IEC 60423

Edition 3.0 2007-08

INTERNATIONAL STANDARD

NORME INTERNATIONALE

Conduit systems for cable management – Outside diameters of conduits for electrical installations and threads for conduits and fittings

Systèmes de conduits pour la gestion du câblage – Diamètres extérieurs des conduits pour installations électriques et filetages pour conduits et accessoires

IEC 60423:2007

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INTERNATIONAL ELECTROTECHNICAL COMMISSION

COMMISSION ELECTROTECHNIQUE INTERNATIONALE

PRICE CODE
CODE PRIX

M

ICS 29.120.10

ISBN 2-8318-9268-6

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INTERNATIONAL ELECTROTECHNICAL COMMISSION

CONDUIT SYSTEMS FOR CABLE MANAGEMENT – OUTSIDE DIAMETERS OF CONDUITS FOR ELECTRICAL INSTALLATIONS AND THREADS FOR CONDUITS AND FITTINGS

FOREWORD

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International Standard IEC 60423 has been prepared by subcommittee 23A: Cable management systems, of IEC technical committee 23: Electrical accessories.

This third edition cancels and replaces the second edition published in 1993. This edition constitutes a technical revision. The following main changes have been made to the second edition:

– revised figures and tables plus editorial and normative reference updates;
– conduit range increased to 110 mm outside diameter.

The text of this standard is based on the following documents:

FDIS	RVD
23A/541/FDIS	23A/545/RVD

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

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

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

- reconfirmed,
- withdrawn,
- replaced by a revised edition, or
- amended.

INTRODUCTION

The mechanical performance of the threadable parts of the conduit system will be a function of material and wall thickness, which is specified in the appropriate product standard (IEC 61386 series).

CONDUIT SYSTEMS FOR CABLE MANAGEMENT – OUTSIDE DIAMETERS OF CONDUITS FOR ELECTRICAL INSTALLATIONS AND THREADS FOR CONDUITS AND FITTINGS

1 Scope

This International Standard specifies outside diameters for conduits used in electrical installations or in communication systems and the dimensional requirements for threads. It also specifies the dimensional requirements for threads used in associated fittings.

It is not applicable to extra heavy-duty electrical rigid steel conduits specified in IEC 60981.

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.

ISO 68-1:1998, *ISO general purpose screw threads – Basic profile – Part 1: Metric screw threads*

ISO 965-1:1998, *ISO general-purpose metric threads – Tolerances – Part 1: Principles and basic data*

ISO 1502:1996, *ISO general-purpose metric screw threads – Gauges and gauging*

3 Outside diameters and threads

The outside diameters, tolerances and details of threadable conduit and external and internal metric threads are given in Table 1. Details of the thread form are given in Figure 1, which is based on ISO 68-1 and ISO 965-1. Outside diameters and tolerances of non-threadable conduit are given in Table 2.

4 Gauges

External threads are checked by means of threaded GO ring gauges and plain NO-GO ring gauges specified in ISO 1502.

Internal threads are checked by means of threaded GO plug gauges and plain NO-GO plug gauges specified in ISO 1502.

Outside diameters of threadable conduits are checked by means of GO ring gauges specified in Figure 2 and NO-GO gap gauges specified in Figure 3a for threadable rigid metal conduits, or NO-GO ring gauges specified in Figure 3b for threadable conduits other than rigid metal.