### INTERNATIONAL STANDARD

**ISO** 7072

Second edition 1993-09-15

# Tractors and machinery for agriculture and forestry — Linch pins and spring pins — Dimensions and requirements

### iTeh STANDARD PREVIEW

Tracteurs et matériels agricoles et forestiers — Goupilles à abattant et goupilles-ressorts — Dimensions et exigences

ISO 7072:1993

https://standards.iteh.ai/catalog/standards/sist/b1f3d42b-25b9-4108-b76b-a456ac63ec69/iso-7072-1993



#### **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 worte.

International Standard ISO 7072 was prepared by Technical Committee ISO/TC 23, Tractors and machinery for agriculture and forestry, Sub-Committee SC 5, Equipment for working the soil. ISO 7072:1993

https://standards.iteh.ai/catalog/standards/sist/b1f3d42b-25b9-4108-b76b-

This second edition cancels and replaces 63 the isofirst 2-1edition (ISO 7072:1982), which has been extended to include spring pins, and requirements for both pins.

© ISO 1993

All rights reserved. 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 the publisher.

International Organization for Standardization Case Postale 56 • CH-1211 Genève 20 • Switzerland

Printed in Switzerland

# Tractors and machinery for agriculture and forestry — Linch pins and spring pins — Dimensions and requirements

### iTeh STANDARD PREVIEW

#### 1 Scope

(standards. 32hRequirements

This International Standard specifies the dimensions 072:1 and certain requirements for linch pins and spring pins, which are used for the three-point hitch and for numerous fastening purposes in farm work and agricolistical equipment.

#### 2 Normative reference

The following standard contains provisions which, through reference in this text, constitute provisions of this International Standard. At the time of publication, the edition indicated was valid. All standards are subject to revision, and parties to agreements based on this International Standard are encouraged to investigate the possibility of applying the most recent edition of the standard indicated below. Members of IEC and ISO maintain registers of currently valid International Standards.

ISO 683-14:1992, Heat-treatable steels, alloy steels and free-cutting steels — Part 14: Hot-rolled steels for quenched and tempered springs.

#### 3 Linch pins

#### 3.1 Dimensions

Dimensions of linch pins shall be in accordance with figure 1 and table 1.

The material of linch pins shall have a tensile strength of at least 500 N/mm<sup>2</sup>, and be so chosen that a linch spin can be bent 30% against a 5 mm radius without showing any cracks (see figure 2).

The pre-stress, F, of the spring-retaining device shown in figure 1 shall be 20 N to 30 N. The spring-retaining device shall withstand being opened 10 000 times without a noticeable reduction in pre-stress.

As regards finish of linch pins, any anti-corrosive treatment shall be by agreement with the manufacturer.

#### 4 Spring pins

#### 4.1 Dimensions

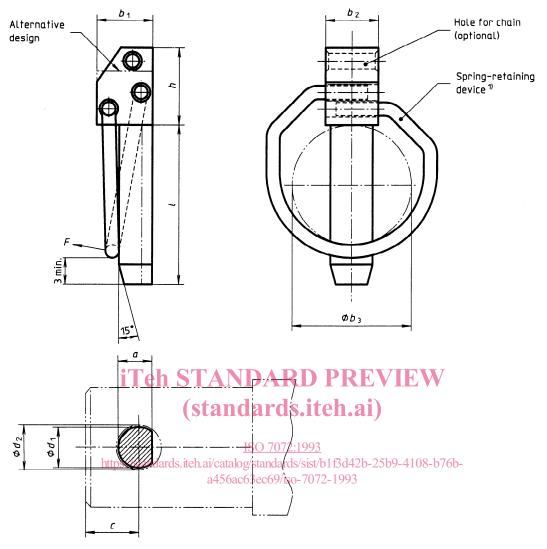
Dimensions of spring pins shall be in accordance with figure 3 and table 2.

#### 4.2 Requirements

The material of spring pins shall be spring steel of type ... as specified in ISO 683-14:1992.

As regards finish of spring pins, any anti-corrosive treatment shall be by agreement with the manufacturer

Dimensions in millimetres



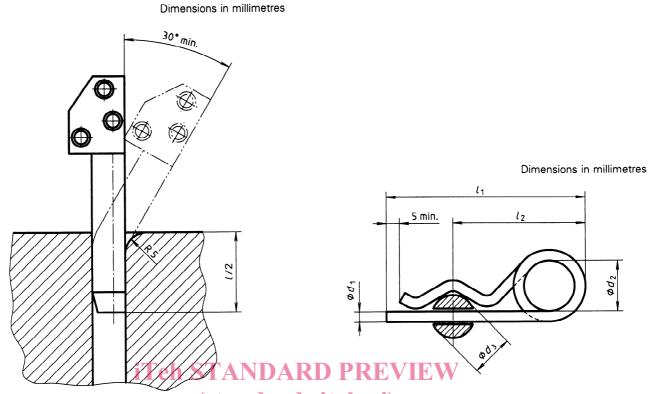
1) Configuration of the ring is optional, but shall ensure that it does not rotate.

Figure 1 — Dimensions of linch pins

Table 1 — Dimensions of linch pins

Dimensions in millimetres

Nominal size	$d_1$	$d_2$	а	min.	nax.	$b_2$ max.	$b_3$ min.	h max.	1	c max.
6	5,5 <sup>+0,3</sup> <sub>-0,2</sub>	6	_	8	14	8	32	22	42	10
8	7,5 <sup>+0,3</sup> <sub>-0,2</sub>	8	7	9	15	9	32	22	42	12
10	9,5 <sup>+0,3</sup> <sub>-0,2</sub>	10	8	10	15	12	32	22	45	14
12	11 ± 0,5	12	9	11	15	14	34	22	45	18
12	11 ± 0,0	12		11	15	14	45	22	55	10
17	16 ± 0,5	17	12,5	14	21	20	45	29	60	21



NOTE — Values for *l* are given in table 1. (Standards.iNote — The eye of the spring pin may have one or more coils.

Figure 2 — Fixture for bending test ISO 7072:1993 Figure 3 — Dimensions of spring pins https://standards.iten.avcatalog/standards/sist/b1f3d42b-25b9-4108-b76b-a456ac63ec69/iso-7072-1993

Table 2 — Dimensions of spring pins

Dimensions in millimetres

		$d_2$	$d_3$	1)	$l_1$	l <sub>2</sub>
Nominal size	$d_1$		min.	max.	+3 0	approx.
2 × 40	2	9	9	12	41	23
3 × 70	3	13	12	18	67	40
4 × 75	4	19	15	22	75	50
5 × 105	5	26	18	24	105	65
6 × 115	6	31	24	35	117	70
7 × 150	7	36	34	58	150	108
8 × 150	8	35	40	55	150	88
Recommended dimension	ons	1				

# iTeh This page intentionally left blank VIEW (standards.iteh.ai)

ISO 7072:1993 https://standards.iteh.ai/catalog/standards/sist/b1f3d42b-25b9-4108-b76b-a456ac63ec69/iso-7072-1993

# iTeh This page intentionally left blank VIEW (standards.iteh.ai)

ISO 7072:1993 https://standards.iteh.ai/catalog/standards/sist/b1f3d42b-25b9-4108-b76b-a456ac63ec69/iso-7072-1993 ISO 7072:1993(E)

## iTeh STANDARD PREVIEW (standards.iteh.ai)

ISO 7072:1993 https://standards.iteh.ai/catalog/standards/sist/b1f3d42b-25b9-4108-b76b-a456ac63ec69/iso-7072-1993

#### UDC 631.372.013.3/.5

Descriptors: agricultural machinery, agricultural tractors, couplings, linchpin, spring pins, specifications, dimensions.

Price based on 3 pages