

E-VISA – AN ESSENTIAL COMPONENT OF FACILITATION R RAJESHKUMAR CHIEF EXECUTIVE AUCTORIZIUM PTE LTD



VISA APPLICATION – THE ISSUES



- Locate embassy may not be in your country of residence
- Locate correct form to apply online information is often confusing
- Data requirements may vary
- Visa types not consistent across countries
- Passport needs to be sent to Embassy for duration of processing
- Visa dependencies
- Fee payment takes different forms



E-VISA- CURRENT LANDSCAPE



- Apply online on per country basis
- After approval, you get a "reference number"
- Airline checkin counters and immigration need online lookup to verify your visa
- Alternately, visa is printed on plain piece of paper easy to forge as no security features



E-VISA- A SUGGESTION



- Single portal
 - Easy to apply for multiple countries simultaneously
 - Visa dependencies can be programmed into system
 - Backend integration with country systems
 - Common standards on data capture
- Issue still remains of format of Visa and its security



A SOLUTION



- Quick Response Codes (QR codes) can be used to store binary data
- Can be scanned by Passport readers and even mobile phones
- •Create LDS according to Doc 9303 using the MRZ of the visa in DG1 and the photo in DG2. Sign and create an SOD.
- Store both LDS and SOD in QR code as a replacement to chip
- Advantage is that it can be printed by applicant on his own printer





DEMO – VISA APPLICATION



		Visa A _l	pplication Details		
00		Travel Details Which countries would you be visiting?		✓ Germany ☐ Singapore	☑ Liechtenstein
Uploa	d Photo	Passport Details Passport No: Issue Date	E10050503	Place of Issue: Expiry Date:	Singapore 11/27/12 7:18 PM 숙
rsonal Details Siven Name:	Praveen	Surname:	Jose	Date Of Birth:	11/27/12 7:18 PM 💠
lationality:	Singapore	Gender:	M	Address:	Eiffel Tower
urpose:	Tourist	Telephone:	9999999	Email*:	N/A
occupation*:	N/A	Education*:	N/A 🗸	Marital Status:	Married >
	Submit				Cancel

- Single portal allows applicant to choose the countries to apply for
- Will enable visa dependencies to be coded into the business logic







DEMO – VISA APPROVAL



- Approve button
- creates LDS and SOD and signs using PKI
- Also creates
 PDF with the
 QR codes







DEMO - VISA

E-VISA Information



PDF with the QR codes, which applicant can print on any printer











NETRUST

DEMO - VERIFICATION



QR codes scanned with normal mobile phone.

Passport readers can also be used to scan QR codes







DEMO - VALIDATION



Signature verification of SOD to validate integrity of content.

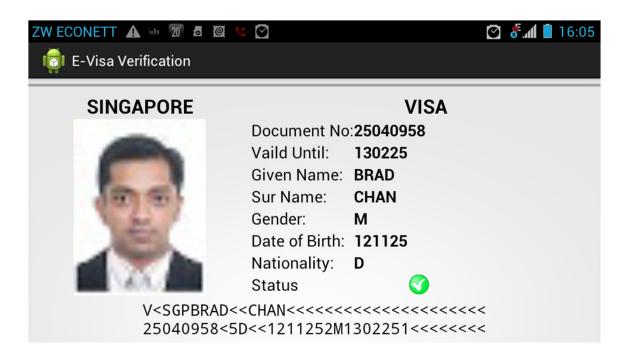
Verification is done on the phone itself.







DEMO - VALIDATION



Validation of MRZ information.

Verification of visa holder.





SOME THOUGHTS

- Single portal who should run it?
 - A regional grouping of countries that have visa dependencies or visitor concentration?
 - An international body that has "facilitation" as its key objective?
- Standards needed:
 - For data captured and transmitted
 - Security of data and privacy issues
 - QR code data structure
 - Distribution of signing keys for verification PKD?





SUMMARY

- MRTDs are facilitating passenger movement
- Visa schemes need to catch up
- Technology is ready and available
- Need thought leadership and action







THANK YOU

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