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## Steel and iron castings — Liquid penetrant testing

*Pièces moulées en acier et en fer — Contrôle par ressuage*

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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 (see [www.iso.org/directives](http://www.iso.org/directives)).

Attention is drawn to the possibility that some of the elements of this document may be the subject of patent rights. ISO shall not be held responsible for identifying any or all such patent rights. Details of any patent rights identified during the development of the document will be in the Introduction and/or on the ISO list of patent declarations received (see [www.iso.org/patents](http://www.iso.org/patents)).

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For an explanation of the voluntary nature of standards, the meaning of ISO specific terms and expressions related to conformity assessment, as well as information about ISO's adherence to the World Trade Organization (WTO) principles in the Technical Barriers to Trade (TBT) see [www.iso.org/iso/foreword.html](http://www.iso.org/iso/foreword.html).

This document was prepared by Technical Committee ISO/TC 17, *Steel*, Subcommittee SC 11, *Steel castings*.

This third edition cancels and replaces the second edition (ISO 4987:2010), which has been technically revised. The main changes compared to the previous edition are as follows:

- isolated non-linear indications are defined in [6.1.2](#);
- definition of aligned linear indications in [6.1.3](#) is corrected

Any feedback or questions on this document should be directed to the user's national standards body. A complete listing of these bodies can be found at [www.iso.org/members.html](http://www.iso.org/members.html).

This corrected version of ISO 4987:2020 incorporates the following corrections:

- the main title has been corrected from "Steel castings" to "Steel and iron castings";
- in the Scope, the sentence has been corrected to read: "This document specifies a method for the liquid penetrant testing of steel and iron castings".

## Introduction

This document complements the general principles of liquid penetrant testing described in ISO 3452-1 with additional requirements of the steel foundry industry.

Liquid penetrant testing, as well as any other non-destructive testing, is part of a general or specific assessment of the quality of a casting to be agreed between the purchaser and the manufacturer at the time of acceptance of the order.

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