# CANADIAN AIR CARGO SECURITY
## *Continuous Improvement Through Web-based, Interactive Training*

Lansdowne Technologies Inc., in association with Battelle, the world's largest independent, non-profit R&D organization, has developed an advanced, web-based, interactive, on-line and in-class training system for Canadian air-cargo employees and screeners. The Lansdowne Air Cargo Training (LACT) program, based on Lansdowne's established e-Learning Management System, air cargo handling specific content, and Battelle's ProDetect™ security screener training software, was developed to provide training in compliance with recent amendments to Canadian Aviation Security Regulations and Designated Provisions Regulations (Air Cargo).

The LACT program has been developed to meet the growing need for training across Canada's air cargo community and reflects Lansdowne's broad consultation with recently-retired Transportation Security Inspectors. This program focuses on the required employee training for shipping companies, warehouse and trucking companies, freight forwarders, and air cargo administrators who manage, screen, and handle cargo destined for passenger and cargo flights departing from Canadian airports.
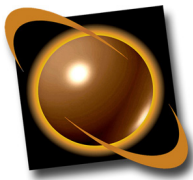
**Theoretical and Practical Training**

The course syllabus for the LACT program covers both theoretical and practical training and includes the following online training courses and in-classroom courses:

### Theoretical and Administrative Courses

1  Air Cargo Security Awareness
2  Facility Security and Access Control
3  Air Cargo Screening (Theory)
4  Chain of Custody (Record Keeping)
5  Training Program
6  Oversight, Compliance, and Personnel Security

### Practical Courses

1  Practical X-Ray Screening for Air Cargo
2  Practical Explosive Trace Detection (ETD) Screening for Air Cargo
3  Facility and Vehicle Search
4  Telephone Threat and Managing a Bomb Threat
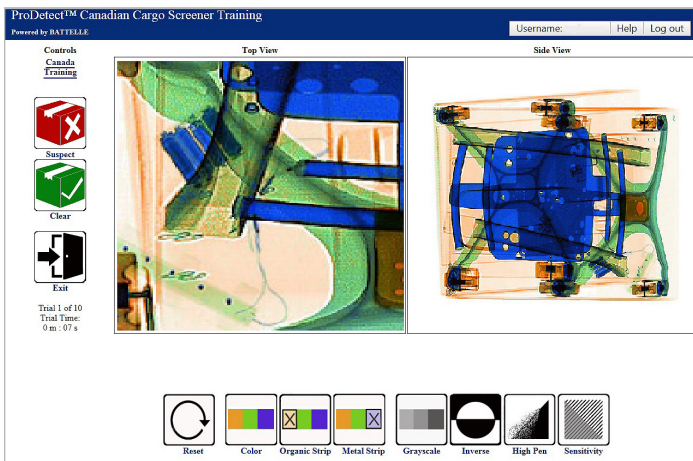
## Battelle
### The Business of Innovation

# The ProDetect™ security screener training portion of the LACT program is divided into two courses, covering the following content:

**Explosive Trace Detection** – This ProDetect™ course provides trainees with background information regarding aviation security and how to use Explosives Trace Detection (ETD). Specific topics include: an understanding of the importance of air cargo screening and the role ETD systems play in air cargo screening; an operational understanding of ETD systems; safety and maintenance of ETD systems; ETD standard operating procedures; and, other important points for air cargo ETD screening. This course provides a qualification test relative to ETD screening.
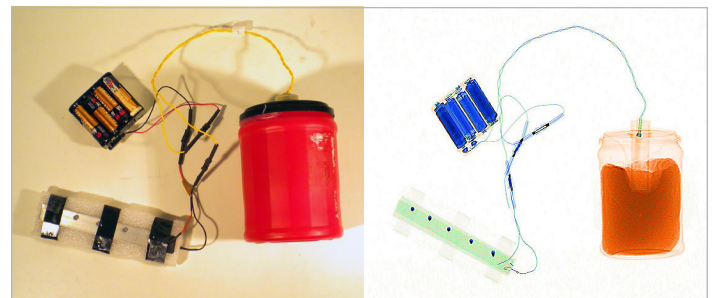
**X-ray Screening** – The ProDetect™ X-ray screening course provides background information and practical simulations. Background information includes: introduction and overview; X-ray safety and operation; improvised explosive device (IED) recognition; AT X-ray image interpretation; X-ray primary screening and secondary screening standard operating procedures (SOPs); palletized/skidded cargo screening procedures; and, screener effectiveness issues. In addition, this course includes two practical training exercises.

**Interactive IED Recognition Module** – This ProDetect™ X-ray Screening software module provides practical exercises for identifying the different elements that can be used to make an IED. The self-paced, interactive virtual IED training allows trainees to familiarize themselves with examples of the four components that make up an IED, select IED components, and virtually construct an IED with these elements. The individual components and the constructed IED are presented both as photographs and as X-ray images to further assist the trainee in identifying realistic IED threats.

**Image Interpretation Training (IIT) Module** – Once trained on IED recognition, in this ProDetect™ X-ray Screening software module trainees can apply this knowledge through simulated screening with real X-ray images of typical air cargo, some of which contain hidden IEDs. Trainees must "suspect" or "clear" each cargo item, following Canadian screening protocols. Trainees will receive feedback about the accuracy of their choices after each image, including the specific location of any IEDs in that image. The IIT interface includes highly-realistic X-ray controls including zoom, false coloration, organic strip, and high penetration – among others – to simulate the cargo screening experience they will have with their facility's screening system. The IIT X-ray Screening software module provides a practical qualification test.



**ProDetect™ Image Interpretation Training (IIT) Module**



**ProDetect™ Interactive IED Recognition Module**

**Learn more**

Lansdowne and Battelle invite you to visit the LACT website (**www.lact.ca**) in 2015 to learn more. Get a jump start on compliance with the new Air Cargo Security regulatory framework by enrolling in the Lansdowne LACT training system today.

**613-236-3333 | www.lact.ca**

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