

BUREAU OF INDIAN STANDARDS

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भारतीय मानक मसौदा
हड्डी धरने के लिए फैराब्यूफ पैटर्न चिमटी – विशिष्टि

(IS 7398 का पहला पुनरीक्षण)

Draft Indian Standard

Farabeuf's Pattern Bone Holding Forceps – Specification

(First Revision of IS 7398)

ICS 11.040.40

Orthopaedic Instruments, Implants and
Accessories Sectional Committee, MHD 02

Last date for comments: **18 August 2023**

FOREWORD

(Formal clause will be added later)

This standard was originally published in 1974. The first revision of this standard has been brought out to align the cross references to latest standards.

For the purpose of deciding whether a particular requirement of this standard is complied with the final value, observed or calculated, expressing the result of a test or analysis shall be rounded off in accordance with IS 2: 2022 'Rules for rounding off numerical values (*second revision*)'. The number of significant places retained in the rounded off value should be same as that of the specified value in this standard.

1 SCOPE

The standard specifies dimensions and other requirements for Farabeuf's pattern bone holding forceps, used in orthopaedic surgery.

2 REFERENCES

The standards given below contain provisions which, through reference in this text, constitute provisions of this standard. At the time of publication, the editions indicated were valid. All standards are subject to revision, and parties to agreements based on this standard are encouraged to investigate the possibility of applying the most recent editions of these standards.

<i>IS No.</i>	<i>Title</i>
IS 6603: 2001	Stainless steel bars and flats – Specification (<i>first revision</i>)
IS 7531: 1990	Surgical instruments – Corrosion resistance of stainless-steel surgical instruments – Methods of tests (<i>first revision</i>)

3 MATERIAL

3.1 Arms

The arms of forceps shall be made of stainless steel conforming to Designation X30Cr13 of IS 6603.

3.2 Screws

The screws shall conform to stainless steel of Designation X20Cr13 of IS 6603.

4 SHAPE AND DIMENSIONS

The shape and dimensions shall be as per Fig.1.

5 WORKMANSHIP AND FINISH

5.1 The forceps shall be free from rough edges, pits, burrs, cracks and grinding marks.

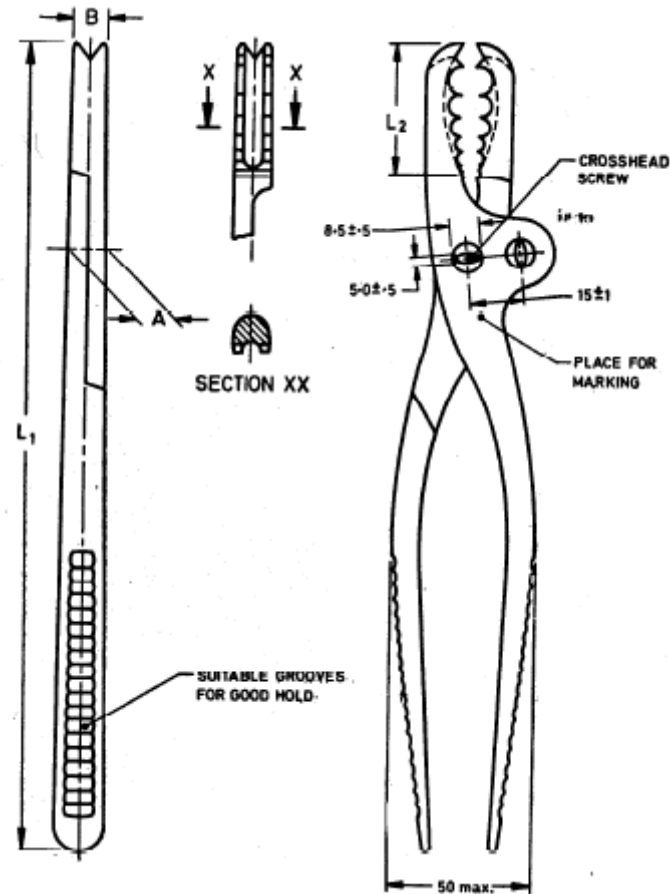
5.2 The teeth on the jaws shall be well formed and clean.

5.3 The two arms shall move freely and smoothly at the joint without any undue play.

5.4 The forceps shall be finished smooth and passivated. The polishing shall be done in accordance with the choice of the consumer.

6 HEAT TREATMENT

The forceps shall be hardened and tempered to give a hardness of 380 to 420 *HV*.



L₁ ±5	L₂ ±5	A ±0.5	B	Weight in g (approx.)
230	35	10.0	9.5 ± 0.5	300
225	40	12.0	11 ± 1	400

All dimensions in millimetres

Fig. 1 FORCEPS, BONE HOLDING, FARABEUFS PATTERN

7 TESTS

7.1 Rigidity

Hold a piece of hardwood, of minimum thickness of 12 mm, in the jaws of the forceps. Apply a compressive force of 1000 N to the handles of the forceps at 20 mm distance from the free end. Allow the force to act for two minutes. On completion of the test, the forceps shall show no sign of damage or permanent set.

7.2 Corrosion Resistance

The forceps shall show no sign of corrosion when tested in accordance with IS 7531.

8 MARKING

8.1 The forceps shall be marked with the manufacturer's name, initials or registered trademark and with the words 'Stainless Steel'.

8.2 BIS Certification Marking

The product(s) conforming to the requirements of this standard may be certified as per the conformity assessment schemes under the provisions of the *Bureau of Indian Standards Act, 2016* and the Rules and Regulations framed thereunder, and the product(s) may be marked with the Standard Mark.

9 PACKING

As agreed to between the purchaser and the supplier.