

Counterfeit Prevention, Detection and Avoidance Standards Gap Analysis for Hardware Products

Standard	Scope	DoD Adopted	USER				Product Traceability	Risk Mitigation	Procurement Practices	Verification / Detection	Containment / Disposition	Reporting	Obsolescence Management	Comments
			SI	OEM	CD	OCM								
International Organization for Standardization (ISO) ...														
ISO 9001 Quality Management Systems - Requirements	Parts, Materials, Assemblies and Equipment	17-Apr-01	X	X	X	X								Does not cover counterfeit prevention, detection and avoidance elements
ISO/IEC 20243:2015 - Information Technology — Open Trusted Technology Provider™ Standard (O-TTPS) — Mitigating maliciously tainted and counterfeit products	COTS ICT Products		X	X										Includes very high level, nonspecific "counterfeit mitigation" practices.
SAE International ...														
SAE AS9100 Quality Systems – Aerospace – Model for Quality Assurance in Design, Development, Production, Installation and Servicing	Parts, Materials, Assemblies and Equipment	1-Mar-02	X	X	X	X								Does not cover counterfeit prevention, detection and avoidance elements
SAE AS9120 Quality Management Systems – Aerospace Requirements for Stockist Distributors	Parts, Materials and Assemblies				X			X						General requirement to "prevent the purchase of counterfeit/suspect unapproved products." No criteria.
SAE AS9003 Inspection and Test Quality System	Electronic Parts		X	X	X	X								Does not cover counterfeit prevention, detection and avoidance elements
SAE AS5553 Counterfeit Electronic Parts; Avoidance, Detection, Mitigation, and Disposition	Electronic Parts	22-Aug-09	X	X			X	X	X	X	X	X	X	Released April 2009 Revised January 2013 Comprehensive coverage for all elements
SAE AS6174 Counterfeit Materiel; Assuring Acquisition of Authentic and Conforming Materiel	Parts and materials	17-Jun-13	X	X			X	X	X	X	X	X		Released May 2012; Revised July 2014
SAE AS6496 - Fraudulent/Counterfeit Electronic Parts: Avoidance, Detection, Mitigation, and Disposition - Authorized/Franchised Distribution	Electronic Parts				X		X		X		X	X		Released August 2014.
SAE AS6081 Fraudulent/Counterfeit Electronic Parts: Avoidance, Detection, Mitigation, and Disposition – Distributors	Electronic Parts	10-Jun-13			X		X		X	X	X	X		Released November 2012
ARP6178 Fraudulent/Counterfeit Electronic Parts; Tool for Risk Assessment of Distributors	Electronic Parts				X		X		X	X	X	X		Released December 2011

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AS6462 AS5553, Counterfeit Electronic Parts; Avoidance, Detection, Mitigation, and Disposition Verification Criteria	Electronic Parts	27-May-14	X	X				X	X	X	X	X	X	X	Released November 2012								
AS6886, Counterfeit Materiel; Assuring Acquisition and Use of Authentic and Conforming Refrigerant	Refrigerant		X	X				X		X	X		X		Released June 2015								
AS6301 AS6081, Fraudulent/Counterfeit Electronic Parts: Avoidance, Detection, Mitigation, and Disposition – Distributors Verification Criteria	Electronic Parts		X	X	X			X		X	X	X	X		Work In Progress								
<i>Proposed</i> AS6171 Test Methods Standard; Counterfeit Electronic Parts	Electronic Parts		X	X	X						X				Work In Progress								
<i>Proposed</i> ARP6328 Guideline for Development of Counterfeit Electronic Parts; Avoidance, Detection, Mitigation, and Disposition Systems	Electronic Parts		X	X				X	X	X	X	X	X	X	Work In Progress								
<i>Proposed</i> AIR6273 Terms and Definitions - Fraudulent/Counterfeit Electronic Parts	Electronic Parts		X	X	X	X									Work In Progress								
SAE (formerly TechAmerica, GEIA, EIA, etc)																							
SAE-TB-0003 Counterfeit Parts & Materials Risk Mitigation	Parts and materials		X	X				X	X	X	X	X	X	X	Released February 2009. High level guidance								
EIA-4899 Standard for Preparing an Electronic Components Management Plan	Electronic Parts		X	X										X									
EIA-933 Standard for Preparing a COTS Assembly Management Plan	Assemblies		X	X						X	X			X	Rev A requires a "Counterfeit Electronic Parts Control Plan" for flight critical assemblies								
ANSI STD-0016 Standard for Preparing a DMSMS Management Plan	Parts, Materials and Assemblies													X	Replaces EIA-GEB1								
Federal Aviation Administration (FAA) ...																							
FAA AC 00-56 Voluntary Industry Distributor Accreditation Program	Parts, Materials and Assemblies				X			X							Does not cover counterfeit prevention, detection and avoidance elements other than 'Product Traceability'								

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Aerospace Corp ... AEROSPACE TOR-2014-02200 Counterfeit Parts Prevention Strategies Guide	Electronic Parts		X	X			X	X	X	X	X	X	X	Released June 2014 Comprehensive coverage for all elements
JEDEC ... JESD31 General Requirements for Distributors of Commercial and Military Semiconductor Devices	Semiconductor Components	22-Aug-11			X		X							Traceability and C of C requirements for military semiconductor devices only.
JESDXXX (proposed) Counterfeit Electronic Parts: Avoidance, Detection, Mitigation, and Disposition for Manufacturers	Semiconductor Components					X		X	X	X				
US Department of Defense ... MIL-STD-3018 Department of Defense Standard Practice, Parts Management	Electronic, electrical, and mechanical parts		X	X			X	X	X	X	X	X	X	"B.5.2 Counterfeit parts. The parts management plan shall address the detection, mitigation, and disposition of counterfeit parts"
MIL-STD-11991A Department of Defense Standard Practice, General Standard for Parts, Materials, and Processes			X	X			X	X	X	X	X	X	X	"Reinstated after 26 AUGUST 2015..." See Appendix C "Prohibited PM&P"
Semiconductor Equipment and Materials International (SEMI) ... SEMI T20-0710 Specification for Authentication of Semiconductors and Related Products	Semiconductor Components					X	X							Defines a mechanism authenticate a product within the supply chain.
SEMI T20.1-1109 Specification for Object Labeling to Authenticate Semiconductors and Related Products In An Open Market	Semiconductor Components					X	X							Subordinate to SEMI T20-0710
SEMI T20.2-1109 Guide for Qualifications of Authentication Service Bodies for Detecting and Preventing Counterfeiting Of Semiconductors and Related Products	Semiconductor Components					X	X							Subordinate to SEMI T20-0710
Electronic Components, Assemblies and Materials Association (ECA) ... EIA/ECA-CB21 Counterfeit Passive Components	Passive Components		X	X						X	X			High level guidance

