

## **Identity Management** Impulse in PUbLic SErvices

## IMPULSE: Transforming public services in Europe with eID

Lessons learnt and next steps for digitalizing eGovernments

21st September 2023



### General information

Fact sheet	
Programme	Horizon 2020
Grant Agreement ID	101004459
Topic	DT-TRANSFORMATIONS-02-2018-2019-2020 - Transformative impact of disruptive technologies in public services
Funding scheme	Research and Innovation Action (RIA)
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Website	https://www.impulse-h2020.eu/   https://cordis.europa.eu/project/id/101004459
Social media	@Impulse EU in IMPULSE project H2020







### Who we are



15 PARTNERS





































6 EXTERNAL EXPERTS

8 CONNECTED DIHs







Transform the approach on digital identity by drawing up a user-centric multi-stage method of multidisciplinary evaluation of eID management in providing public services



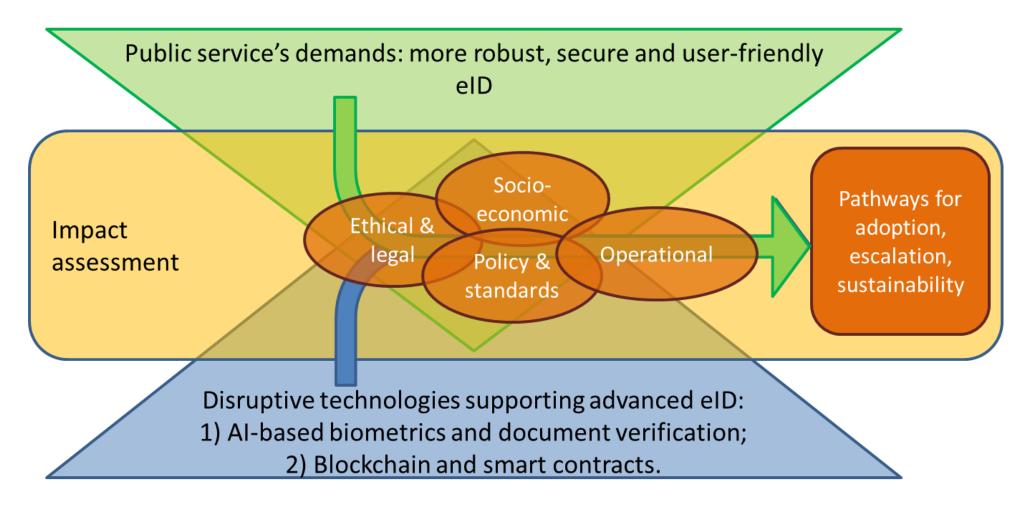
Evaluate the benefits, but also risks, costs and limitations, considering socio-economic, legal, ethical and operational impacts, together with framework conditions (GDPR and eIDAS regulations, and existing legacy eID national systems and standards)



Bring together a set of representative and innovative processes as case studies in 5 countries providing a variety of contexts (cultural, operational, legal, procedural, social)











### **OPPORTUNITY TO USE DISRUPTIVE TECHNOLOGIES**

### **Artificial Intelligence**

Biometrics authentication

Document verification

Digital onboarding



### **Blockchain**

Distributed ledger

Data ownership from government to citizens

**Smart contracts** 









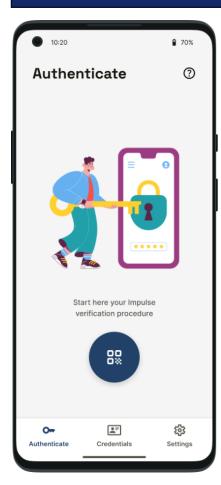
Research will result on specific and actionable outcomes in a twofold form:

- A framework for a holistic integration of Al and blockchain technology to support secure and privacy-preserving eID management by public services, having been deployed and valuated in different public services (and countries) to complement existing EU identity schemas.
- 2. Actionable roadmaps for the adoption, escalation and sustainability of advanced eID technology by public services in the European ecosystem, in different countries and at different levels (local, regional, national, and cross-border) and supported by Digital Innovation Hubs (DIHs) all around Europe.

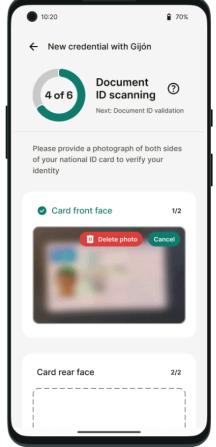


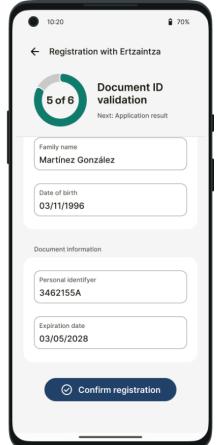
### Main outcomes

#### **IMPULSE Framework**









**EBSI** 

**ESSIF** 

**GDPR** 

elDAS

CTN71/SC307

CEN/TC224



### Main outcomes

### IMPULSE actionable roadmaps



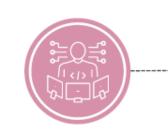
Technologies used

IMPULSE app

Pilot case:

Learning and recommendations

To go further



#### PILOT EXPERIMENTATION

What important point has the pilot experiment highlighted?

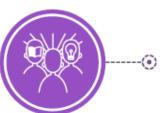
Learnings and Recommendations on user acceptance, accessibility and usability as well as the impact of disruptive technologies to both eID public governance and public engagement from the pilot case experimentation.



#### PROJECT RESEARCH

#### What are the results of the research carried out?

Learnings and Recommendations on standards, ethical, legal, economic, social and privacy issues arising from the IMPULSE method for the implementation of disruptive technologies in the field of eID management for public services, and potential extension to other fields.



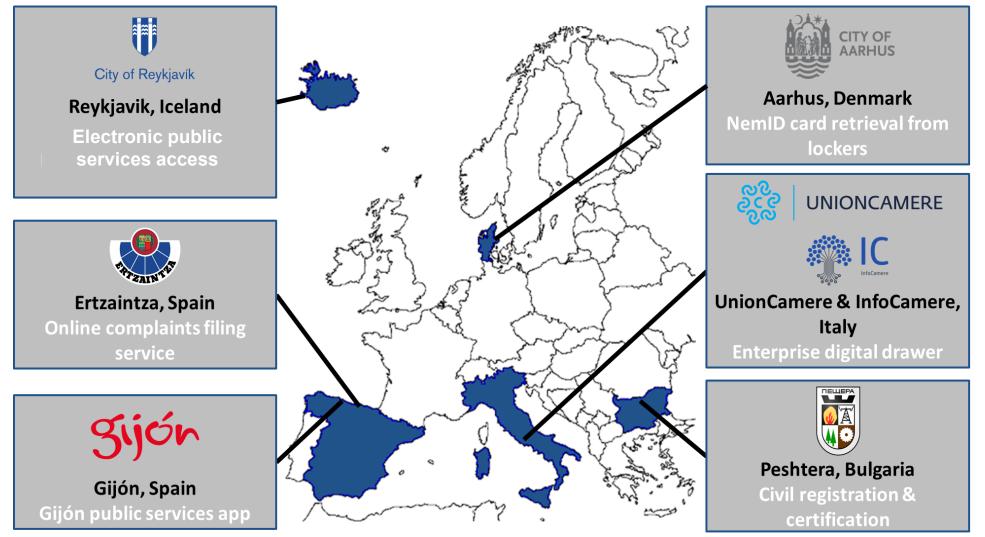
#### **EXTERNAL EXPERTS & PANEL**

#### What did our experts and panels have to say?

Learnings and Recommendations on the implementation of eID technologies in public services from municipal administration, data protection authorities, public-sector workers' organisations, frontline civil servants, users/citizens and other service providers, as well as Govtech.

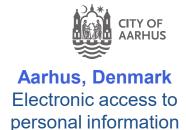
# Impulse

### Case studies and pilots









and services

- Many found IMPULSE to be as good or slightly better than MitID
  - There is potential in IMPULSE to be better than MitID
- Most people prefer IMPULSE being developed by smaller companies and public entities instead of large corporations
- Some would be willing to pay a monthly fee for using IMPULSE if it was used for more services (and replace MitID) but mostly people would go with the cheapest option
- Having IMPULSE be installed to the cabinet with an embedded camera would be more beneficial than having a separate phone app (as not everyone may have a phone)







- Likely to use impulse instead
- Positive towards IMPULSE
- Doubts about the security aspects
- The use of facial recognition with some simplicity and ease of registration has been considered important.
- The ease, simplicity, speed, saving of keys, PIN or other type of identification method, have been highly valued and appreciated elements.
- Not all participants would be willing to pay for this type of application as other national options are free.





- All like eID and prefer to use it
  - Most prefer online services but some would rather have them in physical form
- Quite positive towards IMPULSE
  - Likely to use impulse instead of Gijon citizen card
  - There are benefits but not necessarily clear advantages over Gijon App
  - Would recommend to others
  - Popularity of IMPULSE affects their willingness to use
- Public services app

   Negative or to be improved
  - Some help needed as IMPULSE were moderately cumbersome
  - Company offering IMPULSE should not be a large corporation
  - A default identity could be used to quickly log in and make usage simpler and faster
  - Inputting a lot of information manually can lead to some security concerns.
  - There's also too much interaction with the app, and it requests consent many times.





### Municipality of Pesthera, Bulgaria



- All are positive about eID and extremely positive towards IMPULSE
- All prefer online services because they are easier
- IMPULSE is easier and better than the current method of identification, would rather use IMPULSE
- Worried about hackers and stolen phones
- In the second round of pilot, citizens were doing the process alone and remotely, and the manual verification process was taking some time creating some discomfort among citizens.
- All users reported that the process was quite smooth and userfriendly. Some bugs still to improve



### UnionCamera, InfoCamera

- All prefer online services instead of physical
  - Most read Terms of Service and know how data is being shared
- Mostly positive towards IMPULSE but there are some concerns
  - Company offering the service needs to have a good reputation or no reputation (Large companies like Microsoft and Apple are not trusted)
  - Would like to know where facial information is stored.
  - Why the onboarding process needs to be done on each user devices.
  - Asked how the system works with older ID documents.
  - Concerns were raised about the data encryption policy during onboarding for increased security.
- Respondents were split between SPID and IMPULSE
  - Both were equally good
  - No added value with IMPULSE so no reason to change



Unioncamere & InfoCamere, Italy
Enterprise digital drawer







Reykjavik, Iceland eID trial for public service access

- Many found IMPULSE cumbersome to use compared to the eID they are used to.
- People find the use of facial metrics very attractive but were not convinced that the IMPULSE app is a good example of that.
- Most people prefer a federated model, single onboarding for all your needs online.
- Noticeable concern about the legitimacy and security of new solutions and services compared with existing ones people already use and trust.
- Big lesson is just how hard it would be for smaller technology developers to break into an already saturated market and align with deeply entrenched governing practices.





### End-users' acceptance



Easy deployment & installation

Provider trust and Security Concerns

Not clear the additional benefits of an SSI eID model





**PARTICIPATION** 

**LEGAL** 

**ETHICS** 

**DEVELOPMENT** 

**SECURITY** 

**DEPLOYMENT** 

EU cross-border testing

Define Exploitation plan

**POLICY** 

**PRIVACY** 

Inclusion of additional credentials

**SOCIAL** 

**STANDARDS** 

Regulation and standards compliance

Promotion of the adoption of disruptive SSI eID



# Identity Management in PUbLic SErvices

### Coordination team:

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