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Documentation technique de produits — Données de définition d'un produit



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Case postale 56 • CH-1211 Geneva 20
Tel. + 41 22 749 01 11
Fax + 41 22 749 09 47
E-mail copyright@iso.org
Web www.iso.org

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Foreword

ISO (the International Organization for Standardization) is a worldwide federation of national standards bodies (ISO member bodies). The work of preparing International Standards is normally carried out through ISO technical committees. Each member body interested in a subject for which a technical committee has been established has the right to be represented on that committee. International organizations, governmental and non-governmental, in liaison with ISO, also take part in the work. ISO collaborates closely with the International Electrotechnical Commission (IEC) on all matters of electrotechnical standardization.

International Standards are drafted in accordance with the rules given in the ISO/IEC Directives, Part 2.

The main task of technical committees is to prepare International Standards. Draft International Standards adopted by the technical committees are circulated to the member bodies for voting. Publication as an International Standard requires approval by at least 75 % of the member bodies casting a vote.

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

ISO 16792 was prepared by Technical Committee ISO/TC 10, *Technical product documentation*.

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Introduction

Every effort was made during the preparation of this International Standard — adapted from ASME Y14.41:2003 — to apply existing requirements developed for two-dimensional (2-D) presentation equally to the output from three-dimensional (3-D) models. Where new Geometrical Product Specification (GPS) rules have proved essential, these have been drafted with a view to their being equally applicable to both 2-D and 3-D. Therefore, in order to maintain the integrity of a single system, these new rules are being incorporated in the relevant existing ISO standards for cross-reference. Application examples have been included where, due to the specific requirements of 3-D modelling, additional guidance was deemed beneficial.

It is recognised that there is a need to support drawings in conjunction with 3-D models now and for the foreseeable future. This need has been addressed in this International Standard through the definition of the two methods for documenting digital models and specification of requirements to ensure that the information in a data set is consistent between the model and the drawing.

The figures in this International Standard are intended only as illustrations to aid the user in understanding the practices elaborated in the text. In some cases, figures show a level of detail as needed for emphasis; in others, they are only complete enough to illustrate a concept or facet thereof. The absence of figures has no bearing on the applicability of the specified requirement or practice.

In order to comply with the requirements of this International Standard, actual data sets will need to meet the content requirements set forth in its text.

Most figures are illustrations of models in a 3-D environment. Figures illustrating drawings in digital format include a border.

Text in uppercase letters used in the figures are intended to appear in digital product definition data, or data sets; while that in lowercase letters is for information only and is not intended to appear in data sets.