

Government elD in Africa: trends

Secure e-documents

Efficient and reliable environment and infrastructure.

Verification

Precise and massive citizen verification

Financial inclusion

Identity + payment



Authentication

Convenient and secure authentication on mobile devices

E-government

Effective access and usage of e-Government

Collaboration

Increasing collaboration between registries & databases, enrolment stations, issuance bureaus, banks, traffic, social and healthcare systems, etc.

Government elD in Africa: challenges

Current approach to implement e-documents in Africa:

- Solution providers and integrators sell <u>separate</u> <u>systems and projects</u> to governments.
- Systems are usually not connected with each other.
- ☑ There is no exchange of data between units and systems.
- ✓ System capabilities are not used effectively.





Government elD in Africa: challenges

Desired approach & next challenge:

- ☑ Build synergy between governments and solution providers.
- Explain governments how their country can benefit from implementing a <u>complete ID system</u> for citizen verification and identification, e-Government, border control, healthcare and social programs, financial services.
- ☑ Maximize efficiency and minimize costs.





African eID: fast-developing market

- Africa is developing fast. What was once a few countries investing in citizen identity is now a fast-growing market.
- There are many opportunities with an integrated ID system with a wide range of applications: voting, social programs, Know Your Customer (KYC) for banking and financial inclusion.
- ☑ Each country in Africa should find its own path for growth.
- Secure ID systems will help shaping the Africa of the future and improve the living standards for a billion+ of people.





Digital disruption in Africa

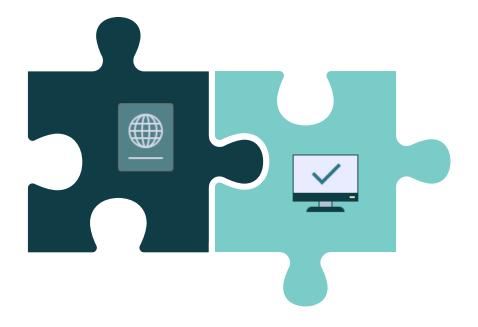
- ✓ Number of people travelling within Africa and internationally is increasing. Secure documents and systems, including PKI, are a must to fight identity fraud and establish mutual trust between countries.
- The system behind the identity document becomes more important than the document itself.





Digital disruption in Africa

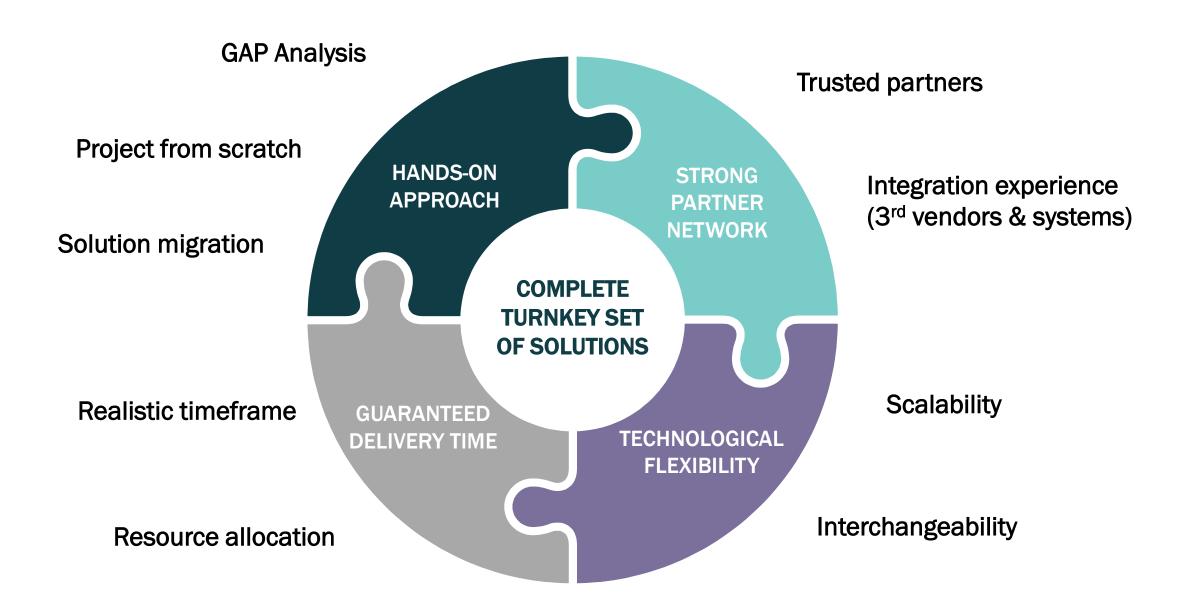
☑ The majority of Sub-Saharan population still live in rural areas. Therefore governments are not only in need of centralized systems but also mobile enrolment systems and independent platforms that can work without Internet and electricity.



A healthy balance between secure documents and professionally developed systems is needed.



X Infotech's advantages

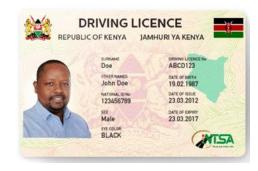


X Infotech case studies







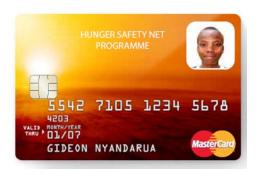
















Ghana elD case





End-to-end solution implemented by the consortium:

enrolment, personalization, instant issuing and in-the-field usage, combined with national AFIS system

Set of Chip Functionalities

- ☑ ICAO ID application (SAC/EAC compliant)
- ✓ National ID application (EACv2)
- ✓ Match-on-card
- ☑ PKI application,
- ☑ CPA payment application



Card is a combination of legacy barcode cards and modern chip card

Chip – CC EAL5+ certified, biometrics, EAC (CA/TA), PKI, end-to-end encryption between mobile stations and central DB



Ghana eID case





Enrolment & Card personalization - mobile kits



Further developments

Mobile tablets for cardholder enrolment, biometric authentication, and post-issuance solution for information update on the chip



Huduma card case





Quick facts (Statistics from Huduma Kenya service)

- ☑ Customers served daily: **30,000**
- ☑ Government services: **45+** government services available at Huduma Centres.
- ☑ Revenue: **KES 12 billion** collected

Awards















Huduma card case





Multi-functional social card

Identification: biometrics - photo and fingerprints

Payment function: MasterCard and CPA

Integration: 4 major banks + framework to on-board other participants,12 ministries, connection to IPRS database

Mobile devices for pre-enrolment and payments

Security: chip and PIN



Features of Huduma Card

One multi-purpose card

Safety

Acceptance

No bank account required

Value-added services

Why Huduma Card

☑ Cost saving

☑ Enhanced transparency

☑ Financial inclusion

☑ Centralized government database

☑ One-stop shop platform



X Infotech

- ✓ **Knowledge & expertise** gained from real projects installations
- ✓ Full set of products to support programmes from A to Z
- ✓ **Mobile components** to facilitate the speed of adoption
- ☑ Financial inclusion option



Electronic identity documents



Electronic driver's licenses



Border control management



Social multi-application cards



Financial cards, Payment app + ID



Biometric verification

Thank You!



Vadims Teresko Business Development Director