

Fences —

Part 7: Specification for wooden post and rail fences

ICS 91.090

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Committees responsible for this British Standard

The preparation of this British Standard was entrusted by the Sector Committee for Building and Civil Engineering to Technical Committee B/201, Fences, upon which the following bodies were represented:

- Association of Security Consultants
- British Precast Concrete Federation Ltd.
- Countryside Commission
- County Surveyors' Society
- Department of the Environment, Transport and the Regions (represented by the Building Research Establishment)
- Department of the Environment, Transport and the Regions (Highways Agency)
- European Fencing Industry Association
- Fencing Contractors' Association
- Forestry Commission
- National Farmers' Union
- National Fencing Training Authority
- Security Facilities Executive
- Timber Trade Federation
- UK Steel Association
- United Kingdom Forest Products Association
- Wire Products Association

The following bodies were also represented in the drafting of the standard, through subcommittees and panels:

- British Wood Preserving and Damp-proofing Association
- National Trust
- Ramblers Association
- Timber Research and Development Association

This British Standard, having been prepared under the direction of the Sector Committee for Building and Civil Engineering, was published under the authority of the Standards Committee and comes into effect on 15 March 1999

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First published November 1951
Second edition April 1963
Third edition July 1972
Fourth edition October 1986
Fifth edition March 1999

The following BSI references relate to the work on this standard:
Committee reference B/201/1
Draft for comment 97/105708 DC

ISBN 0 580 28261 9

Amendments issued since publication

Amd. No.	Date	Text affected

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Foreword

This part of BS 1722 has been prepared by Technical Committee B/201. It supersedes BS 1722-7:1986, which is withdrawn.

BS 1722 is published in parts as follows:

- *Part 1: Specification for chain link fences*
- *Part 2: Specifications for rectangular wire mesh and hexagonal wire netting fences¹⁾*
- *Part 3: Specification for strained wire fences¹⁾*
- *Part 4: Specification for cleft chestnut pale fences*
- *Part 5: Specification for close-boarded fences and wooden palisade fences*
- *Part 7: Specification for wooden post and rail fences*
- *Part 8: Specification for mild steel (low carbon steel) continuous bar fences and hurdles*
- *Part 9: Specification for mild steel (low carbon steel) fences with round or square verticals and flat horizontals*
- *Part 10: Specification for anti-intruder fences in chain link and welded mesh*
- *Part 11: Specification for woven wood and lap boarded panel fences*
- *Part 12: Specification for steel palisade fences¹⁾*
- *Part 13: Specification for chain link fences for tennis court surrounds*
- *Part 14: Specification for open mesh steel panel fences*
- *Part 16: Specification for organic powder coatings to be used as a plastics finish to components and mesh*

The various parts specify requirements for the types of fence that are considered suitable for standardization. No attempt has been made to standardize fences or gates which are of a purely decorative nature, or which are designed for special purposes, and no requirements are specified for “patent” proprietary fencing systems. It is recommended that such fences or gates be designed in accordance with relevant clauses of this part of BS 1722.

This standard aims to establish minimum requirements for materials and workmanship for wooden post and rail fences, in order to ensure satisfactory service for the purchaser, and to assist manufacturers and erecting contractors by eliminating unnecessary minor variations in the demands of purchasers. It specifies requirements for the components of the fence and for the way in which the fence needs to be constructed. The standard includes requirements for sizes of components, together with the permissible tolerances. These are minimum requirements and it is normally acceptable to use larger sizes, except where this would adversely affect the fit of components or where replacement parts need to match up with those already present.

The choice of a fence is influenced by its intended purpose, the desired service life, aesthetic considerations and the availability of components. Tables 1 and 2 classify basic characteristics of the fences, to assist the specifier and erecting contractor.

This standard includes requirements for protective treatments. However, maintenance, which is an important aspect of extending the service life of the fence, is outside the scope of this standard. Premature failure can be avoided by taking care not to damage protective treatments during installation.

Ground conditions may indicate that a variation in the length of a post, or of the depth to which it should be set, is desirable. The post setting depths specified in this standard are intended for use in normal ground, but if special conditions exist that warrant a change in the specification, e.g. ground that is softer or firmer than usual, such a change needs to be agreed with the specifier.

¹⁾ In course of revision.

It is generally assumed in this standard that the fence is erected on horizontal ground. Where the fence is erected on a gradient, special measures may be required.

For this revision of BS 1722-7, the scope has been extended to include cleft posts and rails. The opportunity has also been taken to update the sizes and references, and to clarify certain points that were thought to be open to misinterpretation.

Annex A is normative, and annex B and annex C are informative.

It has been assumed in the drafting of this part of BS 1722 that the execution of its provisions is entrusted to appropriately qualified and experienced people. The lead erector should either:

- a) have achieved the appropriate National Vocational Qualification (NVQ) or Scottish Vocational Qualification (SVQ) in fence erection (level 2) relevant to this part of BS 1722; or
- b) be currently registered for the appropriate NVQ or SVQ in fence erection (level 2) relevant to this part of BS 1722, provided that such registration has not been in place for a period greater than 5 years without successful assessment having taken place.

A British Standard does not purport to include all necessary provisions of a contract. Users of British Standards are responsible for their correct application.

Compliance with a British Standard does not of itself confer immunity from legal obligations.

Summary of pages

This document comprises a front cover, an inside front cover, pages i to iv, pages 1 to 15 and a back cover.

1 Scope

This part of BS 1722 specifies requirements for wooden post and rail fences, using both sawn and cleft components. It includes requirements for the erection of the fencing at the specified location.

2 Normative references

The following normative documents contain provisions which, through reference in this text, constitute provisions of this part of this British Standard. For dated references, subsequent amendments to, or revisions of, any of these publications do not apply. For undated references, the latest edition of the publication referred to applies.

BS 729, *Specification for hot dip galvanized coatings on iron and steel articles*.

BS 957-2, *Specification for feeler gauges — Part 2: Metric units*.

BS 1202-1, *Specification for nails — Part 1: Steel nails*.

BS 4978, *Specification for visual strength grading of softwood*.

BS 5589, *Code of practice for preservation of timber*.

BS EN 844-9, *Round and sawn timber — Terminology — Part 9: Terms relating to features of sawn timber*.

3 Terms and definitions

For the purposes of this part of BS 1722, the terms and definitions given in BS EN 844-9 apply, together with the following.

3.1

structural components

posts and main rails, with the exception of prick posts

NOTE Prick posts are non-structural components.

4 Dimensions, designation and general characteristics

4.1 The dimensions and general characteristics of sawn post and rail fences, and their corresponding designation, shall be as given in Table 1.

NOTE Figure 1 shows the general characteristics of sawn post and rail fences. It is not intended to illustrate any particular requirements of this standard.

4.2 The dimensions and general characteristics of fences which have morticed sawn or cleft posts and cleft rails, and their corresponding designation, shall be as given in Table 2.

Table 1 — Designation, dimensions and general characteristics of sawn post and rail fences

Fence type designation		Height from ground to top of top rail	Length of main posts	Length of prick posts ^a	Number of rails	Spacing between rails at posts, from top to bottom ^b
Morticed	Nailed	m	m	m		mm
MPR 11/3	SPR 11/3	1.1	1.80	1.60	3	325, 275
MPR 11/4	SPR 11/4	1.1	1.80	1.60	4	225, 200, 175
MPR 13/4	SPR 13/4	1.3	2.10	1.80	4	250, 250, 225

^a Only used in morticed fences.

^b See 8.1.3.1 for the relative position of the top rail.

Table 2 — Designation, dimensions and general characteristics of morticed sawn or cleft post and cleft rail fences

Fence type designation		Height from ground to top of top rail	Length of main posts	Number of rails	Spacing between rails at posts ^a
Sawn posts	Cleft posts	m	m		mm
SPCR 105/2	CPCR 105/2	1.05	1.8	2	415
SPCR 125/2	CPCR 125/2	1.25	2.1	2	540
SPCR 125/3	CPCR 125/3	1.25	2.1	3	323

^a See 8.1.3.1 for the relative position of the top rail.