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ACE/065 Non-metallic materials for aerospace purposes

Interested committees:

Title: Draft BS EN 2133 Aerospace series — Cadmium plating of steels with specified tensile strength $\leq 1\,450$ MPa, copper, copper alloys and nickel alloys

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Introduction

This draft standard is based on European discussions in which the UK has taken an active part. Your comments on this draft are welcome and will assist in the preparation of the consequent British Standard. Comment is particularly welcome on national, legislative or similar deviations that may be necessary.

Even if this draft standard is not approved by the UK, if it receives the necessary support in Europe, the UK will be obliged to publish the official English Language text unchanged as a British Standard and to withdraw any conflicting standard.

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Please indicate whether you consider the UK should submit a negative (with reasons) or positive vote on this draft.

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Template for comments and secretariat observations

Date: xx/xx/20xx	Document: ISO/DIS xxxx
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1	2	(3)	4	5	(6)	(7)
MB	Clause No./ Subclause No./Annex (e.g. 3.1)	Paragraph/ Figure/ Table/Note	Type of comment	Comment (justification for change) by the MB	Proposed change by the MB	Secretariat observations on each comment submitted
	3.1	Definition 1	ed	Definition is ambiguous and needs clarifying.	Amend to read '...so that the mains connector to which no connection...'	
	6.4	Paragraph 2	te	The use of the UV photometer as an alternative cannot be supported as serious problems have been encountered in its use in the UK.	Delete reference to UV photometer.	

ASD/TC xxx

Date: 2010-08

EN 2133:2010

ASD/TC xxx

Secretariat: xxx

Aerospace series — Cadmium plating of steels with specified tensile strength $\leq 1\,450$ MPa, copper, copper alloys and nickel alloys

Luft- und Raumfahrt — Kadmieren von Stählen mit einer Zugfestigkeit $\leq 1\,450$ MPa, von Kupfer, von Kupferlegierungen und von Nickellegierungen

Série aérospatiale — Cadmiage électrolytique des aciers de résistance $\leq 1\,450$ MPa, du cuivre, des alliages de cuivre et des alliages de nickel

ICS: 49.040.40

Descriptors:

	Comments of the experts
	Suppressions proposed after the NWP result, in July 2017
	Additions proposed after the NWP result, in July 2017

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Foreword

This document (EN 2133:2010) has been prepared by the Aerospace and Defence Industries Association of Europe - Standardization (ASD-STAN).

After enquiries and votes carried out in accordance with the rules of this Association, this Standard has received the approval of the National Associations and the Official Services of the member countries of ASD, prior to its presentation to CEN.

This European Standard shall be given the status of a national standard, either by publication of an identical text or by endorsement, at the latest by April 2011, and conflicting national standards shall be withdrawn at the latest by April 2011.

Attention is drawn to the possibility that some of the elements of this document may be the subject of patent rights. CEN [and/or CENELEC] shall not be held responsible for identifying any or all such patent rights.

This document supersedes EN 2133:[1997-2011](#)

According to the CEN/CENELEC Internal Regulations, the national standards organizations of the following countries are bound to implement this European Standard: Austria, Belgium, Bulgaria, Croatia, Cyprus, Czech Republic, Denmark, Estonia, Finland, France, Germany, Greece, Hungary, Iceland, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, Netherlands, Norway, Poland, Portugal, Romania, Slovakia, Slovenia, Spain, Sweden, Switzerland and the United Kingdom.

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1 Scope

This European standard specifies the electrolytic cadmium plating of parts and fasteners in steel of **ultimate** tensile strength **UTS** R_m (max.) $\leq 1\,450$ MPa, copper, copper alloys and nickel alloys, whose temperature in service does not exceed 235 °C.

UK comment : Tensile strength (Rm) has been changed to Ultimate Tensile Strength (UTS) in error.

The correct terminology is Tensile strength (Rm). For example, see EN4700-2 Table 1 Line 14.

2 Normative references

The following referenced documents are indispensable for the application 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.

EN 2828, *Aerospace series — Adhesion test for metallic coatings by burnishing*

EN 2831, *Aerospace series — Hydrogen embrittlement of steels — Test by slow bending*

EN 2832, *Aerospace series — Hydrogen embrittlement of steels — Notched specimen test*

EN 9100, *Quality management systems — Requirements for Aviation, Space and Defense Organizations*

EN ISO 1463, *Metallic and oxide coatings — Measurement of coating thickness — Microscopical method (ISO 1463:2003)*

EN ISO 2082, *Metallic and other inorganic coatings — Electroplated coatings of cadmium with supplementary treatments on iron or steel (ISO 2082:2008)*

EN ISO 2177, *Metallic coatings — Measurement of coating thickness — Coulometric method by anodic dissolution (ISO 2177:2003)*

EN ISO 2178, *Non-magnetic coatings on magnetic substrates — Measurement of coating thickness — Magnetic method (ISO 2178:1982)*

[EN ISO 2409 \(20072013\)](#), *Paints and varnishes -- Cross-cut test*

EN ISO 2819, *Metallic coatings on metallic substrates — Electrodeposited and chemically deposited coatings — Review of methods available for testing adhesion (ISO 2819:1980)*

EN ISO 3497, *Metallic coatings — Measurement of coating thickness — X-ray spectrometric methods (ISO 3497:2000)*

EN ISO 9227, *Corrosion tests in artificial atmospheres — Salt spray tests (ISO 9227:20062012)*

ISO 2859-1, *Sampling procedures for inspection by attributes — Part 1: Sampling schemes indexed by acceptance quality limit (AQL) for lot-by-lot inspection*

ISO 4520, *Chromate conversion coatings on electroplated zinc and cadmium coatings*