### **SMARTICIPATE - OPENING UP THE SMART CITY**

### - HAMBURG'S APPROACH FOR PARTICIPATION -



smart open data services and impact assessment for open governance

Joachim Rix

Spatial Information Management Fraunhofer-Institut für Graphische Datenverarbeitung IGD

Nicole Schubbe

State Agency for Geoinformation and Surveying, City of Hamburg





# Project

## Partner



## **Objectives**

- Enable interaction
- Improve the information flow
- Impact assessment
- Piloting

EU-Horizon 2020 INSO Febr. 2016 to Jan. 2019





















Visit us on: www.smarticipate.eu



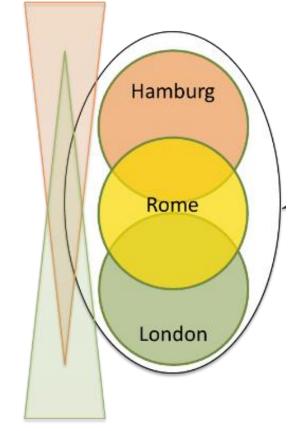


# Project's impact/results

- Stimulating the creation, delivery and use of new services on a variety of devices, utilising new web technologies, coupled with open public data.
- More personalised public services that better suit the needs of users.
- Reducing the administrative burden of citizens and businesses (e.g. collecting information from citizens only once).
- Increased transparency of and trust in public administrations.



#### Pure Top-Down



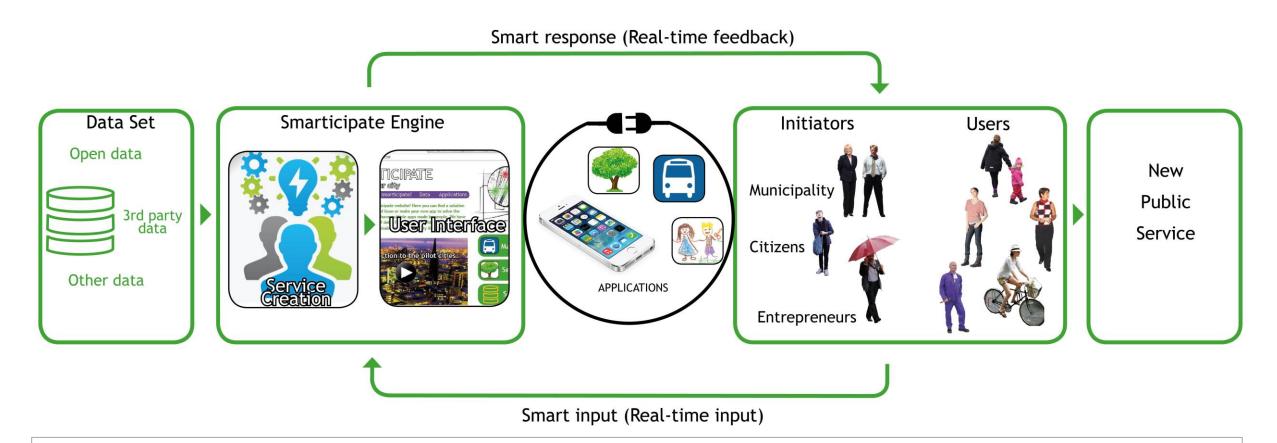
Pure Bottom-Up





## smarticipate's added value/innovation (1)





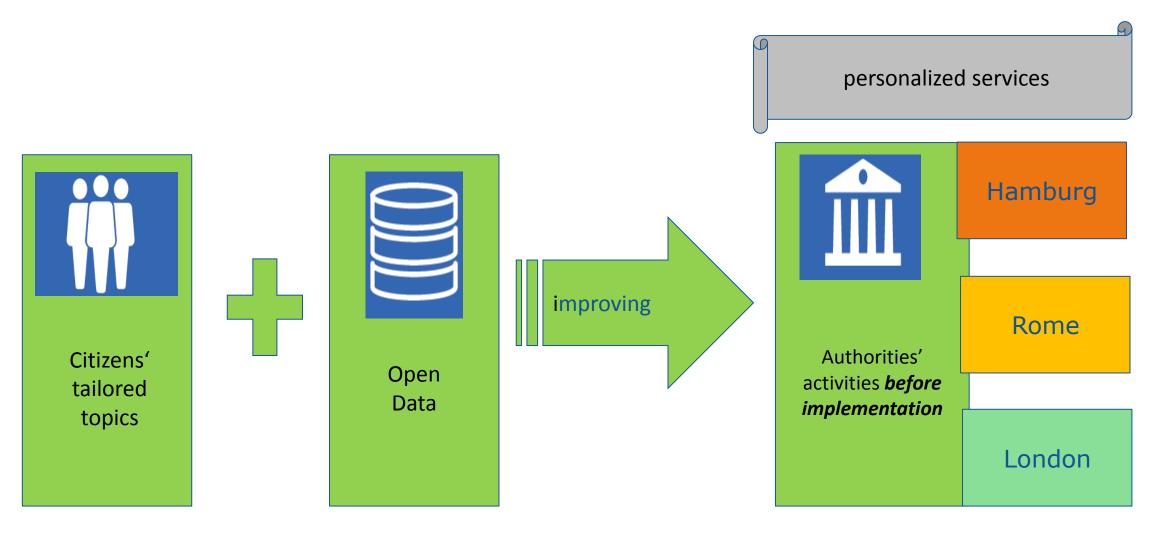
Interdisciplinarity Iterative process Extensive piloting Developments for openness





# SMARTICIPATE'S ADDED VALUE/INNOVATION (2)





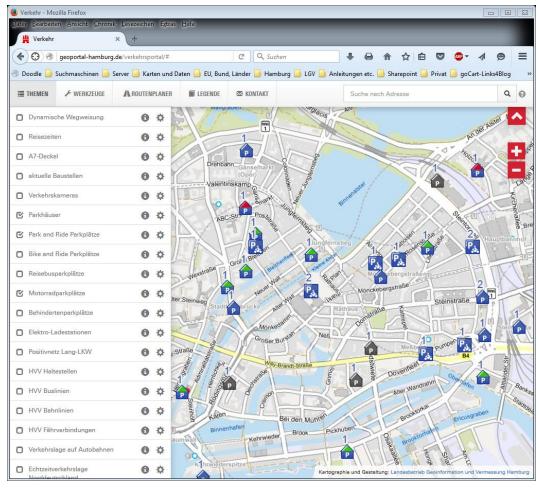




### Master-Portal

smarricipate

- Basis for all Geo Applications
- Web client based on open source frameworks
- standard interfaces (WMS, WFS, CSW, WPS)
- modular
- transactional
- responsive Design (desktop, mobile etc.)
- MIT License
- git: <a href="https://bitbucket.org/lgv-g12/lgv">https://bitbucket.org/lgv-g12/lgv</a>
- → available within the project



**Example: Traffic Portal** 

http://geoportal-hamburg.de/verkehrsportal/





### **Transparency Portal**

SMARTICIPATE

administration

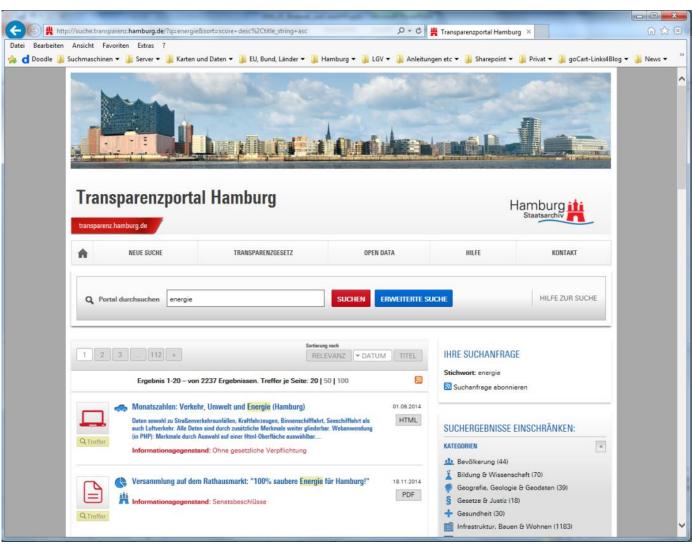
business

= Open Data Portal

Transparency law since 2012

→ i.e.:publication of geodata(raw data, pdf, maps)

http://transparenz.hamburg.de/







# Participation Tool - Informations

# Participation-Sites in Hamburg until 2014:

- Developed by thirdparty agencies
- Different ranges of Features
- Different look-and-feel
- Different focus
- → Different Quality!

### 2014:

Stadtwerkstatt addresses
 LGV to develop Concept for
 Participation Module



PROJEKTINFOS BEITRÄGE VERANSTALTUNGEN UMFRAGE FAQ LOGIN

### Ohlsdorf 2050 - jetzt mitgestalten!

Verändern heißt bewahren: unter diesem Motto soll die Zukunft des größten Parkfriedhofs der Welt langfristig gesichert werden. Wir möchten von Ihnen wissen: wenn künftig weniger Fläche für Grabstätten benötigt wird, wofür könnte der Park genutzt werden? Welche Ideen haben Sie?



Wie kann die Zukunft des Friedhof Ohlsdorf vor dem Hintergrund rückläufiger Belegungszahlen langfristig gesichert werden? Welche Chancen ergeben sich durch eine neue Nutzung von Teilen der Grünfläche? Im Rahmen des Beteiligungsverfahrens sollen



Titel	Zeit
Führung über den Parkfriedhof zum	Sonntag, 24.
Projekt Ohlsdorf 2050	April 2016 -
	10:00 bis 11:30
Führung über den Parkfriedhof zum	Dienstag, 26.
Projekt Ohlsdorf 2050	April 2016 -
	15:00 bis 16:30
Auftakt: Impulsabend	Freitag, 29. April
	2016 -
	17:30 bis 20:00
Entwurfswerkstatt I	Samstag, 30.
	April 2016 -
	9:30 bis 13:15
1 2 nächst	e Seite )

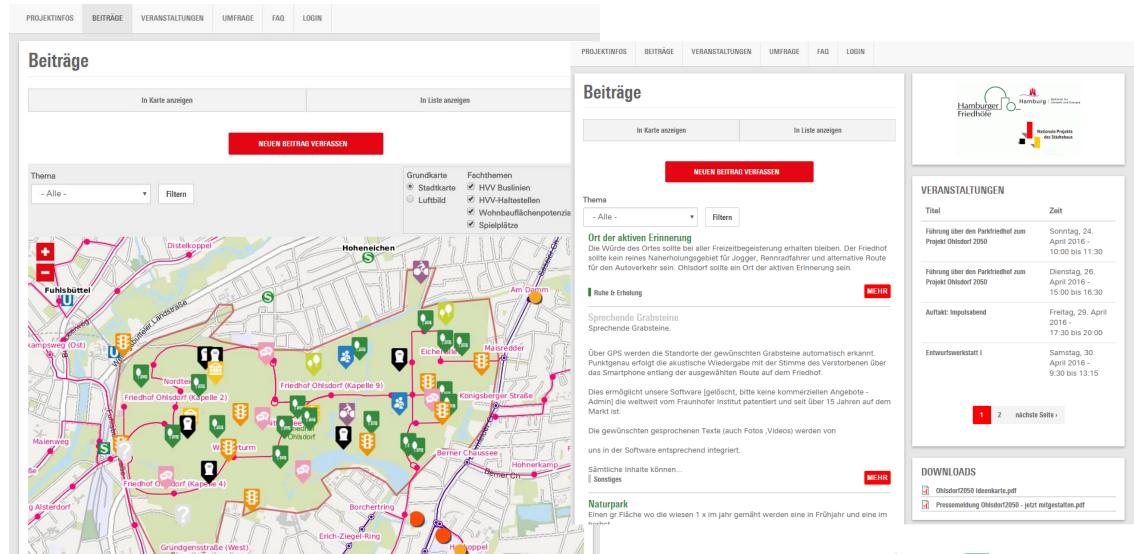




## Participation Tool - Contributions

straße (City Nord)





Gustav-Seitz-Weg Kartographie und Gestaltung: Landesbetrieb Geoinformation und Vermessung





## Smarticipate – Hamburg use case

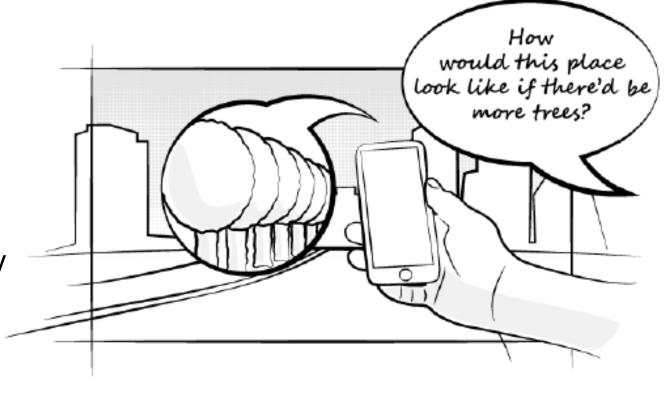


### **Expectations**

- Equal access to shared (open) data
  - → better participation processes between citizen and government
  - → public city cloud
- Enhancement of technology
- Interoperability with existing technology

### Scenario

- Location study and Environmental conditions
  - Potential plant location for new trees







## Potential plant location for new trees



- Impact on solar potential
- current tree population
- Impact on carbon footprint (CO<sub>2</sub>-O<sub>2</sub> balance)
- Financial costs
- Ranking of different potential locations

solar potential

current tree population









## Environmental conditions – shadowing

- Impact of new trees in terms of shadowing
- Simulation
  - of the tree growth or
  - shadow direction during the day
- → 3D City model and interactive analysis







## Vision for the future



- Improve the city's information flow by making open data usable
  - for the **public** and for business development
    - → tools for interactions between the different sectoral responsibilities at the local level, thereby contributing towards an integrated and cross-sectorial approach in urban planning
- Increase transparency of urban governance through ICT assisted impact assessment
- The smarticipate platform
   can be used as basic component by SMEs
   to develop new open data based solutions



