

Perspectives on:
Screening of personnel and divested
items at the checkpoint

What was heard?

What was not heard?

What's next?

Harry Martz, Carl Crawford

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What Did We Hear?

- Long range BAA 14-2
- Talk to Kumar before submitting a whitepaper
- TSA wants 300 passenger and 600 bags per hr.
- CT and XRD at checkpoint is pretty good
- AIT ATR could be improved
- System architecture will enable third parties
- Open architecture Proof-of-Concept
- DNDO is looking at developing gov't reference hardware and software
- Video analytics can be used to track people and their items
- Risk-based security strategy in aviation security

What Did We Hear? continued

- Validating models of adversary behaviors
- Game theory:
 - Best part is accounts for intelligent terrorists
 - But it does not solve the “needle in-hay-stack problem.
- Advanced material discrimination
- Development of standards: DICOS
- Advances of trace detection
- 3rd parties contracting 3rd parties
- Topics for ADSA 14
- Will XBS be redeployed
- Throughput and financial considerations

What Did We Hear? continued

- Review of previous ADSAs assessing data fusion
- ATRs with analog outputs
- THz advances
- CZT detectors
- Super resolution
- Iterative CT reconstruction
- Why do security technologies need to detect
- What is optimal High PD OR low false alarms

What Did We Hear? continued

- CBP prefers lower false alarms so they can focus other high risk areas
- Reducing the time to deploy new ATRs
- Preventing false discovery in adaptive data analysis
- 3rd party, vendor, etc. perspective on 3rd party involvement
- ALERT is an expediter
- In the beginning there was no baggage handling standard;
 - TSA required the bag handlers to define a standard;
 - Beneficial to both sides and
 - Gov't should set standards
- Safety Act

Additional Audience Comments on “What We Heard”

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What We Did Not Hear?

- Proof that the Israeli RBS would apply in the US
- RBS metrics and how will they be measured/used
- DICOM
 - How benefited medical imaging
 - How problems w/ rolling out DICOM can be avoided for DICOS
- Third parties
 - How the stakeholders (TSA, vendors, 3p) will benefit
- Differences between perspective on Level 1, 2, 3 etc. and fusion of the levels/technologies
- Why have shoe screening technologies failed
- Airlines, TSOs, etc.
- Quantifying deterrence and displacement

What We Did Not Hear?

- CONOPS details
- Details of spiral development
- How is a part of a integrated system get integrated
- Harmonized testing, standards, etc.

What Can Be Done To Solve the Checkpoint Problem?

- Risk based screening (under-screening)
- Better CONOPS
- Orthogonal technologies system and data integration
- Standards
 - Systems interfacing
 - Data integration
 - Testing in lab and field
- Better MMW, NMR, NQR and X-ray hardware and reconstruction software

What Can Be Done To Solve the Checkpoint Problem? continued

- Grand challenges/task orders
 - Reconstruction and ATR for sparse view CT, MMW
 - Speeding up CERT/QUAL testing
 - More statistical
 - Human in the loop
 - Simulated system, bag and people data sets
 - Quantifying deterrence and displacement

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