Recommendation 7:
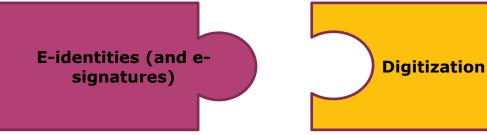
E-identities (and e-signatures)

Digitization

Using '*e-identities (and e-signatures)*' to meet the public sector need '*digitization*'

Status quo:

There are already many countries in the EU that have introduced e-identities, e.g. in Belgium, several Scandinavian countries, Italy, Germany, Spain, Croatia to mention just view.

These cards are used for different services within the public sector in the individual countries: for banks, for universities etc. In Estonia the ID card is even used for internet-based voting systems.

Recommended actions:

Technical challenges:
In general it can be observed that the main challenge regarding the use of e-identities is not a technical one.
Some persisting challenges include
- Interoperability challenges (multiple identity schemes applied on a per-sector/per-country basis – multitude of standards used and lack of a commonly accepted one).

Non-technical challenges:
- *Infrastructure:* The public organization needs to procure the e-ID infrastructure itself and possibly further components like the e-identity cards for the citizens.
- *Change of processes:* The processes of the public sector organizations have to be adapted to the usage of e.g. e-identity authorization processes.
- *Cyber security issues:* The public sector organizations have to deal with cyber security issues or implement the necessary security regulations.
- *Information of the public* about the potential uses e-identity systems

Digitization:

This need refers to the paradigm of "digital by default". Although considerable advances have been made on this front, much of the e-government initiatives are still informative rather than interactive. This need reflects the urge towards more interactive e-government initiatives and enabling communication through electronic and internet channels (wherever non-existent). Specific illustrations include: "Manual processes (especially those regarding citizens' data processing should be fully automated.", "Still not possible to do the paperwork regarding a relocation to another city online."

E-identitites (and e-signatures):

An e-Identity or Electronic Identity is a means for people to prove electronically that they are who they say they are and thus gain access to benefits or services provided by government authorities, banks or other companies.

One form of Electronic Identification (eID) is an electronic identification card (eIC), which is a physical identity card that can be used for online and offline personal identification or authentication. The eIC is a smartcard in ID-1 format of a regular bank card, with identity information printed on the surface (such as personal details and a photograph) and in an embedded RFID microchip, similar to that in biometric passports. The chip stores the information printed on the card (such as the holder's name and date of birth) and the holder's biometric photo. It may also store the holder's fingerprints. The card may be used for online authentication, such as for age verification or for e-government applications. An electronic signature, provided by a private company, may also be stored on the chip. Apart from online authentication, an eIC may also provide users the option to sign electronic documents with a digital signature (e-signature).*

*European Commission Electronic Identities – a brief introduction.
http://ec.europa.eu/information_society/activities/ict_psp/documents/eid_introduction.pdf. Accessed 15 August 2017.
Wikipedia Electronic identification. https://en.wikipedia.org/wiki/Electronic_identification. Accessed 15 August 2017.