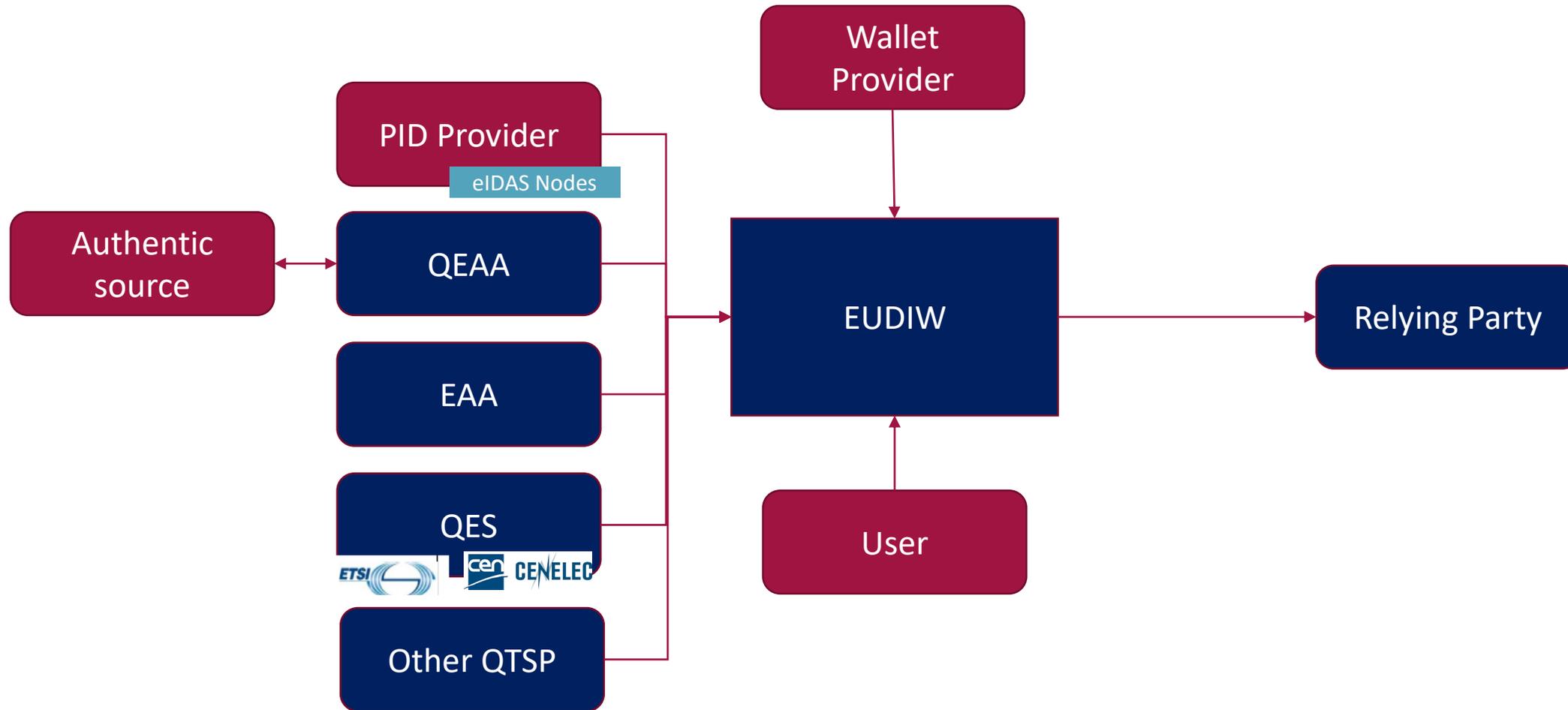


eIDAS 2 and the role of identity standards: an outlook of current activities

Steffen Schwalm, Principal Business Consultant, msg group & Expert in EBSI VECTOR + Co-Coordinator in EBSI TRACE4EU

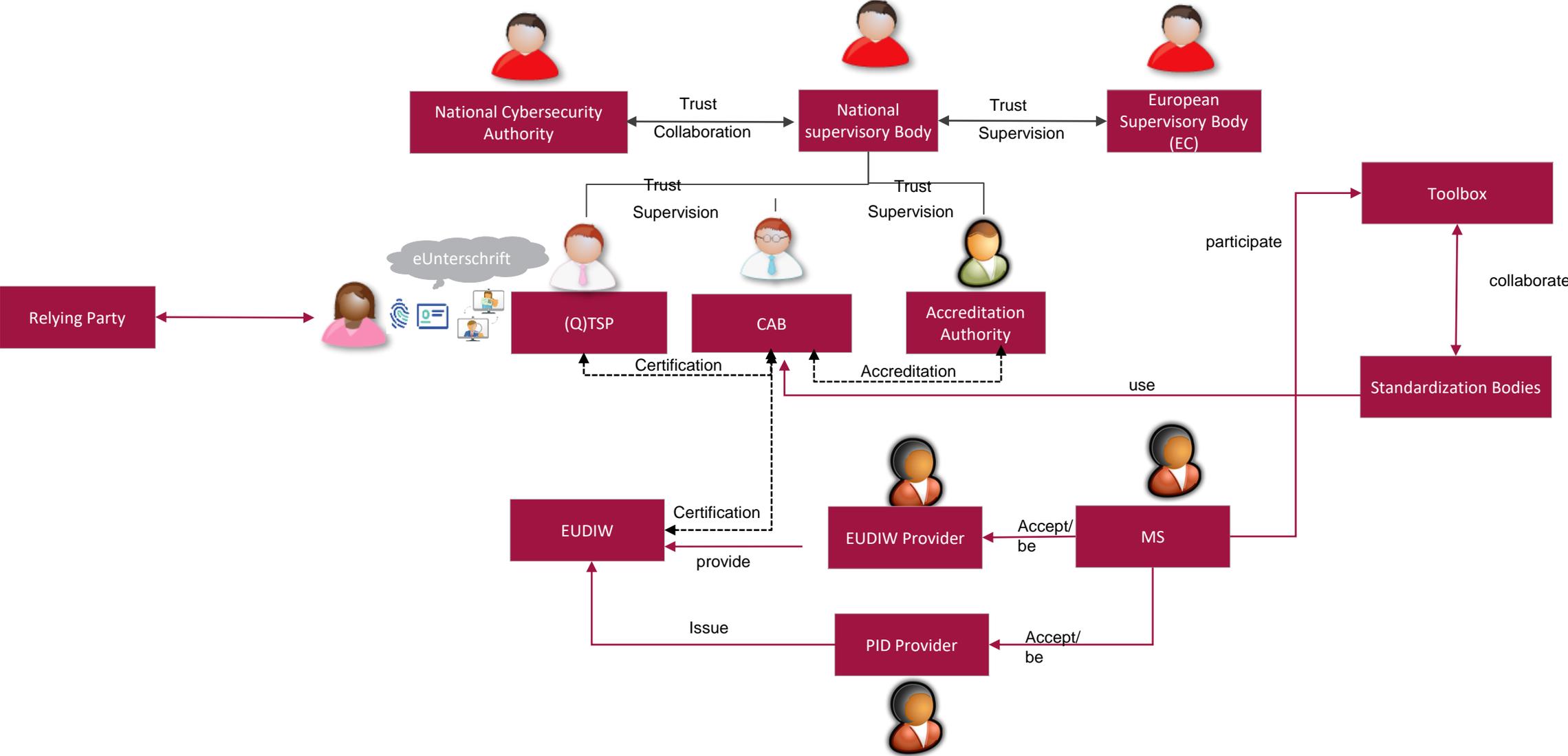
1. Regulative and technical framework
 2. Overview on projects, standardization and challenges
-

EUDI Wallet and QEAA ensure the integration of Self-Sovereign Identity in eIDAS Trust- and Technical framework – interaction with existing eID Schemes as well as QTSP require adjustment of existing technical standards

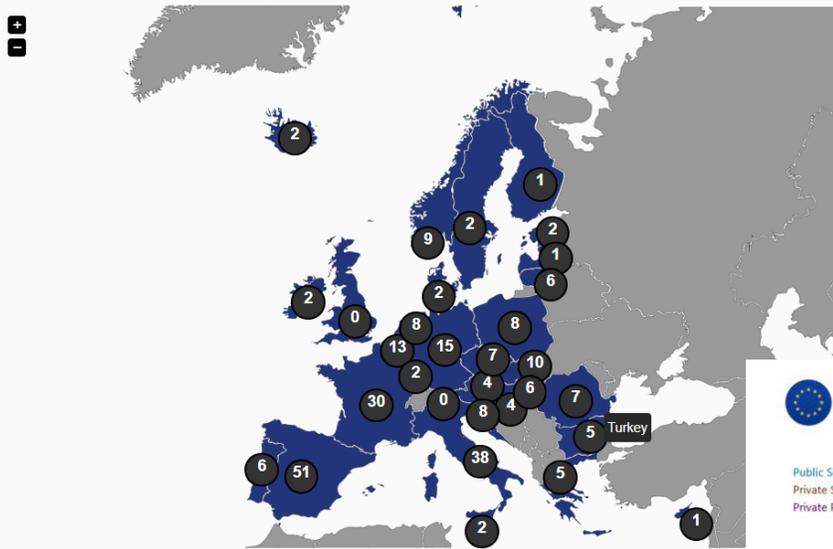
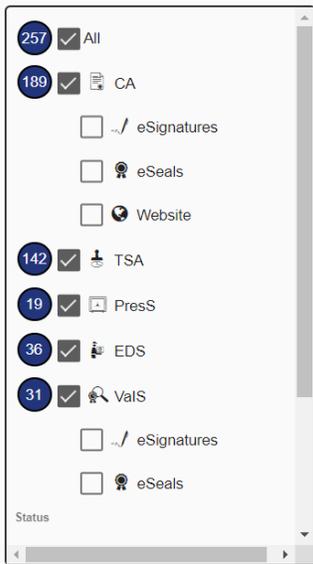


eIDAS 2.0 requires implementing acts for eID Schemes, - Means (EUDIW) and all (qualified) trust services including references to technical standards – means European Standards will become legally mandatory for whole parts of eIDAS 2.0

Decentralization regulated – SSI integrated in eIDAS Trust Model while keeping the advantages of existing solutions



EUDIW is not build on a green field – integration and interaction with existing digital identities and trust services will be the key for success of eIDAS 2.0

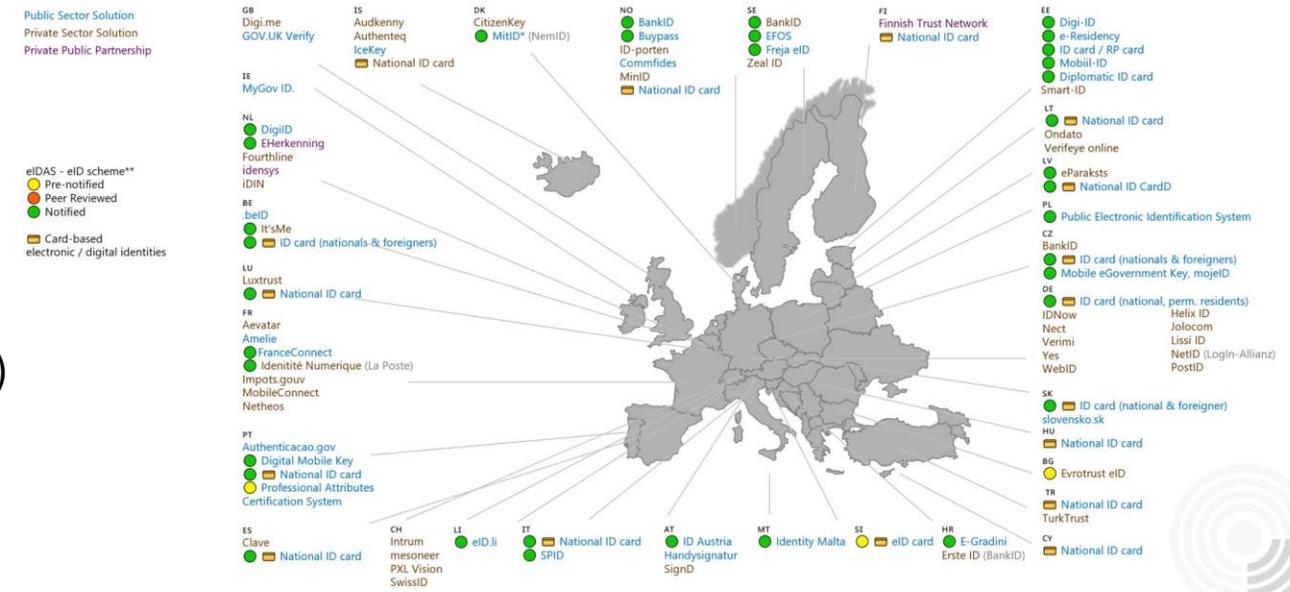


- > 250 (Q)TSP in Europe
- All Trust Services provided
- Especially QES/Qseal widely used
- Adoption and interoperability by eIDAS 2.0 needed for wide utilization of EUDIW

Source: goeIDAS e.V. c/o ecsec GmbH

- Notified eID in nearly all member states
- Further eID Means established and widely used
- Adopted by several regulations (AML, Health, Insurance etc.)
- Adoption and interoperability by eIDAS 2.0 needed for wide utilization of EUDIW

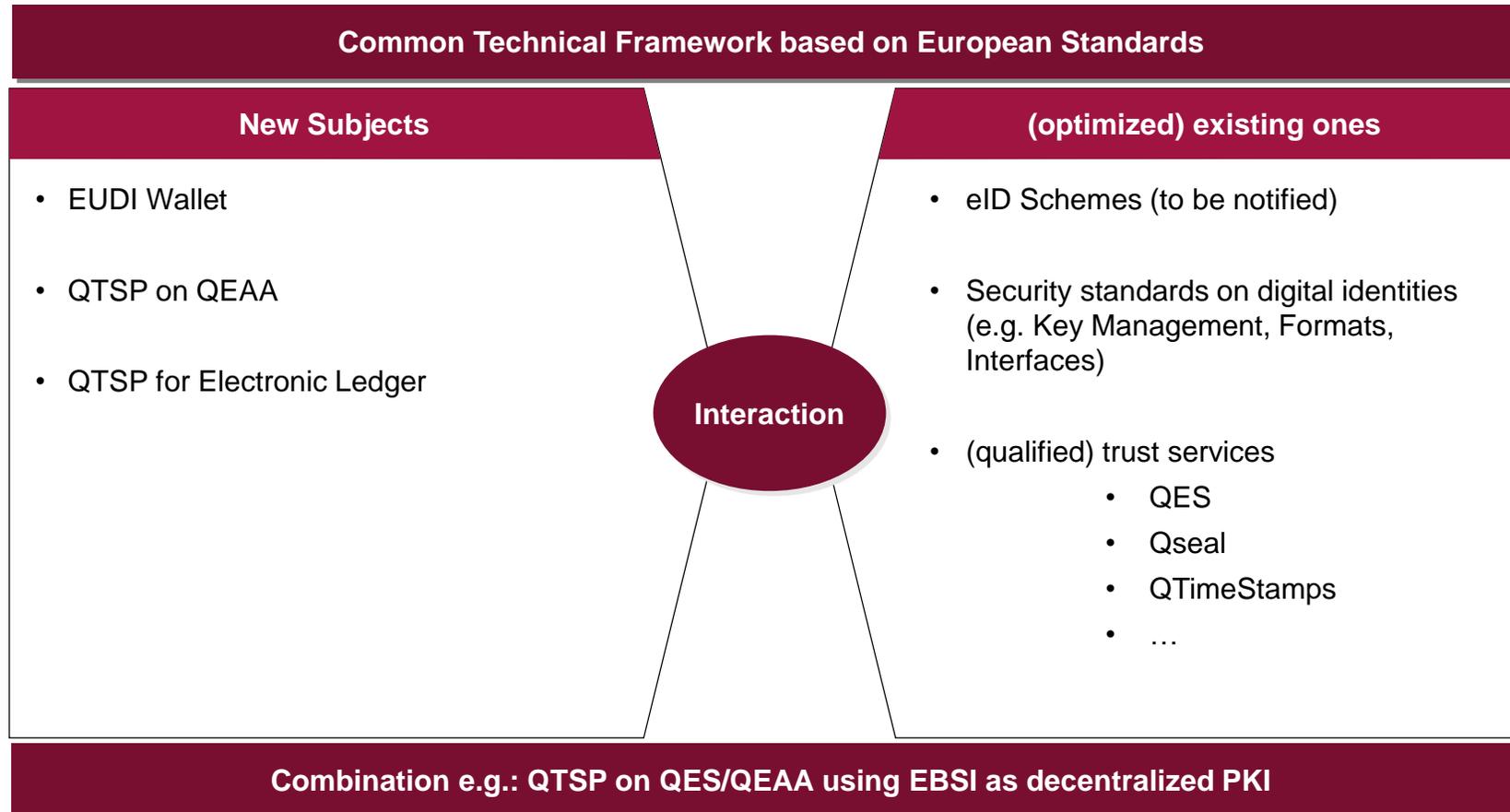
Landscape Remote ID Proofing & Digital Identity



Last update: February 6, 2023 © Joerg Lenz Namirial ; Information provided without guarantee for accuracy and completeness of data displayed; for clarity reasons organizations are only listed in their home / main country
 * Source: Namirial Research and European Commission - eID User Community: Overview of (pre-)notified eID schemes (i.e. those that can be used across national borders thanks to their integration with the eIDAS network) <http://bit.ly/eIDASchemes-eIDAS>



Standardization on eIDAS 2.0 will have to define common technical framework on new eID means (EUDIW) and (Qualified) Trust Services in combination with (optimized) trust services



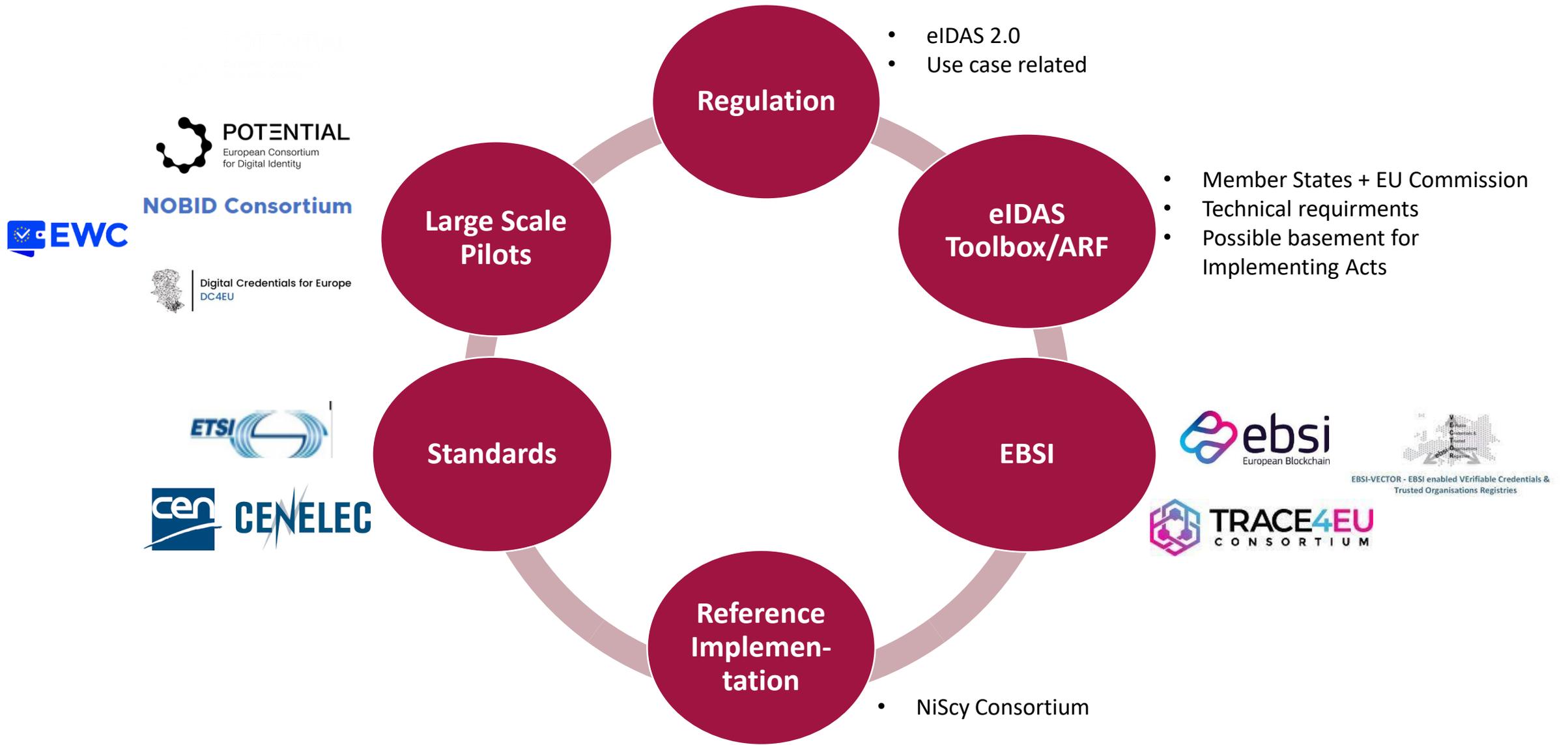
Additional challenge: dependency of eIDAS 2.0 and NIS2 – QTSP become de facto part of critical infrastructure



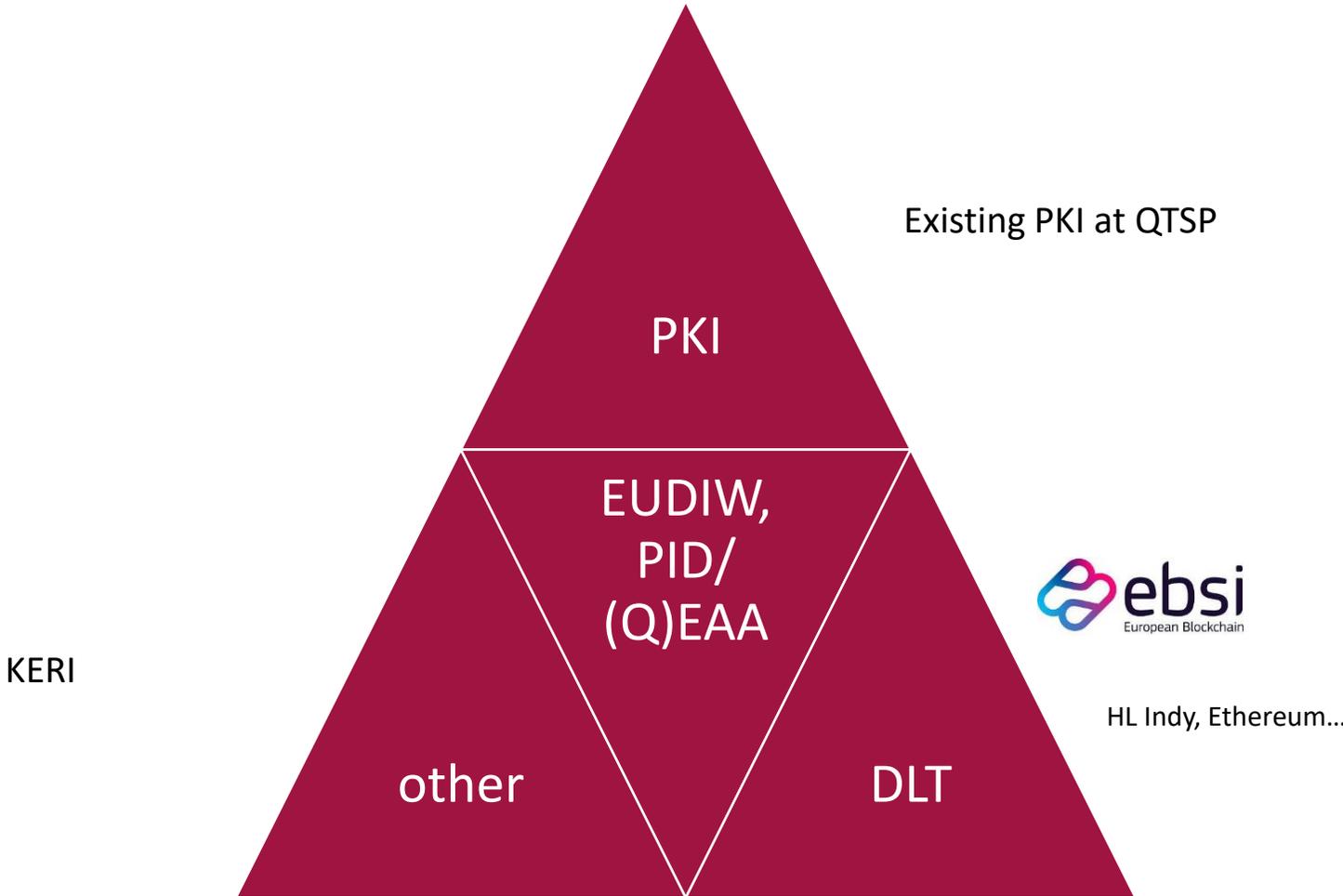
National specifics foreseeable as NIS 2 = Directive – standardization & regulation will have to ensure coherent framework via implementing Act

1. Regulative and technical framework
 2. Overview on projects, standardization and challenges
-

Concrete developments are ongoing in interaction of Regulation, Large Scale Pilots, Toolbox, Reference Implementation and Standardization.



There`s no precondition on the Verifiable Data Registry/Infrastructure for EUDIW, PID nor qualified attestations of attributes



Gaps and Issues

- Incompatibility W3C VC Data Model and SD-JWT
- Correlation SD-JWT and ETSI Signature Formats to fulfill legal requirements on Qseal without redundancies
- Concrete issuance PID incl. enrolment
- Design and requirements on QTSP for Electronic Ledger

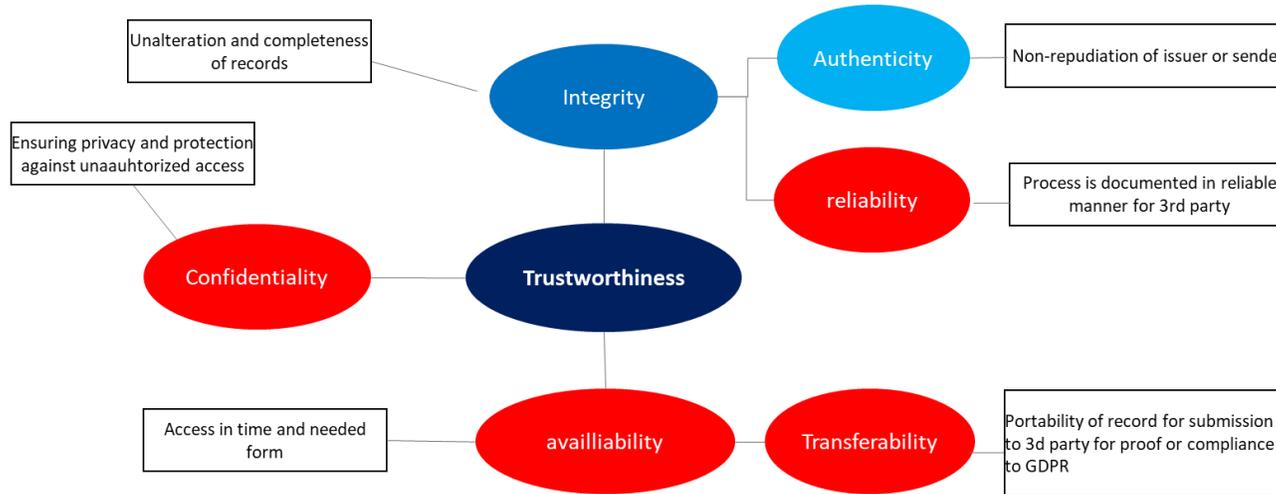
Security und Data Sovereignty

- Data Sovereignty with Non-European Hardware in EUDIW
- QWAC or not QWAC – is that the question?
- Secure Element vs. HSM or how to achieve LoA „high“
- Privacy vs. Burden of Proof or how to ensure privacy friendly revocation etc.?

Interaction and utilization

- Integration eIDAS Nodes and existing QTSP as well as TrustList
- Organization Identities and Enterprise Wallet
- Interaction QEAA and Authentic Sources
- Preservation of QEAA and ledger

eIDAS 2.0 can ensure actual decentralization through legal and technical regulation of DLT (esp. EBSI) – challenges on EBSI

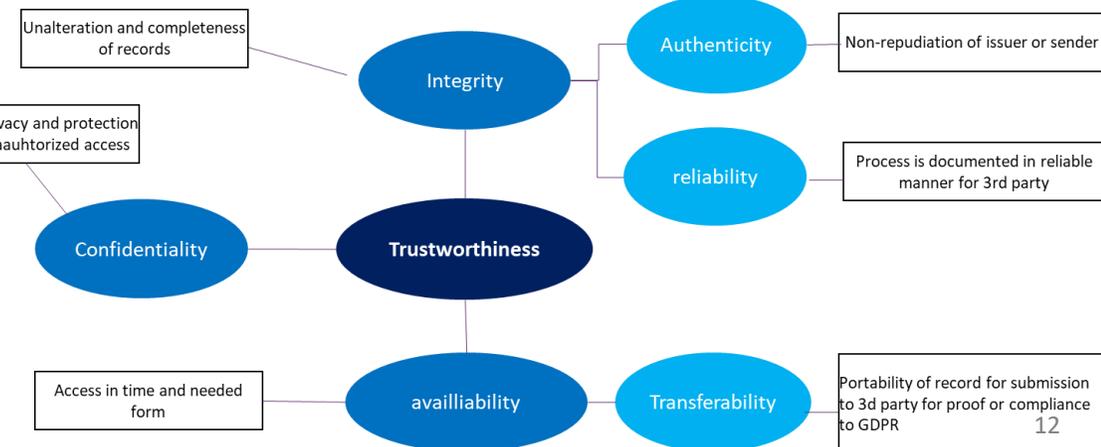
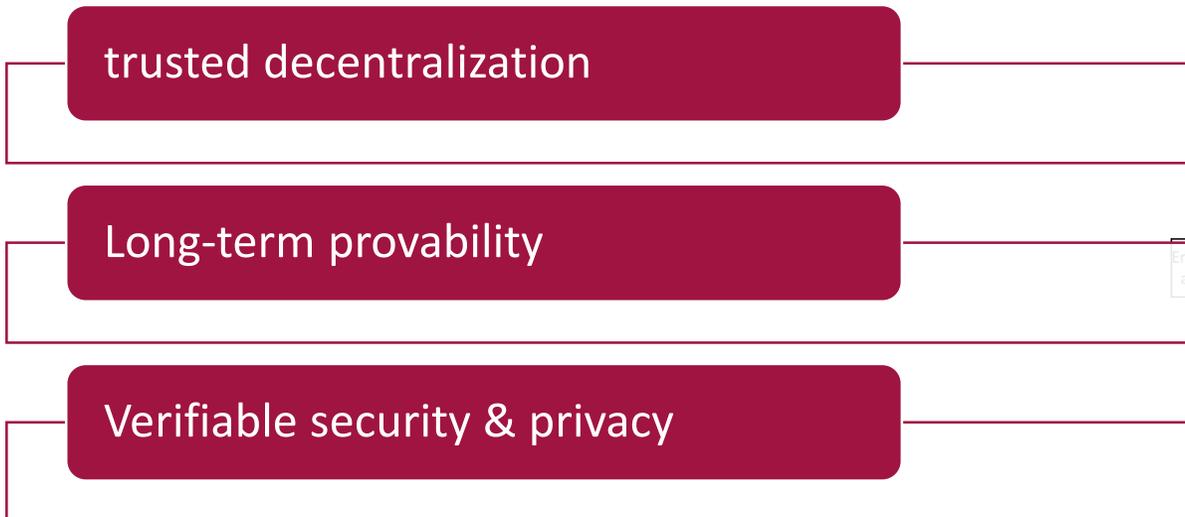


Regulation

- QTSP on Electronic Ledger ensures legal trust on DLT through Conformity Assessment & provable security
- Mandatory implementing act needed for interoperability

Standardization

- Trusted Issuer Registry, Revocation, crypto stability, protocols, privacy
- Requirements on certification of QTSP for Electronic Ledger
- Combination with other QTSP (e.g. QES)



ISO published

- ISO Tc 307
 - ISO TR 22349 Overview of existing DLT systems for identity management
 - ISO 23257 Reference architecture
 - ISO TS 23635 Guidelines for governance
 - ISO TR 23644 Overview of trust anchors for DLT-based identity management
- ISO JTC 1 Sc 27
- ISO/IEC JTC 1/SC 17 (ISO mDL)

ISO under construction

- ISO CIB TR 24332 Blockchain and DLT in relation to authoritative records, records systems, and records management
- ISO AWI TS 23353 Auditing guidelines
- ISO WD TS 23516 Interoperability Framework

Europe (CEN/ETS)

- CEN JTC 19 (Decentralized Identity Management)
- CEN Tc 224 (Wallet)
- ETSI ESI (ETSI TS 119 476, QEAA, Wallet Interaction, TrustList, Signatures etc.)
- ETSI PDL (Ledger)



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