Government-Industry Data Exchange Program (GIDEP) and NASA Advisories

Policy to Practice

Presentation for NASA Supply Chain 2010

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Overview

• Purpose of the Government-Industry Data Exchange Program (GIDEP)
• NASA and GSFC Documentation
• NASA Advisories, differences from GIDEP
• GIDEP Distribution by Originator
• New Interim GIDEP Policy for Suspect Counterfeits
• NASA and Suspect Counterfeits
• Threats to GIDEP
• Conclusions and Contact Information

Lunar Reconnaissance Orbiter (LRO), Built at GSFC, Launched with LCROSS, June 18, 2009
PURPOSE: Reduce or eliminate unnecessary resource expenditures by sharing existing information between government and industry participants.
• **NPR 8735.1B** Procedures for Exchanging Parts, Materials, and Safety Problem Data Utilizing the Government-Industry Data Exchange Program and NASA Advisories.
  - Requires ALL NASA Centers Participate in GIDEP
  - AND Have a Process to Issue NASA Advisories
  - AND Have a Closed Loop Disposition Process
  - AND Program and Project Managers shall ensure all significant parts, material and safety problems of general concern are identified and communicated via GIDEP documents or NASA Advisories

• **GPG 5340.3F** Preparation and Handling of Alerts, Safe-Alerts and Advisories.
  - Implements NPR 8735.1 at GSFC
NASA Advisory

• NASA Advisories differ from GIDEPs
  – Intended for use by NASA and its contractors
  – May reflect space flight unique issues
  – Can be for information only
  – May cover NASA-specific lessons learned

• Each Center and HQ issue their own Advisories

• GSFC Advisories
  – Less restrictive distribution statement than other Centers’
  – Cleared by GSFC legal for public domain (in US)
  – Reviewed by Export Control so they can be shared with foreign partners
GSFC Examples

NA-GSFC-

2010-02  ESD Flooring
2010-01  Vinyl Grounding Boots for Cleanroom ESD Groundable Garments
2009-01  Vibration Overtest During Sine Burst
2008-02  Diode Availability Issues
2008-01  Compact Peripheral Interconnect (cPCI) Backplane: Avoidance of Tantalum Capacitors in Hot Swap Circuitry to Prevent Unnecessary Failures
2007-01  Metallized Plastic Film Capacitors – Things You Should Know
2006-01  DPAs on Field Programmable Gate Arrays (FPGAs) and Non-Volatile Memory Devices, Failure Reports, and Lessons Learned
2005-05  Latent Damage: Test and Analysis Practice for Managing Risks
2005-04  Application of Hitachi 1-Mbit Die Based EEPROM Technology to Space Applications
• Per the GIDEP Manual, “Distribution beyond participant’s organization must comply with GIDEP’s Distribution policy or be approved by the originator of the data.”

• The Alert Coordinator obtains Export Control authorization on GSFC initiated GIDEP documents; therefore, the Alert Coordinator has the capability of distributing these GIDEP documents, to international entities such as overseas manufacturing facilities.
New Interim GIDEP Policy
(Suspect Counterfeit)

• “Reporting Suspect Counterfeit Parts and Materials”
  – Issued 9/15/10, Expires 12/15/10

• “This guidance is being provided to facilitate and encourage the reporting of suspect counterfeits …”

• Eliminates requirement to identify supplier of the suspect counterfeit item in Alerts and Problem Advisories, avoiding legal concerns

• Allows “withheld” to be entered in boxes for “Supplier” information (16, 17 and 18)

• Requires category of supplier: Original Component Manufacturer, Franchised Distributor etc., be recorded in Box 19. Problem Description

• An initial list of 153 Alerts has been captured in NA-JSC-2011-01, to reduce “closed loop” impact to NASA

• “This interim guidance will only be exercised where absolutely necessary …”
FY11 NASA Authorization Bill S.3729 –
- Express language to address counterfeit electronic parts
- “The Administrator shall plan, develop, and implement a program …”

Requires:
- Coordination with other federal agencies
- Database to document and track incidents (GIDEP?)
- Relevant training for selection, procurement etc.
- Public release of information on incidents
- “Amend existing acquisition and procurement policy to purchase electronic parts from trusted or approved manufacturers”
- A list and criteria to support previous bullet

Administrator to report out in one year
Threats to GIDEP

• Apathy and excuses
  – Legal concerns are unjustified
  – If it’s a problem someone else will do an alert

• Internal alert processes
  – Preserve competitive advantage
  – Fulfill ethical obligation
  – Must be a process to transition some to GIDEP

• Manufacturer recall letter
  – Ineffective

• Letting the Supplier issue the alert
  – May never get around to it
  – May be weak
GIDEP Use in Decline?

GIDEPs Issued by Year by 11 Primes FY2000 to FY2010
GIDEP Activity for 11 Primes
FY2000 to FY2010
In Conclusion, GIDEP is a Resource

- Alerts, Safe-Alerts, Advisories, and Agency Action Notices are free. These documents are very helpful in ensuring mission success.
- GSFC NASA Advisories are freely distributed with no distribution restrictions. GSFC NASA Advisories capture valuable Lessons Learned.
- Obtain free calibration reports to maintain equipment calibration.
- Engineering and Reliability-Maintainability reports are available.
- Utilize Urgent Data Requests to locate surplus parts and materials.
- Urgent Data Requests also can be used to request failure experience data.
- Free reports are also available on Lessons Learned, DMSMS, and Product Change and Product Information Notices.
The Alert Process is Two-Way

- Almost Every Project in NASA Will Benefit from the Information Provided by GIDEP Documents and NASA Advisories
- We Have A Legal and Ethical Requirement to Contribute Our Lessons Learned
- So Please Do Your Part and Report Candidate Incidents or Experiences
- We Will Make it Easy
Contact Us

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