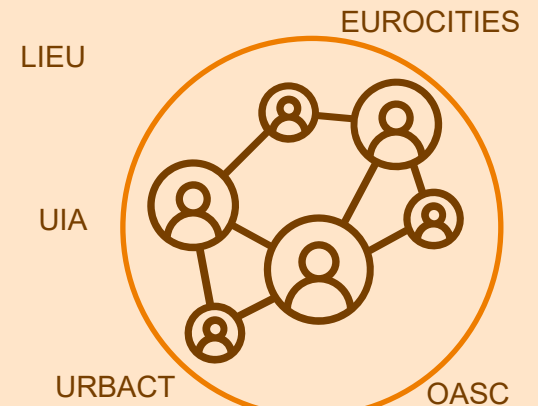
Less than **20%**

of DIGISER cities adopt interoperable digital systems

Develop interoperable systems

Collaborate

Across policy sectors
With other cities



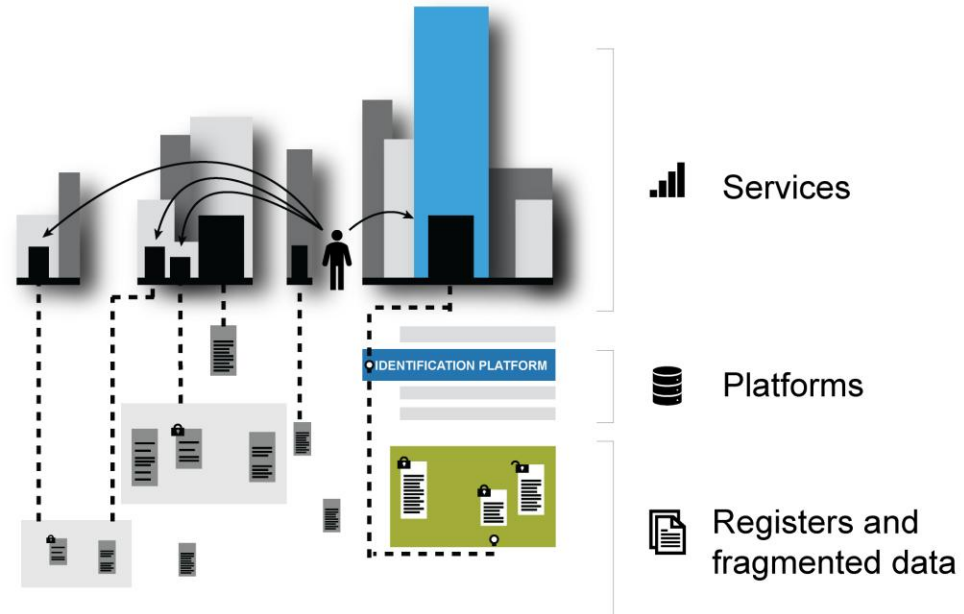
nearly **30%**

of DIGISER cities apply solutions developed by other public authorities

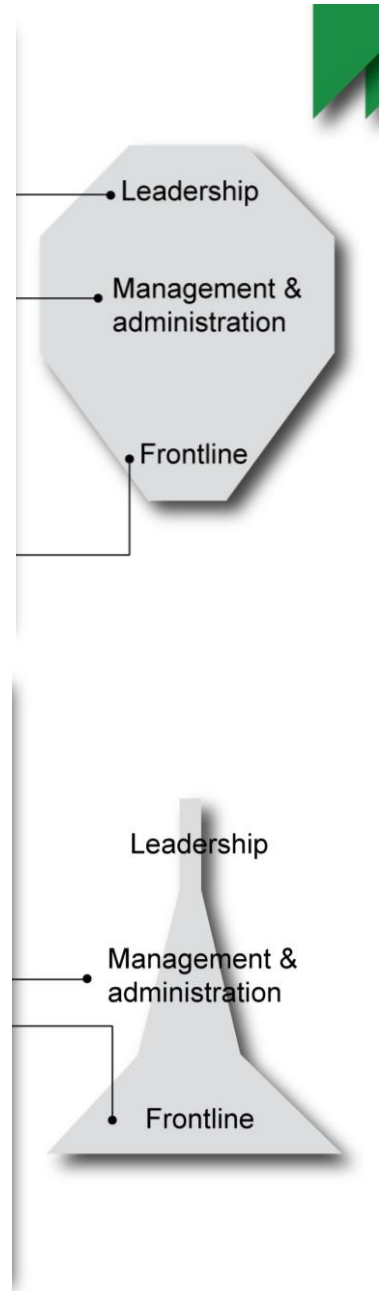
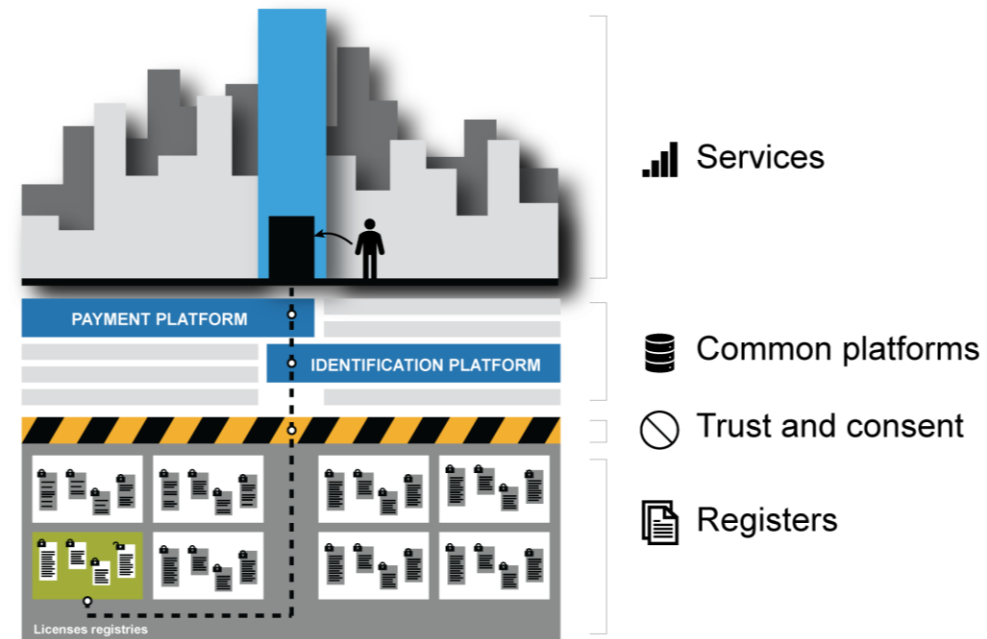
Grand challenges:

- Scaling
- Structure
- Processes
- Capacity

SILOED GOVERNMENT



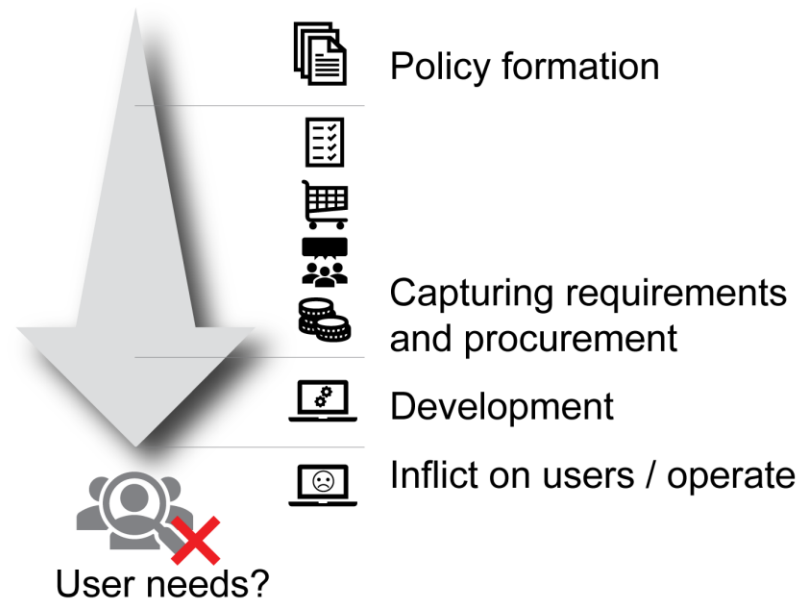
HOLISTIC GOVERNMENT AS A PLATFORM



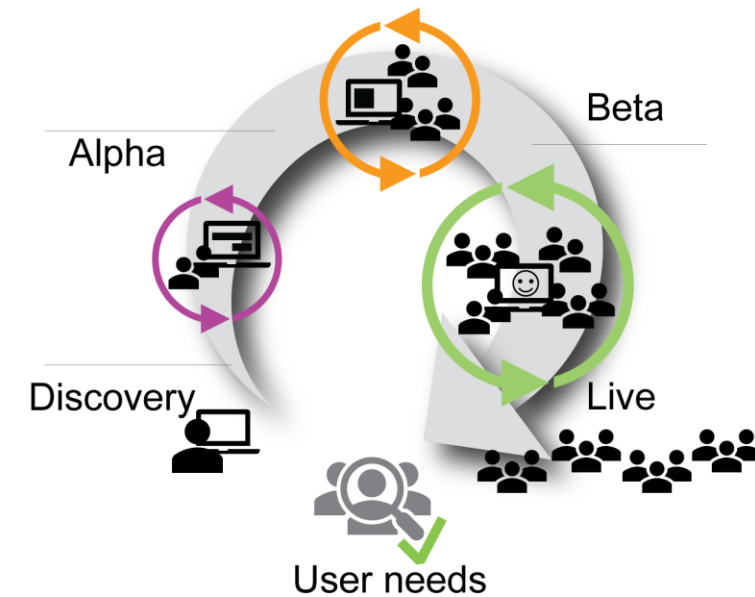
Grand challenges:

- Scaling
- Structure
- Processes
- Capacity

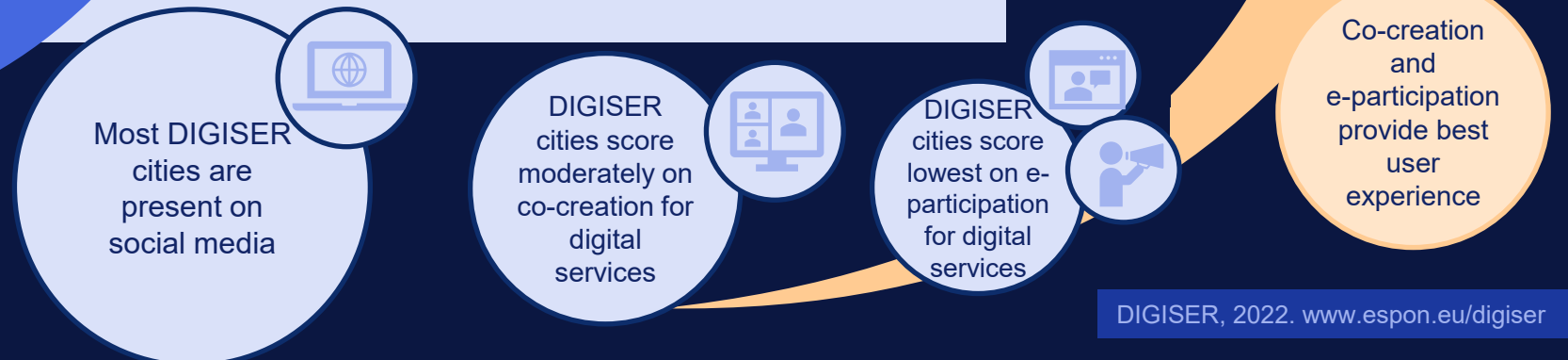
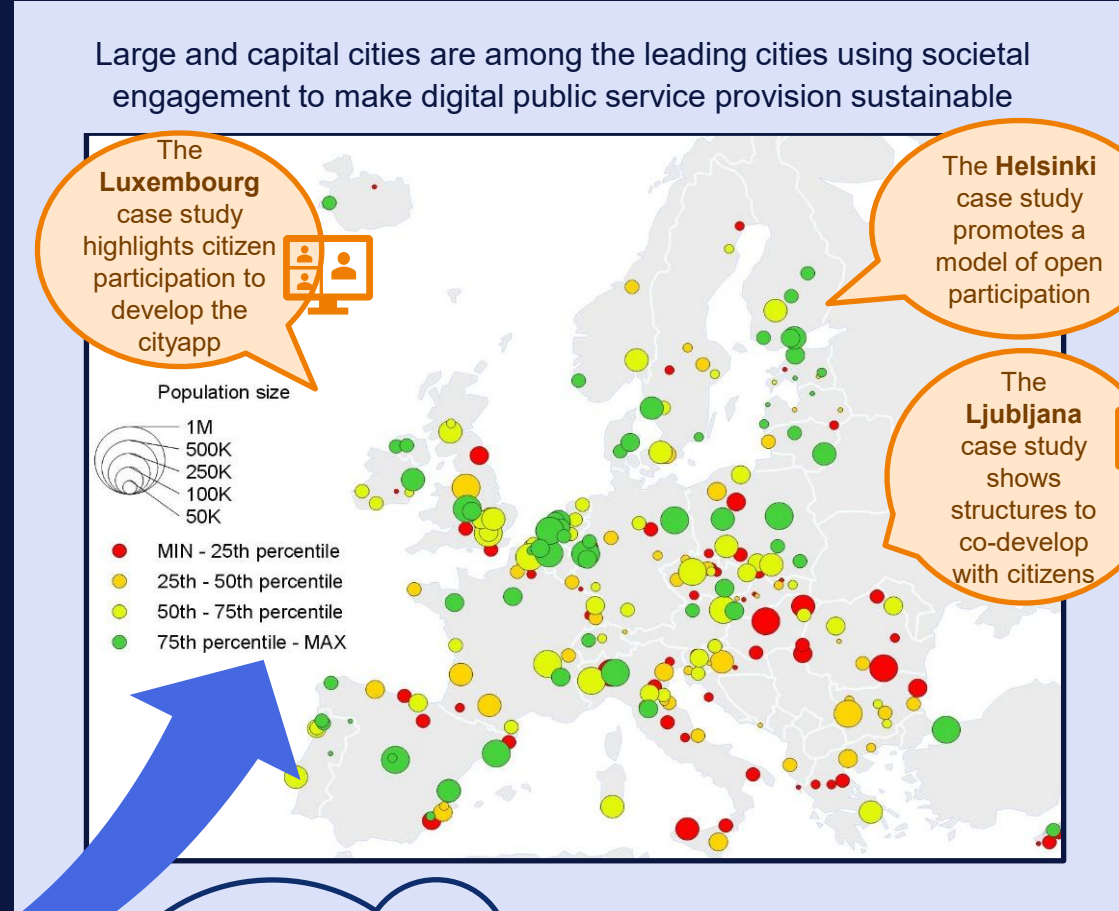
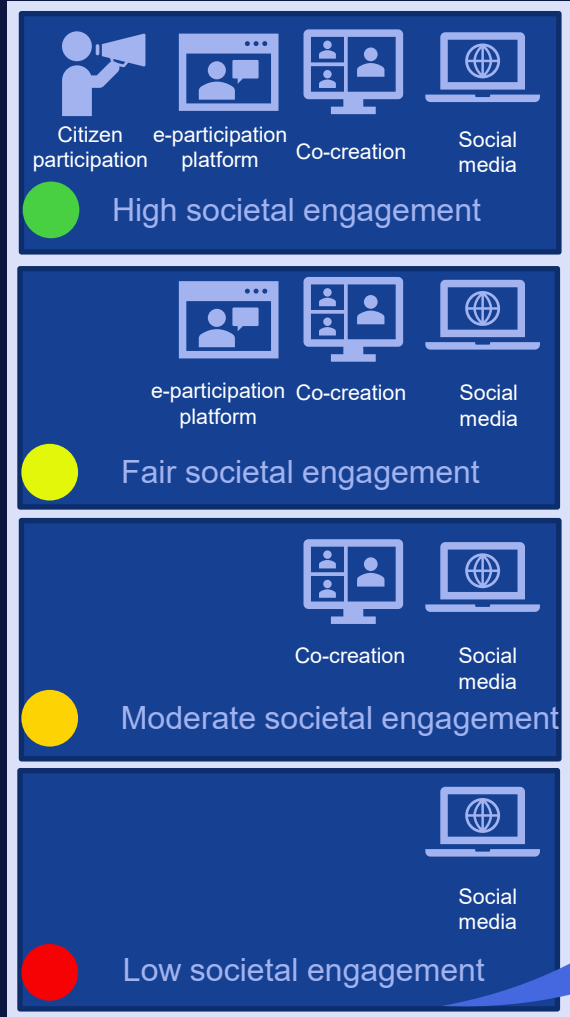
DIGITISING PUBLIC SERVICES



CO-CREATING USER-CENTRIC PUBLIC SERVICES



Improving societal engagement for digital public services



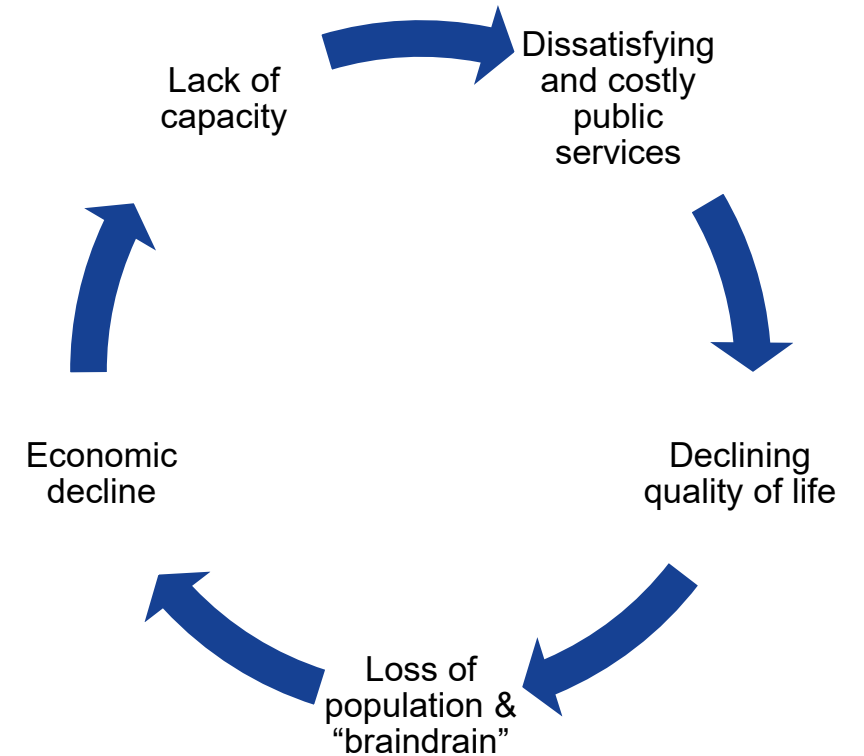
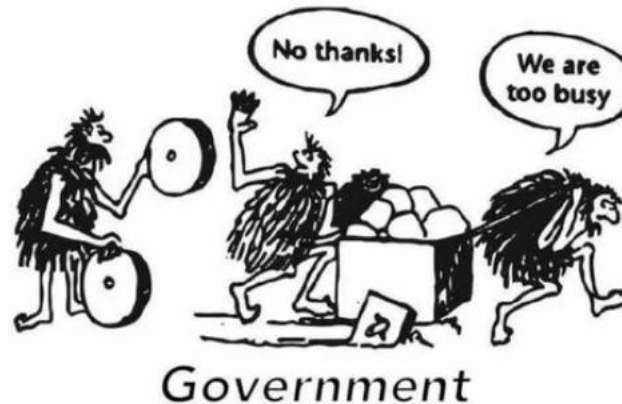
Grand challenges:

- Scaling
- Structure
- Processes
- Capacity

Especially problematic for lagging regions/localities.

We do not have the necessary data/evidence to direct investments (DESI, Digital Decade).

Some governments resilient to change, most do not know how.



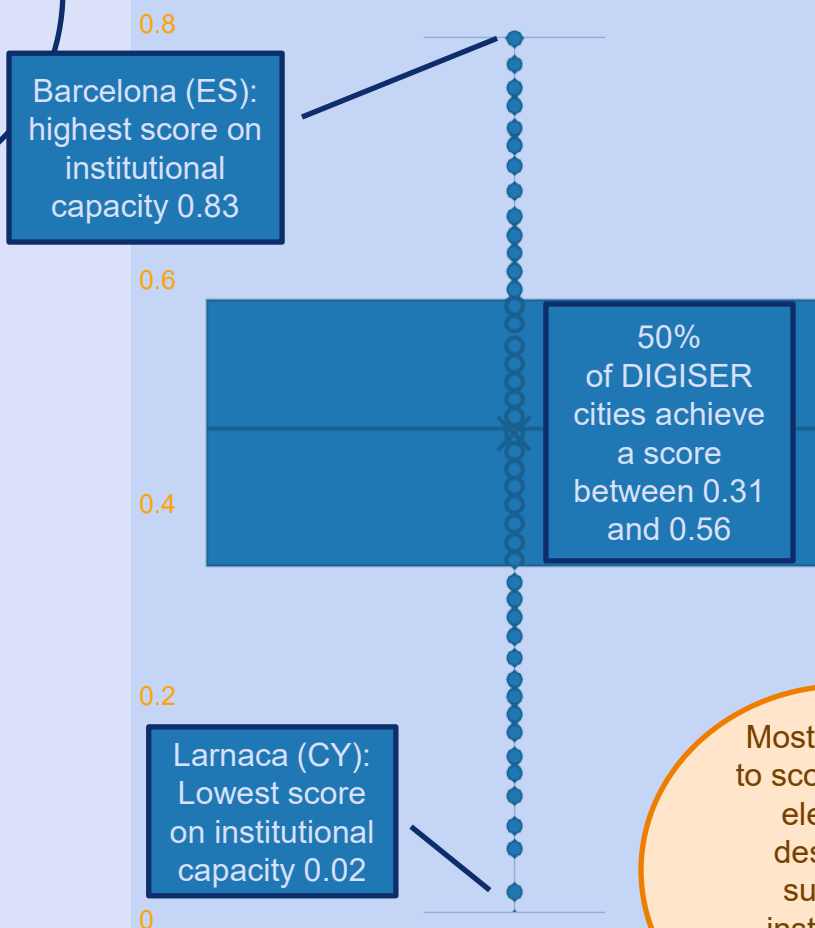
Vicious spiral of the digital divide for lagging regions/cities and rural areas

Improving institutional capacities for digital public services

41%

of DIGISER survey respondents indicated limited institutional capacities. As such, it is the most frequently indicated obstacle to digital public services

Score of institutional capacity among DIGISER cities



40%

of public authorities do not provide employees with advanced ICT training

Institutional capacity

30%

of public authorities experimented with AI and IoT systems

+65%

of cities with >500k residents approved & published their digital innovation strategies. This is the case for 50% of smaller cities (50k - 100k residents)

Most cities fail to score well on elements describing sufficient institutional capacities (more than 0.5)

Improving institutional capacities

Workshops



To proactively demonstrate digital innovation benefits

Reward and encourage employees



Use incentives to reward experimenting with digital solutions and promote relevant organisational culture

3

Need for better data and monitoring

ESPON LORDIMAS

What to monitor?

Processes or outcomes?

Your digital
maturity assessment



LORDIMAS in one sentence

'An interactive tool helping local and regional governments to understand where they are in their digital transformation journey'

What is LORDIMAS?



Evaluate

A digital maturity tool

Governance, Service
Data management,
Interoperability, Technology,
Service delivery and
Networking



Compare

An interactive dashboard

Presenting your data in
real-time and allowing
you to compare it with
other regions and cities
in Europe



Share

Repository of good practices

Sharing your successes
and challenges to
promote the European
way
for digital transformation



Learn

Policy recommendations

Bringing awareness
about emerging topics
at the EU level and to
give policy advice

Analyse and visualise

Analyse and visualise

Data management

About this dashboard

This module assesses how data is digitally stored, collected, and organised within the public administration, made accessible across service sectors and connected devices, and exploited for decision making and business purposes or service delivery. In addition, it evaluates how public administrations are informing their citizens and businesses about the collection, use and sharing of their personal data.

Search and filter

Filter by year

No category selected

Filter by country

No category selected

Filter by type

No category selected

Filter by population size

No category selected

Filter by maturity

No category selected

Search by name

The Digital Maturity Assessment is calculated for the selection you see on the Map. You can select one or multiple public authorities using the Map or Search and Filter section.

Maturity Assessment

Digitally native
Very high levels of digital transition

Digitally optimised
High levels of digital transition

Digitally purposeful
Moderate levels of digital transition

Digitally emerging
Low levels of digital transition

Digitally reactive
Very low levels of digital transition

Digitally nascent
Lacking digital transition

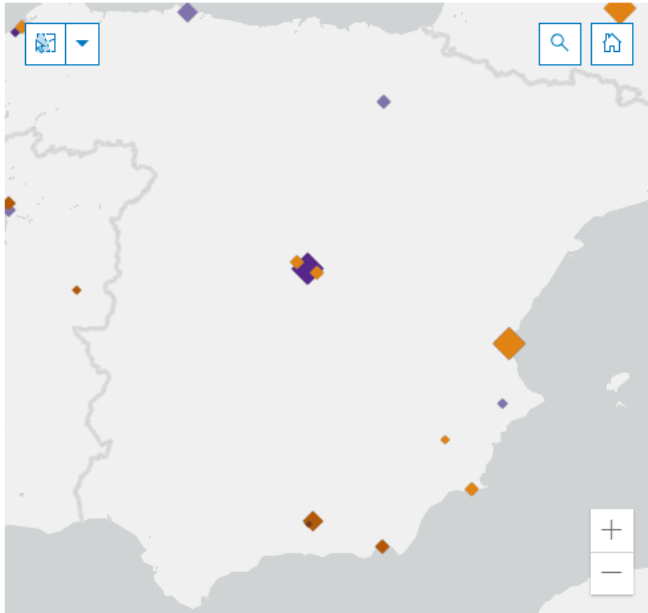
Population size

 > 5 000 000

 < 5 000

Maturity level: Digitally emerging

Maturity score: 44.3/100



Powered by Esri

Indicator scoring

Data strategy	10
Data catalogue	10
Data platform	70
B2G/G2B data sharing	40
Sensor registry	60
AI registry	20
Personal data	30
Digital twin	10

Maturity Assessment

Digitally native
Very high levels of digital transition

Digitally optimised
High levels of digital transition

Digitally purposeful
Moderate levels of digital transition

Digitally emerging
Low levels of digital transition

Digitally reactive
Very low levels of digital transition

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Lacking digital transition

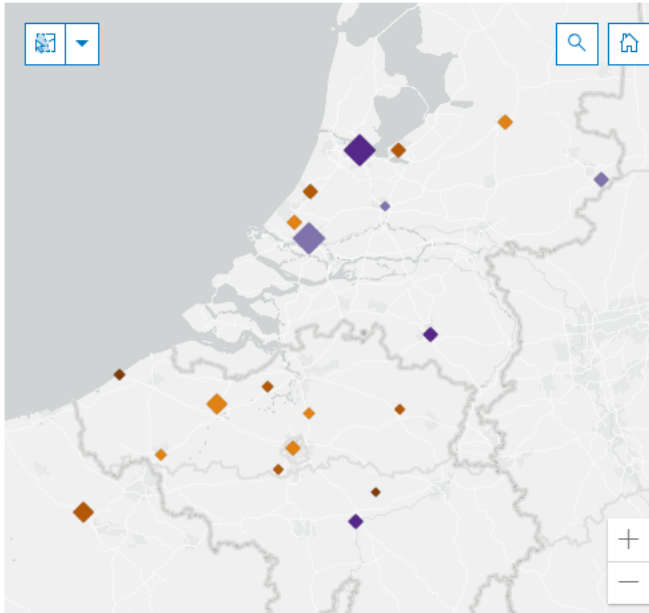
Population size

 > 5 000 000

 < 5 000

Maturity level: Digitally emerging

Maturity score: 37.7/100



Powered by Esri

Indicator scoring

Data strategy	10
Data catalogue	10
Data platform	40
B2G/G2B data sharing	30
Sensor registry	30
AI registry	20
Personal data	30
Digital twin	30

Benchmark

Policy recommendations

Best practices

Is your region, city, community already part of LORDIMAS?

3.1. Does your public administration:

	not at all	under consideration	under development or adoption	in operation in one or few service sectors	in operation in several or most service sectors
[3.1.1.] have a data strategy that coordinates the management, sharing, interoperability, and (re)use of data?*	☐	☐	☐	☐	☐
[3.1.2.] have data catalogue, that catalogues the key data in the public administration.* ► Details	☐	☐	☐	☐	☐
[3.1.3.] have an open data platform that enables data sharing and development of data related services?*	☐	☐	☐	☐	☐

<https://lordimas.espon.eu>