Prevent and counter acts of explosives terrorism by defeating a range of explosives in a dynamic variety of missions and operational scenarios.

Capabilities

Prevent
- Risk and Vulnerability Assessments
- Cognitive Informatics
- Visual Analytics
- Biomarkers and Pharmacokinetics
- Training and Exercises
- Predictive Behavior Modeling and Behavior Analysis
- Armor Development and Explosives Effects

Detect
- Chemical, Physical, and Nuclear Interrogation
- Intelligent Video
- Optical Sensing
- Human Factors
- Statistical Data Analysis
- Sensor Fusion
- High-Throughput Information Extraction
- Robotic Systems
- Electro-optical and Infrared Sensor Development

Assess

Respond
- Emergency Response
- Chemical Forensics
- Statistical Evidence Analysis
- Event Reconstruction
- Critical Infrastructure Assessment

Investigate

National Laboratory Contributions
- Using science and technology to strengthen capabilities in chemistry, physics, and nuclear detection methods for explosives
- Developing new, more sensitive, explosives detection and standoff technologies
- Developing the R&D agenda to guide the long-term national strategy to defeat explosives
- Deploying and demonstrating technologies in operational environments to drive improvements in
  - Technology to defeat explosives-based threats
  - Concepts of operations
  - End-user training

Collaborations
- DOE National Laboratories
- Government agencies (e.g., DOD, DHS, DOE, Department of Justice)
- Universities (e.g., Washington State University, University of Washington)
- User Community
  - NYPD
  - Secret Service
  - Port Authority of New York and New Jersey
  - Port of Seattle

Translation of Needs to Technologies

For more information, contact:
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Science-Based Solutions for Homeland Security