

# Status of SAE AS8992

## Fire Resistant Containers

Presented to: International Aircraft Materials &  
Systems Forum Meeting

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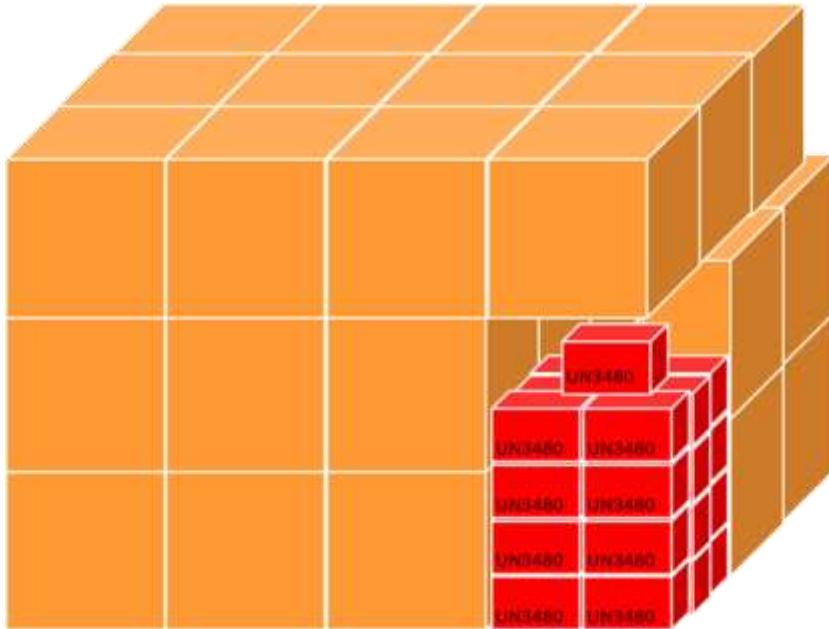
**Federal Aviation  
Administration**

# Background

Fire Safety Branch aids in the development of test standards through the SAE process.

- AS8992: Fire Resistant Container Design, Performance, and Testing Requirements
  - Standard referenced in FAA TSO-C90e
- AS 6453A: Fire Containment Cover: Design, Performance, and Testing Requirements
  - Standard referenced in FAA TSO-C203

# Current Status



- Current Standard includes a class-A fire load
- Battery Fire Working Group working to include an additional battery fire load
  - Combination of class-A fire load and bulk packages of lithium-ion cells.

# FAA Input to AS 8992 for consideration

- **FAA is concerned the number of operational levels will confuse operators - consider the following framework instead:**
- **Level 1: Batteries in Equipment – Class A Fire container test + Oil Burner [FAA R&D can validate]**
- **Level 2: Replicate ion battery fire + Plus Oil Burner**
  - Burner Methodology in lieu of battery fire (Technical Center developing)
  - Testing actual batteries (not preferred by FAA)
  - Either method should account for explosion hazard
  - Important to address a valid minimum State of Charge (SOC)
- **Level 3: Metals + Projectile/Ballistic Standards (future)**
- **External Fire: Industry choice at this time**

# Development of ARP and AIR

- **SAE should develop an ARP and AIR**
  - ARP for Translation to Operational Use
  - AIR for Background on both FCC and FRC standards development
- **ARP or AIR can be referred to in FAA-published materials such as:**
  - Cargo Websites (Technical Center + faa.gov)
  - AC 120-121 Cargo Risk Assessment
  - AC 120-85B Cargo Operations
  - AFX 8900.1 Inspector Guidance
  - Responsive to NTSB Safety Recommendations



# Questions?

