Mobile Electronic ID



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GSMA Mobile Identity Programme
Nice, September 2012

Agenda

The Problem

- We think about identity in the wrong way, and this leads to solutions that make no sense
- Google “birch TED identity”

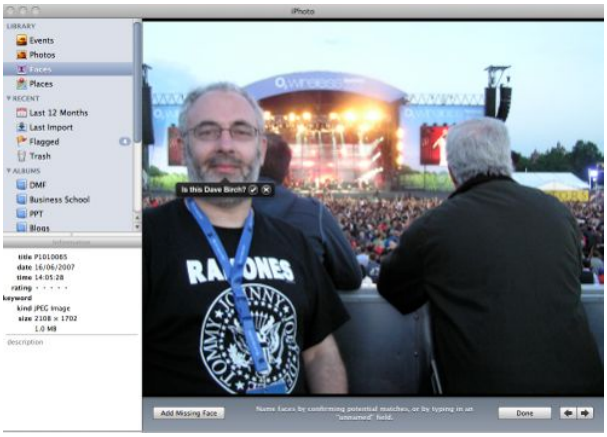
The Solution

- Suppose we had a different mental model of identity, one based on authentication and attributes

The Business

- Remember that William Gibson thing? The future is already here, just unevenly distributed?

The Problem

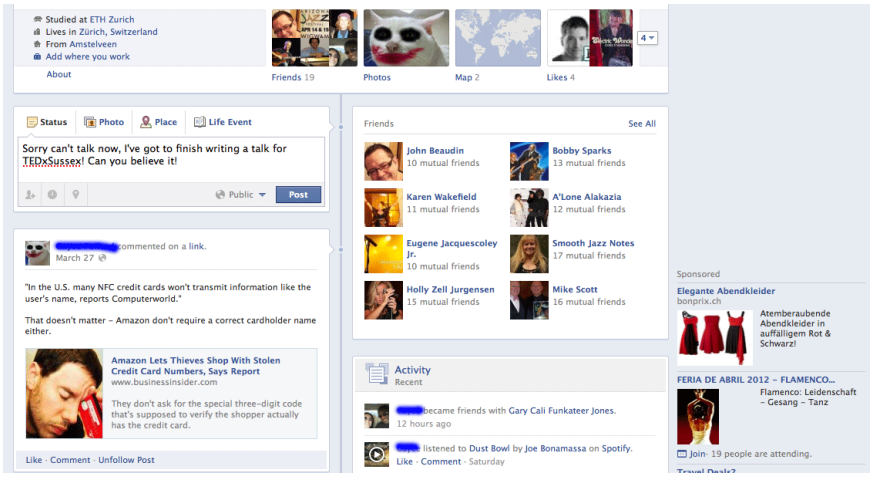


We think about identity in the wrong way, and this leads to solutions that make no sense

Chip and PIN



Cheerleaders and Clubs



What, Who and Whistleblowers



The Solution

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Suppose we had a different mental model of identity, one based on authentication and attributes

The New Paradigm

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Real World!

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Stop sharing "real" identity!

- This makes things worse, not better

Create an infrastructure for digital identities

- Multiple key pairs, created in the SIM
- Private keys never disclosed

Binding the key pairs to people (hard)

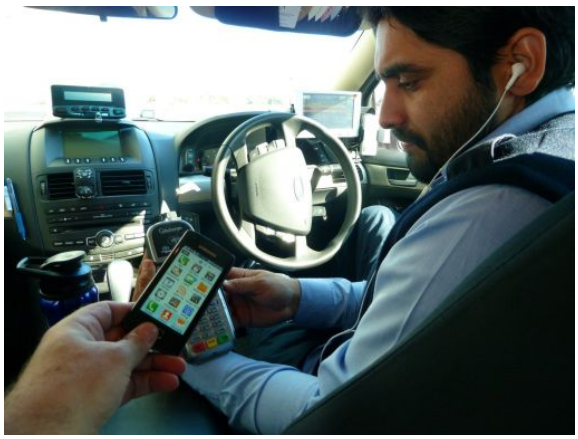
- Authentication

Binding the key pairs to persona (easy)

- Virtual identities for every service

The Business

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Remember that William Gibson thing? The future is already here, just unevenly distributed?

Narrative: Remote Control

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The phone is the obvious place to manage identity

But we need a cross-industry framework (eg, OpenIDConnect)

And a standardised authentication service



Utility: Convenience

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Speed is of the essence, and now we have contactless and NFC (but not psychic energy!) we can make identity work properly without getting in the way



The weakest link in security is the fact that passwords are used… the Internet needs to move away from passwords and into the use of smart cards
Bill Gates, speaking at Interop 2000 (ie, twelve years ago)

Utility: Symmetry

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It's reasonable for a policeman to ask who you are, but it's equally reasonable for you ask a policeman who he is, and it has to work so that my mum can check the utility guy



The true identity of a counterparty may be the least interesting fact about them in a commercial transaction — John Browning in Wired. 5(11): p.65(6) (November 1997).

We Know it Works

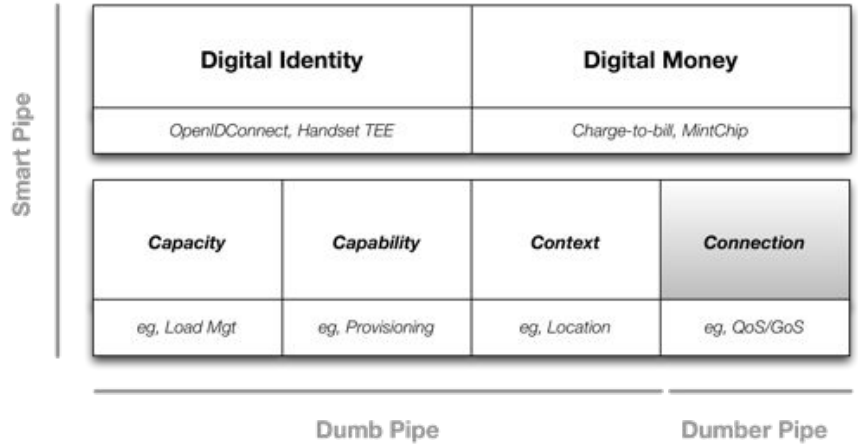
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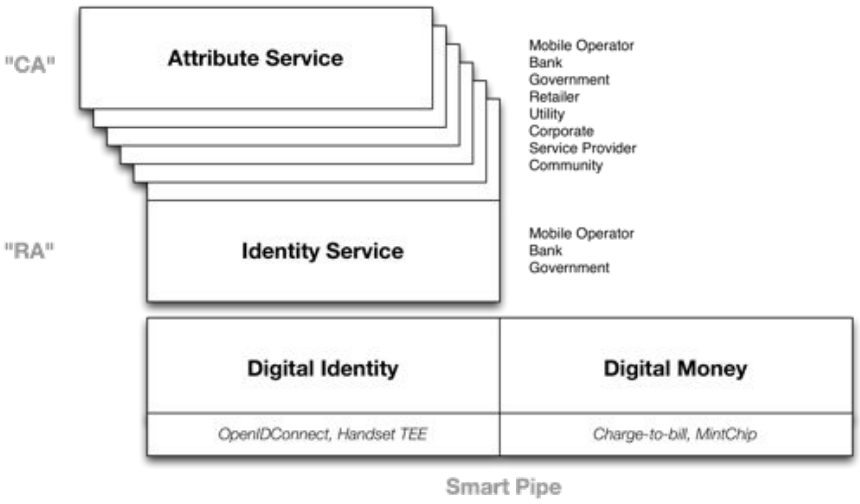
(Operator Perspective)

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(Operator Perspective)

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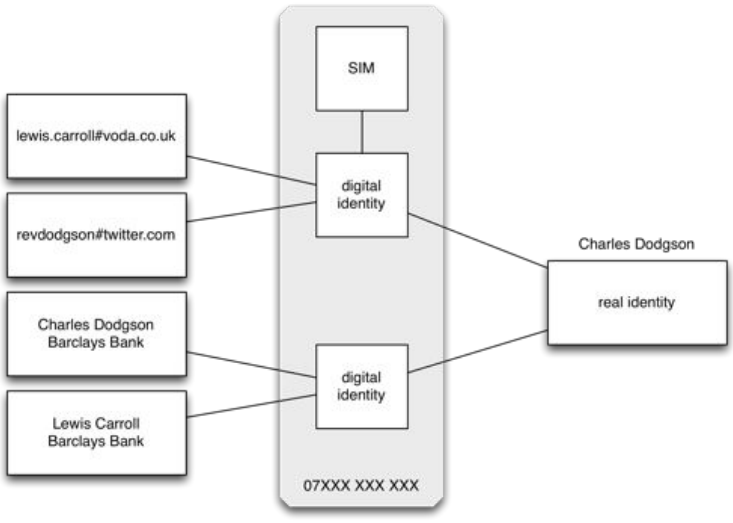
(Operator Perspective)

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UK example	virtual identity	
UK mobile phone number	unique identifier	07XXX XXX XXX
UK mobile phone operator	identity provider	o2.co.uk
facts known to the operator	attributes	is_known_as lewis.carroll@o2.co.uk is_over_18 is_contract_customer is_allowed_roaming Europe, North America
	digital signature	

(Operator Perspective)

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Thank You

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