

Irish Standard I.S. EN IEC 62668-2:2019

Process management for avionics -Counterfeit prevention - Part 2: Managing electronic components from nonfranchised sources

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#### I.S. EN IEC 62668-2:2019

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I.S. EN IEC 62668-2:2019 is the adopted Irish version of the European Document EN IEC 62668-2:2019, Process management for avionics - Counterfeit prevention - Part 2: Managing electronic components from non-franchised sources

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**EN IEC 62668-2** 

NORME EUROPÉENNE

**EUROPÄISCHE NORM** 

September 2019

ICS 03.100.50; 31.020; 49.060

#### **English Version**

Process management for avionics - Counterfeit prevention - Part 2: Managing electronic components from non-franchised sources (IEC 62668-2:2019)

Gestion des processus pour l'avionique - Prévention de la contrefaçon - Partie 2: Gestion des composants électroniques achetés auprès de sources non franchisées (IEC 62668-2:2019)

Luftfahrtelektronik-Prozessmanagement - Verhinderung von Produktfälschung - Teil 2: Handhabung von elektronischen Bauelementen nichtkonzessionierter Herkunft (IEC 62668-2:2019)

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CEN-CENELEC Management Centre: Rue de la Science 23, B-1040 Brussels

#### EN IEC 62668-2:2019 (E)

#### **European foreword**

The text of document 107/353/FDIS, future edition 1 of IEC 62668-2, prepared by IEC/TC 107 "Process management for avionics" was submitted to the IEC-CENELEC parallel vote and approved by CENELEC as EN IEC 62668-2:2019.

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IEC 60068-2-1	NOTE	Harmonized as EN 60068-2-1
IEC 60068-2-30	NOTE	Harmonized as EN 60068-2-30
IEC 60115-8	NOTE	Harmonized as EN 60115-8

EN IEC 62668-2:2019 (E)

#### **Annex ZA**

(normative)

# Normative references to international publications with their corresponding European publications

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NOTE 2 Up-to-date information on the latest versions of the European Standards listed in this annex is available here: www.cenelec.eu.

<u>Publication</u>	<u>Year</u>	<u>Title</u>	EN/HD	<u>Year</u>
IEC 62239-1	-	Process management for avionics - Management plan - Part 1: Preparation and maintenance of an electronic components management plan	-	-
IEC 62668-1	2019	Process management for avionics - Counterfeit prevention - Part 1: Avoiding the use of counterfeit, fraudulent and recycled electronic components	-	-

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IEC 62668-2

Edition 1.0 2019-07

# INTERNATIONAL STANDARD

# NORME INTERNATIONALE



Process management for avionics – Counterfeit prevention – Part 2: Managing electronic components from non-franchised sources

Gestion des processus pour l'avionique – Prévention de la contrefaçon – Partie 2: Gestion des composants électroniques achetés auprès de sources non franchisées





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IEC 62668-2

Edition 1.0 2019-07

# INTERNATIONAL STANDARD

# NORME INTERNATIONALE



Process management for avionics – Counterfeit prevention – Part 2: Managing electronic components from non-franchised sources

Gestion des processus pour l'avionique – Prévention de la contrefaçon – Partie 2: Gestion des composants électroniques achetés auprès de sources non franchisées

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#### INTERNATIONAL ELECTROTECHNICAL COMMISSION

## PROCESS MANAGEMENT FOR AVIONICS – COUNTERFEIT PREVENTION –

### Part 2: Managing electronic components from non-franchised sources

#### **FOREWORD**

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International Standard IEC 62668-2 has been prepared by IEC technical committee 107: Process management for avionics.

This first edition cancels and replaces the second edition of IEC TS 62668-2 published in 2016. This edition constitutes a technical revision.

This edition includes the following significant technical changes with respect to the second edition of IEC TS 62668-2:

- a) updates to the risk assessment process, including reference to SAE AS6081;
- b) updates to the test methods, including reference to the SAE AS6171 test methods published and in development;
- c) updates in line with IEC 62668-1 for definitions and references to DFARS.

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This International Standard is to be used in conjunction with IEC 62239-1 and IEC 62668-1.

The text of this International Standard is based on the following documents:

FDIS	Report on voting
107/353/FDIS	107/359/RVD

Full information on the voting for the approval of this International Standard can be found in the report on voting indicated in the above table.

This document has been drafted in accordance with the ISO/IEC Directives, Part 2.

A list of all the parts in the IEC 62668 series, published under the general title *Process management for avionics – Counterfeit prevention*, can be found on the IEC website.

The committee has decided that the contents of this document will remain unchanged until the stability date indicated on the IEC website under "http://webstore.iec.ch" in the data related to the specific document. At this date, the document will be

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#### INTRODUCTION

The avionics industry has a responsibility to ensure that all flight equipment produced has a predicted product life which correlates with the predicted repair and service life to ensure the public is not endangered. Typically, an original equipment manufacturer (OEM) calculates a mean time between failure (MTBF) and possibly a mean time to failure (MTTF) prediction. These calculations assume all components are new, or considered as "unused", at the point of introduction into flight use and that no useful component life and/or any "unsafe" component conditions have been used. It is therefore essential that counterfeit, recycled and fraudulent components which have had potentially some of their "useful life" consumed and which can also be malfunctioning are not purchased for use in aerospace, defence and high performance (ADHP) industries.

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### PROCESS MANAGEMENT FOR AVIONICS – COUNTERFEIT PREVENTION –

## Part 2: Managing electronic components from non-franchised sources

#### 1 Scope

This part of IEC 62668, defines requirements for avoiding the use of counterfeit, recycled and fraudulent components when these components are not purchased from the original component manufacturer (OCM) or are purchased from outside of franchised distributor networks for use in the aerospace, defence and high performance (ADHP) industries. This practice is used, as derogation, only when there are no reasonable or practical alternatives.

NOTE Typically this document is used in conjunction with IEC 62239-1 and IEC 62668-1, enabling ADHP industries to manage and avoid the use of counterfeit, recycled and fraudulent components in their supply chains.

Although developed for the ADHP industry, this document can be used by other high-performance and high-reliability industries, at their discretion.

#### 2 Normative references

The following documents are referred to in the text in such a way that some or all of their content constitutes requirements of this document. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

IEC 62239-1, Process management for avionics – Management plan – Part 1: Preparation and maintenance of an electronic components management plan

IEC 62668-1:2019, Process management for avionics – Counterfeit prevention – Part 1: Avoiding the use of counterfeit, fraudulent and recycled electronic components

#### 3 Terms, definitions and abbreviated terms

#### 3.1 Terms and definitions

For the purposes of this document, the following terms and definitions apply.

ISO and IEC maintain terminological databases for use in standardization at the following addresses:

- IEC Electropedia: available at http://www.electropedia.org/
- ISO Online browsing platform: available at http://www.iso.org/obp

#### 3.1.1

#### aftermarket source

reseller which may or may not be under contract with the original component manufacturer (OCM) or is sometimes a component "re-manufacturer", under contract with the OCM

Note 1 to entry: The reseller accumulates inventories of encapsulated or non-encapsulated components (wafer and/or die) whose end of life date has been published by the OCM. These components are then resold at a profit to fill a need within the market for components that have become obsolete.

[SOURCE: IEC 62668-1:2019, 3.1.1]



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