## DOT Third Party Test Laboratories Evaluation Criteria for Third Party Approval for testing EXPLOSIVES

- 1. Application
  - a. Submitted in accordance with 49 CFR subpart H (107.701-107.717).
- 2. Qualifications
  - a. Personnel
    - i. Work History To include at least ten years of experience in the examination, testing and evaluation of explosives
      - 1. Detailed knowledge of and history with UN Manual of Tests and Criteria
    - ii. Certification Statement Does not manufacture or market explosives, and is not controlled by or financially dependent on any entity that manufactures or markets explosives, and whose work is limited to examination, testing, and evaluation
    - iii. Proof of U.S. residency
    - b. Test Equipment (own or ready access to)
      - i. Drop Weight Impact Sensitivity Test (Test Method 3(a)(i))
      - ii. Friction Sensitivity Test (Test Method 3(b)(iii))
      - iii. Thermal Stability Test (Test Method 3(c)) @ 75 °F
      - iv. Small-Scale Burning Test (Test Method 3(d)(i))
      - v. Thermal Stability Test for Unpackaged Articles and Packaged Articles (Test Method 4(a))
      - vi. Twelve Meter Drop Test (Test Method 4(b)(ii))
    - c. Spatial Requirements area(s) to conduct the following tests including federal, state, and local permitting requirements (own or ready access to):
      - i. Single Package Test (Test Method 6(a))
      - ii. Stack Test (Test Method 6(b))
      - iii. External Fire Test (Test Method 6(c))
      - iv. Unconfined Single Package Test (Test Method 6(d))
      - v. Cap Sensitivity Test (Test Method 5(a)
      - vi. DDT Test (Test Method 5(b)(ii))
      - vii. External Fire Test (Test Method 5(c))
      - viii. Princess Incendiary Spark Test (Test Method 5(d))
      - ix. EIDS Cap Test (Test Method 7(a))
      - x. EIDS Gap Test (Test Method 7(b))
      - xi. Susan Test (Test Method 7(c)(i))
      - xii. EIDS Bullet Impact Test (Test Method 7(d)(i))
      - xiii. EIDS External Fire Test (Test Method 7(e))
      - xiv. EIDS Slow Cook-Off Test (Test Method 7(f))
      - xv. UN Test Series 8
- 3. Obligations/Requirements

a. Test Procedures – testing shall be witnessed by the explosives expert identified within the DOT/PHMSA application/approval. Testing and recommendations shall be based on specified criteria:

- i. The U.S. Hazardous Materials Regulations
- ii. The UN Manual of Tests and Criteria
- iii. DOT/PHMSA policies and procedures
- b. Data Storage must be stored in a readily accessible location for 10 years:
  - i. Data shall include all applicable testing records including but not limited to notes, videotapes, photographs, etc.
  - ii. All data should be dated and signed by the explosives expert
  - iii. Access DOT shall have access to all past or current examination records upon request

## DOT Third Party Test Laboratories Evaluation Criteria for Third Party Approval for testing EXPLOSIVES

- c. Equipment Certifications
  - i. Present and current for all applicable equipment
  - ii. Certification Process/Procedures must be documented and available to DOT/PHMSA upon request
  - iii. Re-certification Intervals
- d. Personnel Training and Experience Records
  - i. Present and current for explosives experts and applicable staff in accordance with 49 CFR Subpart H
  - ii. Records shall be documented and available to DOT/PHMSA upon request
- e. Laboratory Immediate notification to DOT/PHMSA of any of the following:
  - i. Changes in ownership of the laboratory
  - ii. Changes in staff who are authorized to sign recommendation letters to DOT
  - iii. Changes in personal or financial relationship of staff or owner(s) with an entity who manufactures or markets explosives
- f. Incident Reporting Immediate notification to DOT/PHMSA of any of the following:
  - i. Accidental incident (i.e. fire, explosion, etc.) during testing being performed in conjunction with DOT classification
  - ii. Any incident involving the storage of explosives
- g. Meeting Commitment explosive experts shall agree to attend any and all general meetings as requested by DOT/PHMSA
- h. Testing Standard Operating Procedures (SOPs)
  - i. Each lab shall maintain SOPs for the tests that are conducted including but not limited to safe handling and proper disposal procedures
- 4. Site Visit
  - a. DOT/PHMSA will perform an initial site visit to audit the capability of the requesting explosive test lab prior to granting an approval
    - i. The Office of Hazardous Materials Approvals and Permits will coordinate appropriate representation to include experts from the Offices of Hazardous Materials Engineering and Research and Field Operations as required
  - b. Compliance audits during the period of the approval will be in accordance with established Office of Hazardous Materials Field Operations policy
    - i. The Office of Hazardous Materials Field Operations will coordinate appropriate representation to include experts from the Offices of Hazardous Materials Approvals and Permits and Engineering and Research as required
- 5. Renewal
  - a. Length of Approval approvals shall be valid for no more than 5 years
  - b. Renewal Process
    - i. The approval holder shall request renewal in accordance with 49 CFR Part 107 Subpart H
    - ii. DOT/PHMSA will evaluate the renewal application in accordance with office standard operating procedures
      - 1. Application completeness
      - 2. Safety fitness
      - 3. Technical evaluation
      - 4. Site visit as required