

INTERNATIONAL STANDARD

**ISO
2421**

Second edition
2003-03-01

Coated abrasives — Cylindrical sleeves

Abrasifs appliqués — Manchons cylindriques

STANDARDSISO.COM : Click to view the full PDF of ISO 2421:2003



Reference number
ISO 2421:2003(E)

© ISO 2003

PDF disclaimer

This PDF file may contain embedded typefaces. In accordance with Adobe's licensing policy, this file may be printed or viewed but shall not be edited unless the typefaces which are embedded are licensed to and installed on the computer performing the editing. In downloading this file, parties accept therein the responsibility of not infringing Adobe's licensing policy. The ISO Central Secretariat accepts no liability in this area.

Adobe is a trademark of Adobe Systems Incorporated.

Details of the software products used to create this PDF file can be found in the General Info relative to the file; the PDF-creation parameters were optimized for printing. Every care has been taken to ensure that the file is suitable for use by ISO member bodies. In the unlikely event that a problem relating to it is found, please inform the Central Secretariat at the address given below.

STANDARDSISO.COM : Click to view the full PDF of ISO 2421:2003

© ISO 2003

All rights reserved. Unless otherwise specified, no part of this publication may be reproduced or utilized in any form or by any means, electronic or mechanical, including photocopying and microfilm, without permission in writing from either ISO at the address below or ISO's member body in the country of the requester.

ISO copyright office
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

Published in Switzerland

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 2421 was prepared by Technical Committee ISO/TC 29, *Small tools*, Subcommittee SC 5, *Grinding wheels and abrasives*.

This second edition cancels and replaces the first edition (ISO 2421:1972), which has been technically revised.

Coated abrasives — Cylindrical sleeves

1 Scope

This International Standard specifies dimensions, tolerances and test conditions for cylindrical abrasive sleeves mounted on holding fixtures for hand-held grinding machines in accordance with ISO 15637-1 and stationary grinding machines in accordance with ISO 15637-2.

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 554, *Standard atmospheres for conditioning and/or testing — Specifications*

ISO 15637-1, *Holding fixtures of cylindrical abrasive sleeves — Holding fixtures with shank for hand-held grinding machines*

ISO 15637-2, *Holding fixtures of abrasive sleeves — Holding fixtures for stationary machines*

3 Dimensions

See Figure 1 and Tables 1 and 2.

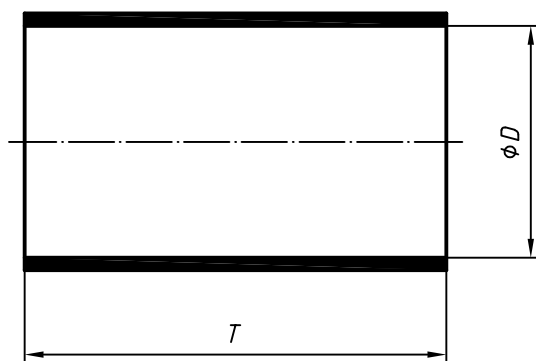


Figure 1 — Cylindrical sleeve

Table 1 — Cylindrical sleeves with $\phi D \leq 100$ mm

Dimensions in millimetres

Nom.	<i>D</i>		<i>T</i> ± 1
	Limit deviations		
	Type A Straight joint method	Type B Spiral joint method	
10	—	0 − 0,2	10
			20
15	—	0 − 0,2	10
			30
22	—	− 0,1 − 0,3	20
			40
30	—	− 0,1 − 0,3	20
			30
			40
			50
45	—	− 0,1 − 0,4	30
			40
			50
60	—	− 0,1 − 0,4	30
			40
			50
75	—	− 0,2 − 0,5	30
			40
			50
100	—	− 0,2 − 0,5	40

Table 2 — Cylindrical sleeves with $\varnothing D > 100$ mm

Dimensions in millimetres

Nom.	<i>D</i>	<i>T</i> ± 2
	Limit deviations Type A Straight joint method	
125	+ 1,6 0	150
		200
150	+ 1,6 0	215
		225
		300
150	+ 1,6 0	150
		200
		250
175	+ 1,85 0	100
		150
		200
		250
200	+ 1,85 0	150
		200
		250
250	+ 1,85 0	150
		200
		250
315	+ 2,1 0	250
		300

4 Test conditions

The limit deviations given in Tables 1 and 2 are valid under the following conditions:

- temperature: $20\text{ }^{\circ}\text{C} \pm 2\text{ }^{\circ}\text{C}$
 - relative humidity: $(65 \pm 5)\%$
- } in accordance with ISO 554

When cylindrical sleeves are tested they shall be stored for at least 24 h under the above conditions.

5 Designation

Cylindrical sleeves conforming to this document shall be designated by

- a) “Cylindrical sleeve”;
- b) reference to this document, i.e., ISO 2421;
- c) Type A or B;
- d) diameter D ;
- e) width T .

EXAMPLE A cylindrical sleeve of Type A, with diameter $D = 45$ mm and width $T = 50$ mm is designated as follows:

Cylindrical sleeve ISO 2421 A 45 × 50

6 Marking

Cylindrical sleeves shall be marked with dimensions D and T , and the name of manufacturer or their registered trademark.

STANDARDSISO.COM : Click to view the full PDF of ISO 2421:2003