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# Stakeholder engagement level modellisation with pLAtYpus

20th of October, 2021, 09.55 CET  
Omar Usmani, Carlos Montalvo  
Closing event in Bologna

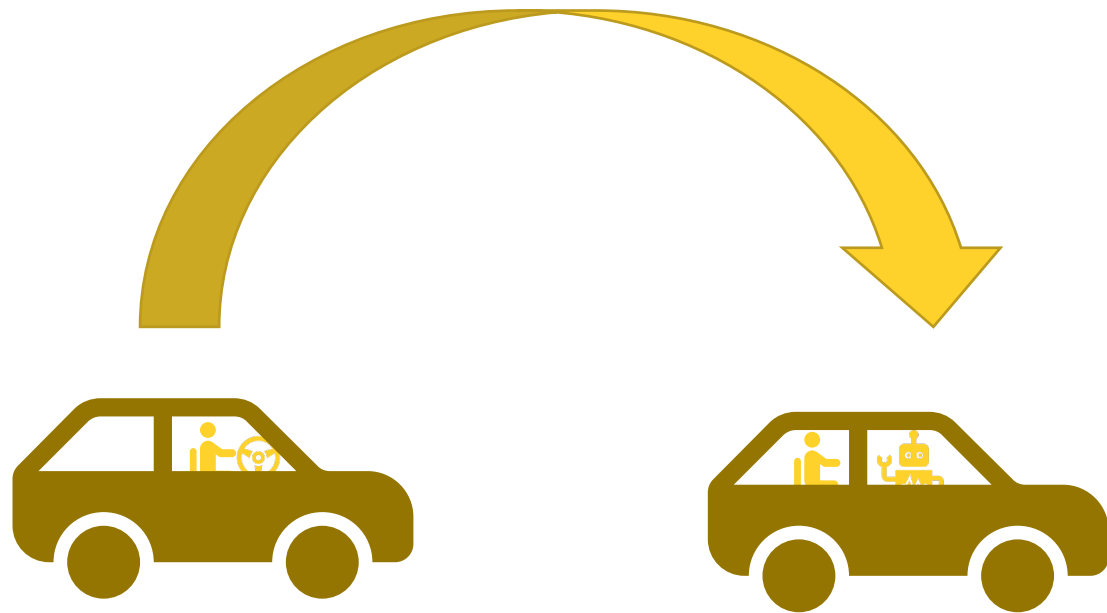
**TNO** innovation  
for life

We want to compute engagement levels from change rates

## Change rates

## Engagement levels

Adopt rate



Leave rate



Citizens



Business



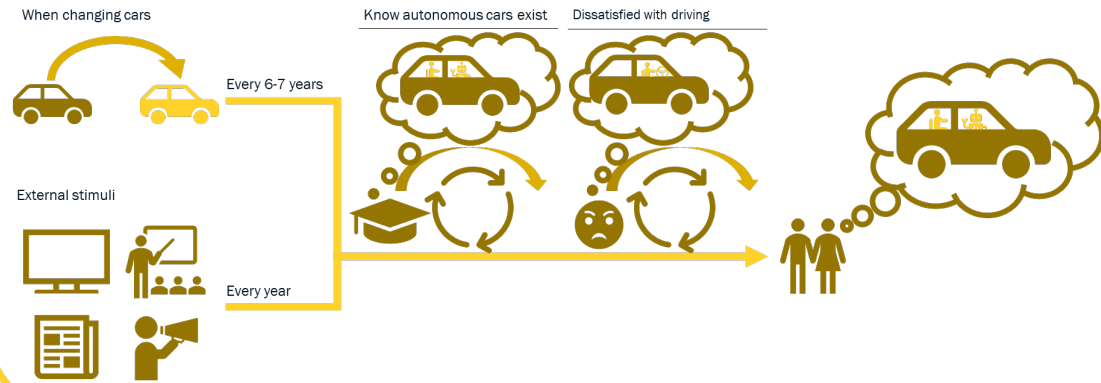
Government



# Complication: Change rates require lots of information/data

## Getting attention

Triggering attention    Overcoming routine    Get consideration



## Benefits and drawbacks

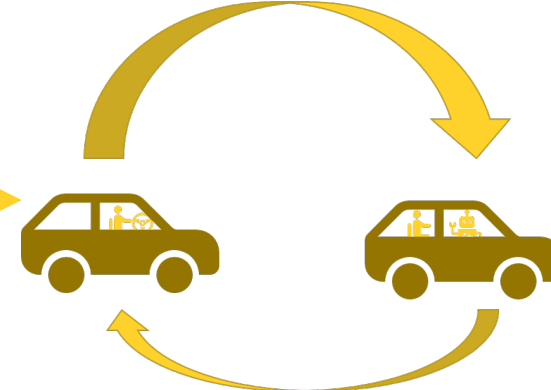


## Obstacles

Insufficient knowledge    Can they go everywhere?

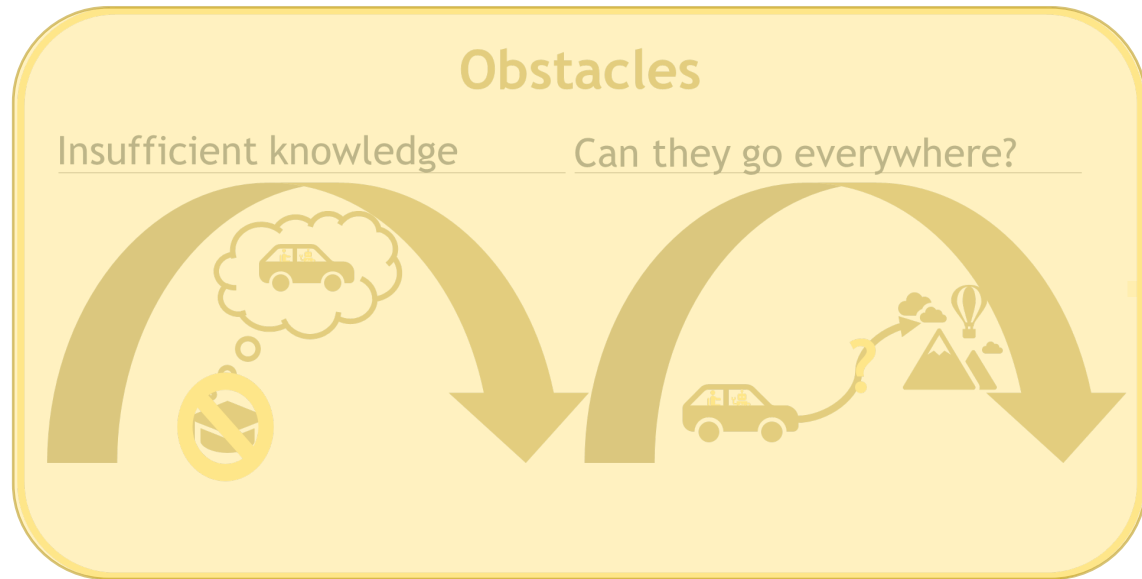
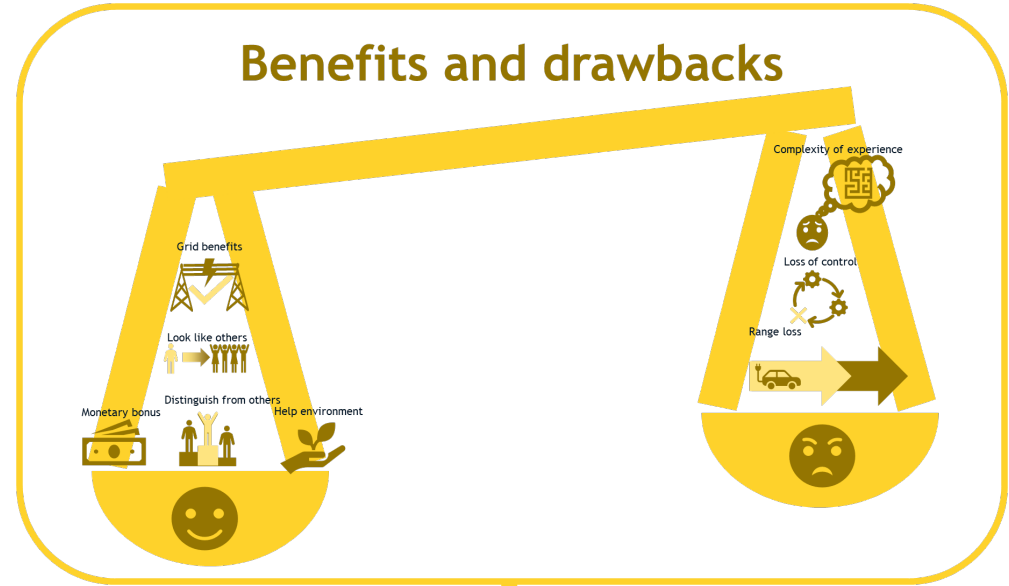
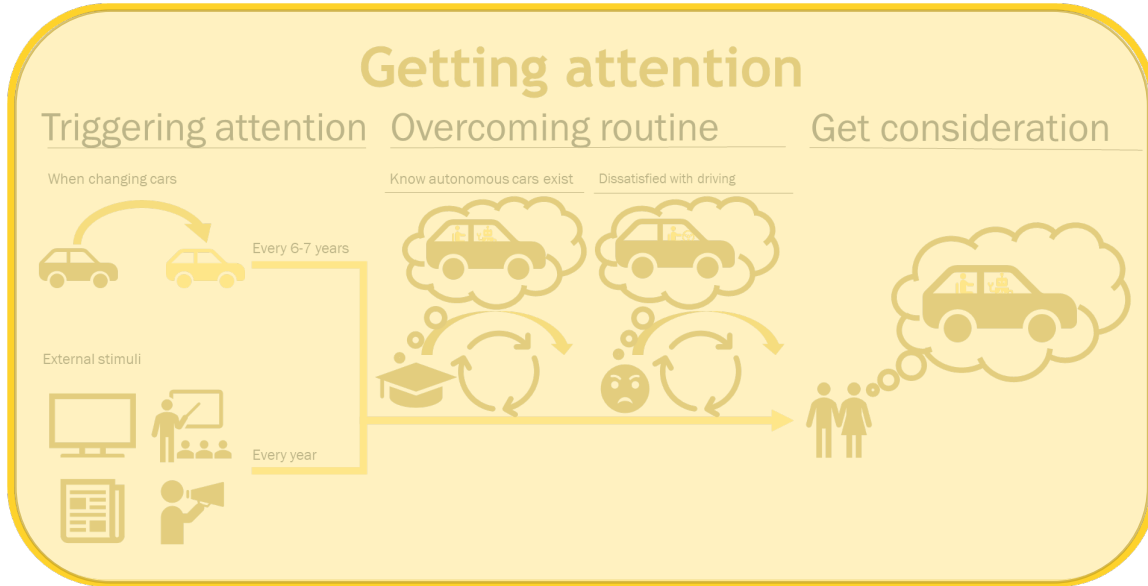


Adopt rate

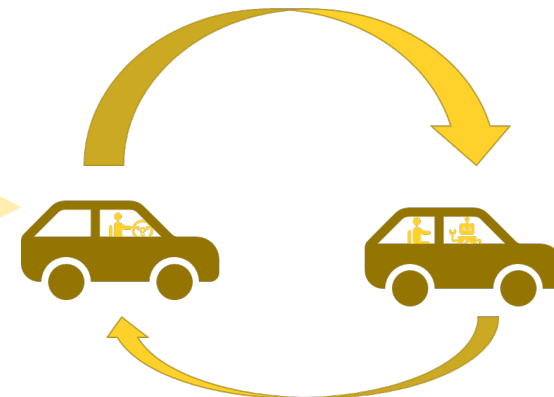


Leave rate

# Due to limited available data, focus on benefits/drawbacks



Adopt rate



Leave rate

# The survey analysis provides us with the data we need

## Survey



### Category groupings

- Environmental outcomes
  - Emotion
- Relational model match
  - Personal benefits
  - Agency to engage
  - Social norm

### Importance/weight

- Linear regression analysis
  - For each stakeholder
  - At European level, due to lack of data
  - Give relative importance of each grouping

## Benefits and drawbacks



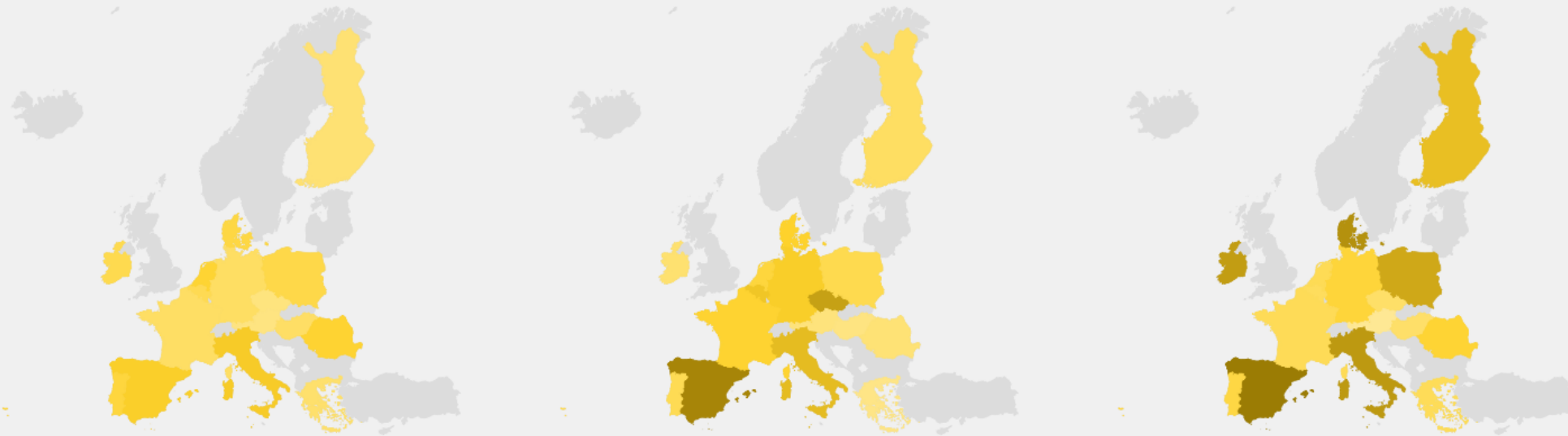
# We can show stakeholder engagement levels across countries

Long-term average engagement for autonomous cars

citizens

business

government



30%

40%

50%

60%

70%

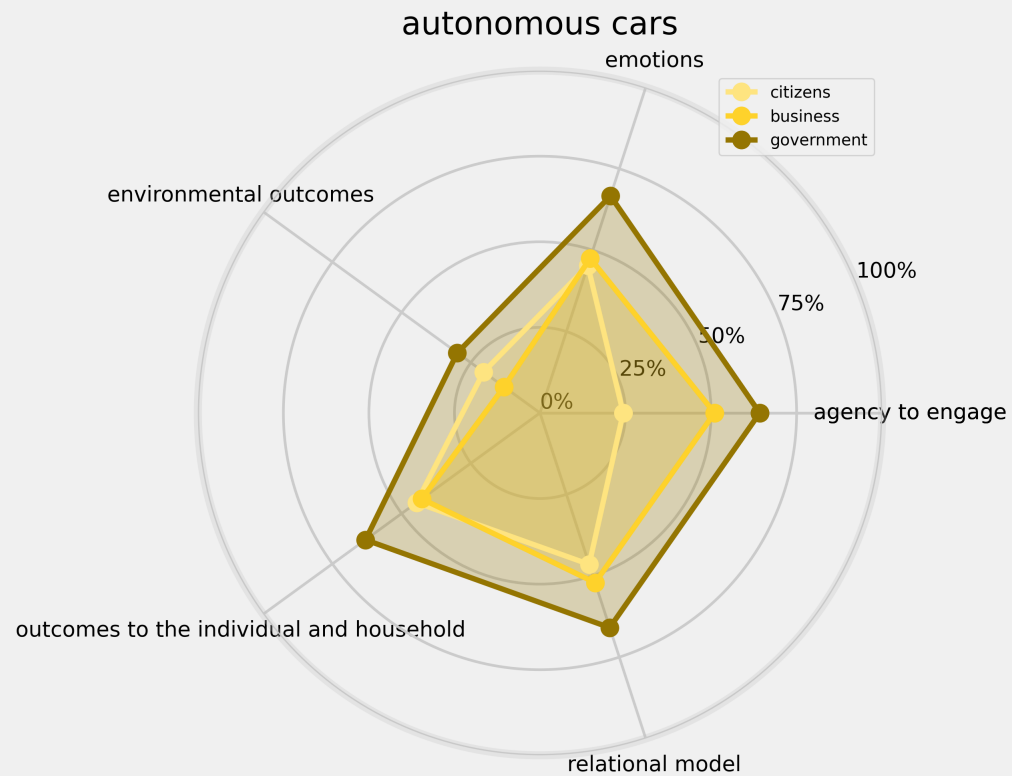
80%

Engagement level

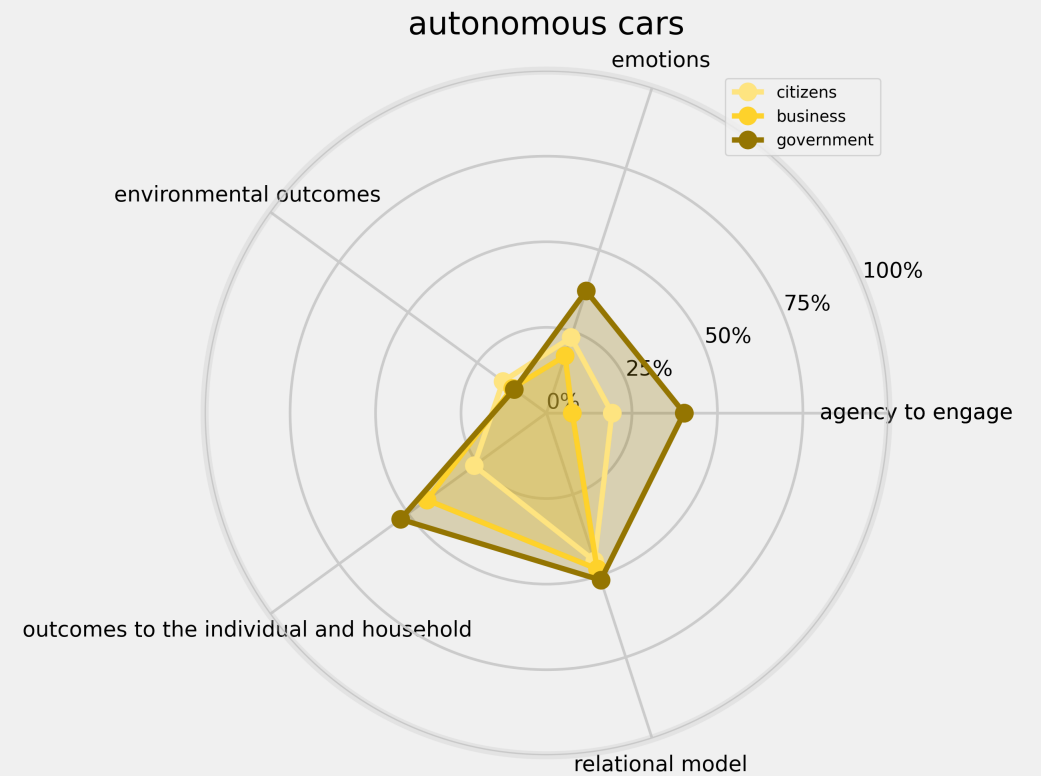
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# We can trace back differences to survey scores

Survey scores for Adopt in Spain



Survey scores for Adopt in Finland



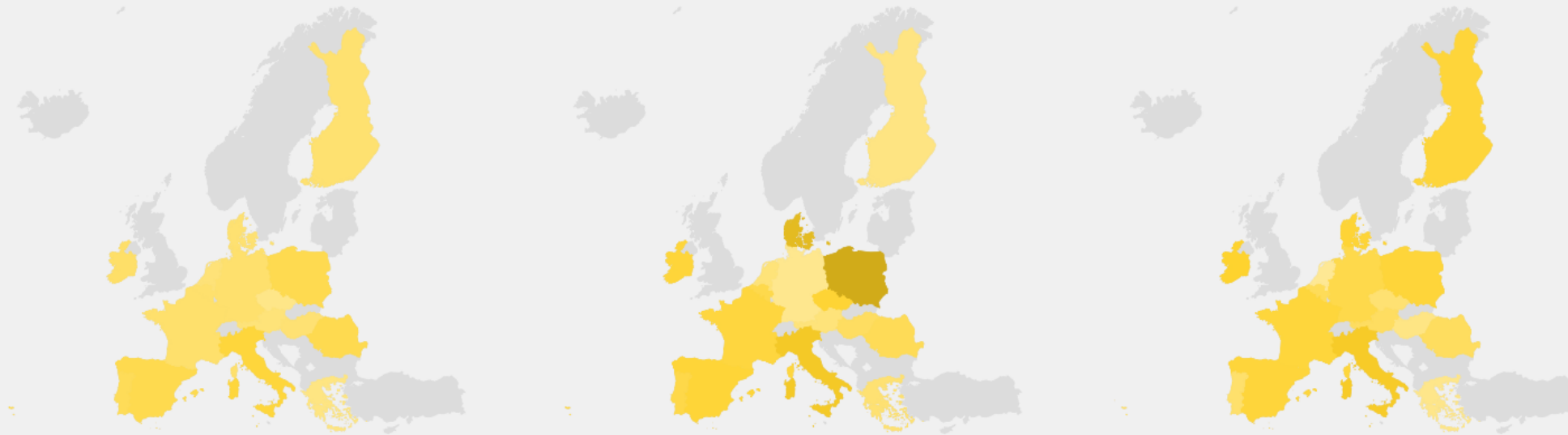
# We can show stakeholder engagement levels across countries

Long-term average engagement for cooperative self generation

citizens

business

government



40%

50%

60%

70%

80%

90%

Engagement level

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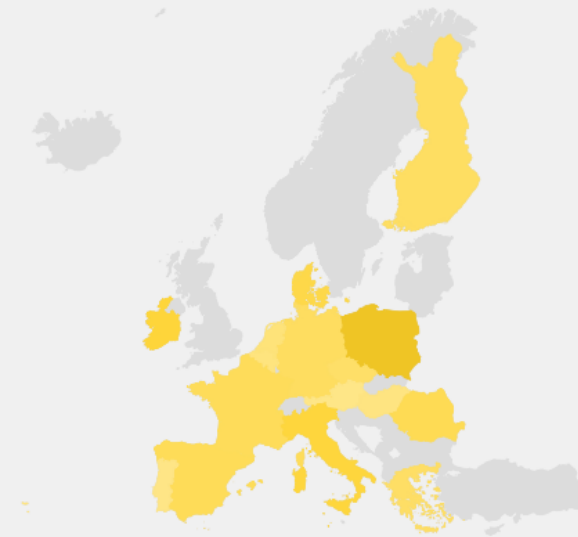
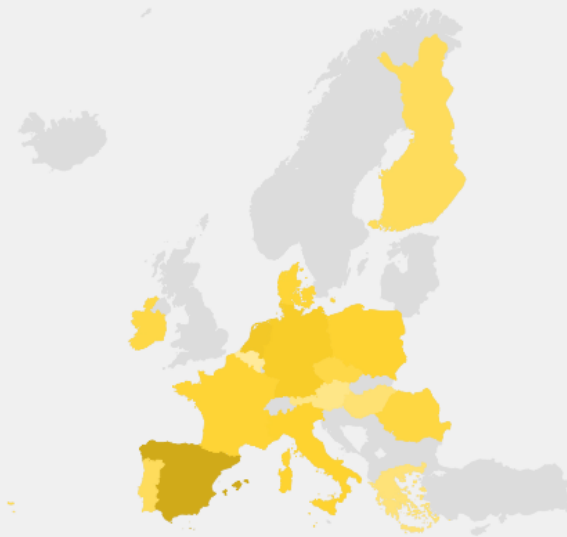
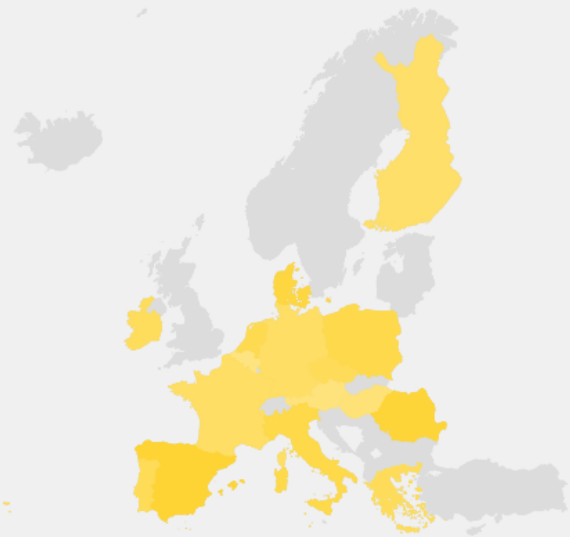
# We can show stakeholder engagement levels across countries

Long-term average engagement for sustainable transport

citizens

business

government



40%

50%

60%

70%

80%

90%

Engagement level

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MEMBER OF BASQUE RESEARCH  
& TECHNOLOGY ALLIANCE



# Thank you!

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<https://github.com/TNO/pLAtYpus>

[https://pypi.org/project/pLAtYpus\\_TNO/](https://pypi.org/project/pLAtYpus_TNO/)

