
**Tools for pressing — Guide bushes —
Part 10:
Form E, gliding bushes, flanged, type 2**

Outillage de presse — Bagues de guidage —

*Partie 10: Forme E, bagues à collerette à brider pour guidage lisse,
type 2*





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Published in Switzerland

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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.

The procedures used to develop this document and those intended for its further maintenance are described in the ISO/IEC Directives, Part 1. In particular the different approval criteria needed for the different types of ISO documents should be noted. This document was drafted in accordance with the editorial rules of the ISO/IEC Directives, Part 2. www.iso.org/directives

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For an explanation on the meaning of ISO specific terms and expressions related to conformity assessment, as well as information about ISO's adherence to the WTO principles in the Technical Barriers to Trade (TBT) see the following URL: [Foreword - Supplementary information](#)

The committee responsible for this document is ISO/TC 29, *Small tools*, Subcommittee SC 8, *Tools for pressing and moulding*.

This second edition results from the reinstatement of ISO 9448-10:1992, which was withdrawn in 2006 and with which it is technically identical.

ISO 9448 consists of the following parts, under the general title *Tools for pressing — Guide bushes*:

- Part 1: *Forms*
- Part 2: *Form A, gliding bushes, plain, type 1*
- Part 3: *Form B, ball cage bushes, plain, type 1*
- Part 4: *Form C, gliding bushes, headed, type 1*
- Part 5: *Form D, ball cage bushes, headed, type 1*
- Part 6: *Form E, gliding bushes, flanged, type 1*
- Part 7: *Form F, ball cage bushes, flanged, type 1*
- Part 8: *Form G, gliding bushes, stepped, type 1*
- Part 9: *Form B, ball cage bushes, plain, type 2*
- Part 10: *Form E, gliding bushes, flanged, type 2*
- Part 11: *Form F, ball cage bushes, flanged, type 2*

Tools for pressing — Guide bushes —

Part 10:

Form E, gliding bushes, flanged, type 2

1 Scope

This part of ISO 9448 specifies the main dimensions and tolerances, in millimetres, of guide bushes of form E, flanged gliding bushes, type 2, intended for use in press tools with guide pillars with a tolerance on d_1 of g6 according to ISO 9182-3, and to be mounted in the clamp plate with transition fit and fixed to the plate by means of guide clamps.

It gives guidance on the materials, and specifies the hardness and the designation of bushes in accordance with this part of ISO 9448.

2 Normative references

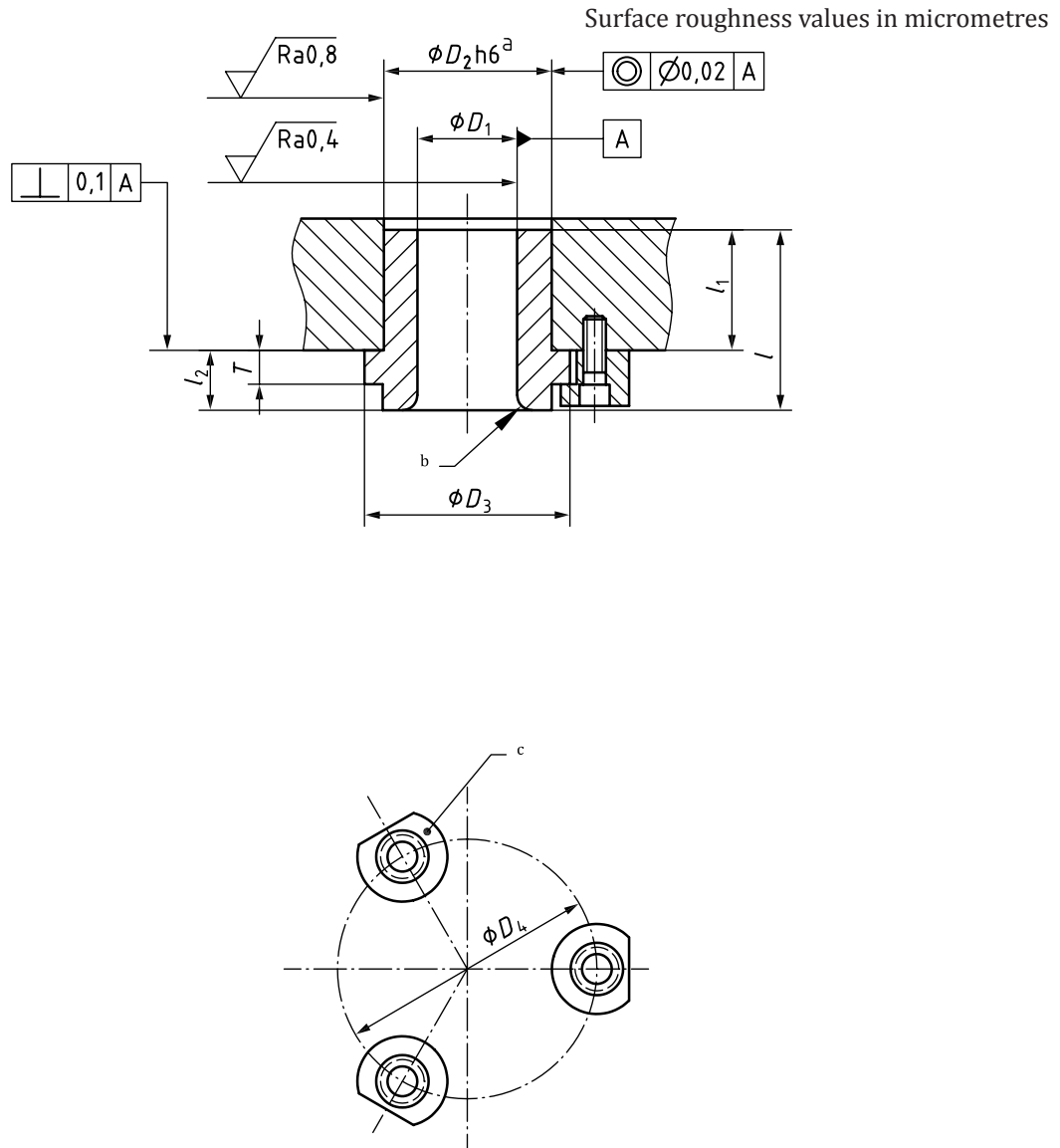
The following documents, in whole or in part, are normatively referenced in this document and are indispensable for its application. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

ISO 9182-3, *Tools for pressing — Guide pillars — Part 3: Type B, end-locking pillars*

3 Dimensions

The dimensions of type 2 flanged gliding bushes (form E) shall conform to the indications of [Figure 1](#) and [Table 1](#).

Details not stated, such as chamfers, radii and lubrication grooves, are left to the manufacturer's discretion.



- a Intended to fit into a hole having a tolerance of H7. When the bushes are glued, tolerance j6 is permitted.
- b The value of the radius is at the manufacturer's discretion.
- c Number of guide clamps at the manufacturer's discretion.

Figure 1 — Form E, flanged gliding bushes, type 2

Table 1

D_1	nom.	25	32	40	50	63	80	100									
	tol.	H7															
D_2 h6 ^a		32	40	50	63	80	100	125									
D_3		40	50	63	71	90	112	140									
D_4	$\pm 0,3$	58	66	79	89	123	143	168									
T	$\pm 0,1$	6,3	6,3	6,3	6,3	10	10	10									
l_1	nom.	l		(l_2)		l		(l_2)		l		(l_2)		l		(l_2)	
	tol.	l	(l_2)	l	(l_2)	l	(l_2)	l	(l_2)	l	(l_2)	l	(l_2)	l	(l_2)		
32	$-2,0$ $-2,5$	40	8														
40	-3 -4			50	12												
50						63	13										
56									71	15							
63											80	17					
80													100	20			
100	-3 -5															125	25

^a When the bushes are glued, tolerance j6 is permitted.

4 Material

The material shall form the subject of agreement between the manufacturer and the user.

5 Designation

A guide bush in accordance with this part of ISO 9448 shall be designated by:

- “Guide bush”;
- a reference to this part of ISO 9448, i.e. ISO 9448-10;
- its form;
- its guiding diameter, D_1 , in millimetres;

EXAMPLE A guide bush of form E, flanged gliding bush, type 2 of guiding diameter $D_1 = 25$ mm is designated as follows:

Guide bush ISO 9448-10 E - 25

Bibliography

- [1] ISO 6508-1, *Metallic materials — Rockwell hardness test — Part 1: Test method*

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ICS 25.120.10

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