

# INTERNATIONAL STANDARD

**ISO**  
**5838-2**

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## Implants for surgery — Skeletal pins and wires —

### Part 2:

**Steinmann skeletal pins — Dimensions**  
**(standards.iteh.ai)**

*Implants chirurgicaux — Fils et broches pour os —*

*Partie 2: Broches de type Steinmann — Dimensions*  
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INTERNATIONAL

ISO



Reference number  
ISO 5838-2:1991(E)

## 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.

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.

International Standard ISO 5838-2 was prepared by Technical Committee ISO/TC 150, *Implants for surgery*.

ISO 5838 consists of the following parts, under the general title *Implants for surgery — Skeletal pins and wires*:

- Part 1: *Material and mechanical requirements*
- Part 2: *Steinmann skeletal pins — Dimensions*
- Part 3: *Kirschner skeletal pins — Dimensions*

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# Implants for surgery — Skeletal pins and wires —

## Part 2:

## Steinmann skeletal pins — Dimensions

### 1 Scope

This part of ISO 5838 specifies the dimensions of Steinmann skeletal pins. Material and mechanical requirements are covered by ISO 5838-1.

NOTE 1 Attention is drawn to the possible need for different designs of points depending on such factors as the method of insertion, and the site of insertion, i.e. whether the bone is cancellous or cortical.

### 2 Dimensions

Dimensions shall be in accordance with figure 1 to figure 5 and table 1 to table 3. All dimensions in this part of ISO 5838 are given in millimetres.

Table 1 — Main dimensions of skeletal pins

Diameter $d$ 0 -0,048	Length $l$ $\pm 2$
3,5	125 to 300
4,5	
5	

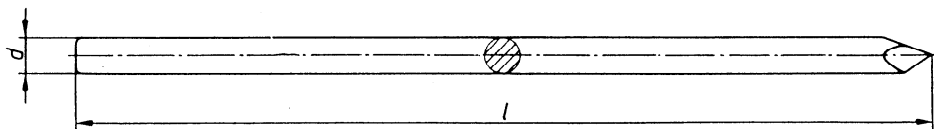


Figure 1 — Main dimensions of skeletal pins

### 3 Ends

#### 3.1 General

One end of the pin shall be formed into a point. The end opposite the point shall comply with one of the forms A, B or C as given in 3.2, 3.3 and 3.4.

NOTE 2 It is recommended that the pointed end is as shown in figure 2.

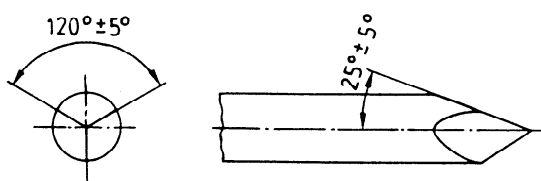


Figure 2 — Recommended point of Steinmann skeletal pin

#### 3.2 Form A — Plain

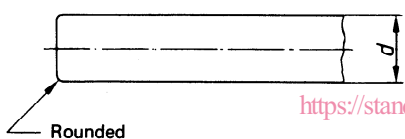


Figure 3 — Form A: Circular end

#### 3.3 Form B — Square

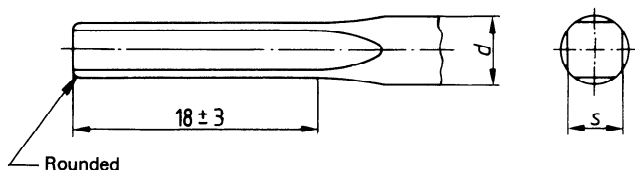


Figure 4 — Form B: Square end

Table 2 — Dimensions of form B end

Diameter $d$	$s$
$\begin{matrix} 0 \\ -0,048 \end{matrix}$	$\begin{matrix} 0 \\ -0,01 \end{matrix}$
3,5	2,7
4	3,15
4,5	3,55
5	4

#### 3.4 Form C — Triangular

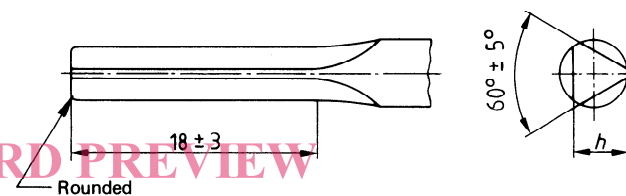


Figure 5 — Triangular end

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Table 3 — Dimensions of form C end

Diameter $d$	$h$
$\begin{matrix} 0 \\ -0,048 \end{matrix}$	$\begin{matrix} 0 \\ -0,01 \end{matrix}$
3,5	3,2
4	3,7
4,5	4,2
5	4,7

### 4 Marking of packages

The length and diameter of Steinmann skeletal pins and the shape of the end (i.e. circular, square, triangular) shall be stated on the packaging.

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Descriptors: medical equipment, surgical implants, surgical pins, dimensions.

Price based on 2 pages