



Awareness and Localization of Explosives-Related Threats (ALERT)

A Department of Homeland Security Center of Excellence

Advanced Development for Security Applications (ADSA) Workshop 14: Development and Deployment of Fusible Technologies for the Checkpoint

May 10 – 11, 2016

Raytheon Amphitheater (Room 240), Egan Research Center
Northeastern University, Boston, MA

AGENDA

Tuesday, May 10th, 2016 – Day 1

Time	Topic	Speaker	Affiliation
8:00 AM	Check-in/Breakfast		
Introduction			
8:30 AM	Welcoming Remarks – ALERT	Michael Silevitch	Northeastern University / ALERT
8:35 AM	Welcoming Remarks – DHS	Laura Parker	Department of Homeland Security
8:40 AM	Setting the Stage	Carl Crawford	Csuptwo, LLC
Aviation Checkpoint of the Future – Government Perspective			
8:50 AM	APEX Screening at Speed Initiative (Aviation Checkpoint of the Future)	John Fortune	Department of Homeland Security
9:15 AM	Functionality Needs in Transportation Security Systems	Douglas MacIvor	Transportation Security Administration
9:40 AM	TSA perspectives - Q&A	Frank Cartwright	Transportation Security Administration
Tangerine Detection			
10:05 AM	How to Say That We Need a Tangerine Detector?	Matthew Merzbacher	Morpho Detection, LLC
10:20	Break		
Emerging X-Ray Methods			
10:50 AM	Enhanced Detection of Weapons and Explosives Through X-Ray Phase-Contrast and Dark-field Imaging	Alessandro Olivo	University College London
11:15 AM	Gratings-Based Phase Contrast X-Ray Imaging for Explosives Detection	Erin Miller	Pacific Northwest National Laboratory



Awareness and Localization of Explosives-Related Threats (ALERT)

A Department of Homeland Security Center of Excellence

Time	Topic	Speaker	Affiliation
11:40 AM	Lunch		
12:30 PM	Halo's Work on X-Ray Diffraction	Simon Godber	Halo X-Ray Technologies Ltd.
12:55 PM	X-Ray Body Scanners with Fused Backscatter and Transmission Imaging	Steve Smith	Tek84 Engineering Group
1:20 PM	OD's Products and the Barriers to Using Transmission X-Rays at the Checkpoint	Jan Steven van Wingerden John Shannon	OD Security OD Security North America
1:45 PM	XinRay's Checkpoint Scanner	Brian Gonzales	XinRay Systems
Video and Large Data			
2:10 PM	PFA Reduction	Ron Molway	Transportation Security Administration
2:35 PM	Designing the Next Generation Check-Point with Data	Deeph Chana	Imperial College London
3:00 PM	Active Learning and Video Tracking	Avi Kak	Purdue University
Detection Standards			
3:25 PM	Evolution of Certification Criteria	Fred Roder	Consultant
3:50 PM	Break		
Standards and Development Platforms			
4:20 PM	Open Threat Assessment Platform	Andrew Cox	Sandia National Laboratories
4:45 PM	Lessons Learned During the Development and Deployment of DICOM	Oleg Pianykh	Harvard Medical School
5:10 PM	What Can Happen When Subsystems are Fused?	Kevin Johnson	U.S. Naval Research Laboratory
5:35 PM	System Readiness Level	Brian Sauser	University of North Texas
6:00 PM	Adjourn	Carl Crawford	Csuptwo, LLC



Awareness and Localization of Explosives-Related Threats (ALERT)

A Department of Homeland Security Center of Excellence

Advanced Development for Security Applications (ADSA) Workshop 14: Development and Deployment of Fusible Technologies for the Checkpoint

May 10 – 11, 2016

Raytheon Amphitheater (Room 240), Egan Research Center
Northeastern University, Boston, MA

AGENDA

Wednesday, May 11th, 2016 – Day 2

Time	Topic	Speaker	Affiliation
7:30 AM	Check-in/Breakfast		
Introduction			
8:00 AM	Call to Order & ADSA15 Discussion	Carl Crawford	Csuptwo, LLC
MMW, Simulants and TSL			
8:10 AM	MMW AIT Improvements	Barry Smith	DHS, Transportation Security Laboratory
8:35 AM	XP-DITE: An Integrated, Outcome-Focused, System-Level Approach for Aviation Security Checkpoint Design and Evaluation	Mike Kemp	Iconal Technology Ltd., UK
9:00 AM	Smiths Mm-Wave Person Imager	Martin Hartick	Smiths Detection
9:20 AM	Stand-Off Threat Detection Using Active MMW	Ed Godere	Radio Physics
9:25 AM	Working with TSL	Brian Krenzien	DHS, Transportation Security Laboratory
9:50 AM	Break		
Trace, Chemical and Stand-off Detection			
10:20 AM	Stand-Off Trace Detection	Robert Furstenberg	U.S. Naval Research Laboratory
10:45 AM	AN Detection with MS	Susan Rose-Pehrsson	U.S. Naval Research Laboratory
11:10 AM	Chemical Sensing of Explosives	Otto Gregory	University of Rhode Island
11:35 AM	Multispectral Imaging of Concealed Explosives	James Kane	Polestar



Awareness and Localization of Explosives-Related Threats (ALERT)

A Department of Homeland Security Center of Excellence

Time	Topic	Speaker	Affiliation
Emerging Algorithms			
12:00 PM	Automatic Object Classification for 2D X-Ray and 3D CT	Toby Breckon	Durham University, UK
12:25 PM	Partially Occluded Weapons Identification Through Partonomy	Nikolay Metodiev Sirakov	Texas A & M University - Commerce
12:50 PM	Lunch		
Humans in the Loop			
1:20 PM	How Will Humans in the Loop Do at Detecting Tangerines?	Matthew Merzbacher	Morpho Detection, LLC
1:30 PM	Improvements in Behavioral Detection with Engagement	Carl Maccario	Center of Nonverbal Communication
1:55 PM	Break		
2:35 PM	Improving Performance of Human Operators	Stephen Mitroff	George Washington University
Next Steps			
2:50 PM	Summary and Next Steps	Carl Crawford Suriyun Whitehead	Csuptwo, LLC Booz Allen Hamilton
Closing Remarks			
3:50 PM	Closing Remarks	Michael Silevitch	Northeastern University /ALERT
3:55 PM	Closing Remarks	Laura Parker	Department of Homeland Security
4:00 PM	Adjourn	Carl Crawford	Csuptwo, LLC