Self-Sovereign Digital Identity

QuarkID
Let’s think of our physical wallets
How do we prove aspects of our identity in the analog world?
We don’t yet have a Digital ID primitive
Self-Sovereign Digital Identity

ISSUE
- Verifiable credential
  - Issuer
  - Index
  - Blockchain

TRUST
- No integration needed

VERIFY
- Credencial proof
  - Verifier
  - Look up

ID HOLDER
**On-chain or off-chain?**

**On-Chain**

**DID Document** → Identifier and its associated cryptography.

- e.g: DID:QuarkID:Starknet:12wdj456ce89asfhs
  - DIDmethod
  - Network
  - Identifier

  - Where to find your public key
  - Pseudonymous ID for holder

**Off-Chain**

**Verifiable Credential** → All personal and private information.
## Technology

### Level 1: Public Utilities

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### Level 2: Peer-to-Peer Protocols

- Blockchain
- Distributed Ledger
- Decentralized File System

### Level 3: Data Exchange Protocols

- ECOSYSTEM FRAMEWORKS

### Level 4: Application Ecosystem

- ECOSYSTEM FRAMEWORKS

### Governance

- AGENT FRAMEWORKS
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**Ecosystem Example**

**HEALTH PASS**

Ecosystem Example
Interoperability

Standards

- DIF
- W3C®
- TRUST Over IP FOUNDATION
- OpenID Connect

Interoperability

- NGI
- sovrin
- ION
- ID union
Layer 3

Layer 2...N

Layer 1...N

- bitcoin
- ethereum
- STARKNET
- polygon
- rsk

QuarkID approach model in layers
QuarkID an Ecosystem

Partners

extrimian  STARKWARE  IOVlabs
BEON  OSCITY  xcapit
Buenos Aires Ciudad
1. Open standards SSI protocol
2. Multi chain
3. Interoperable
4. Private data off-chain
5. Autonomous governance
6. A growing public/private ecosystem
7. Government as a user vs. Government’s user
Why did we chose this path?

Proving positives or negatives, that’s the dilemma

In our view

1. Self ownership and positive reputational systems first…
2. …negatives came afterwards
¡Thank you!

www. QuarkID.org

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@fernandezdiego