
**Mleko - Ugotavljanje števila somatskih celic - 1. del: Mikroskopska metoda
(Referenčna metoda) (ISO/DIS 13366-1:2026)**

Milk - Enumeration of somatic cells - Part 1: Microscopic method (Reference method)
(ISO/DIS 13366-1:2026)

Milch - Zählung somatischer Zellen - Teil 1: Mikroskopisches Verfahren
(Referenzverfahren) (ISO/DIS 13366-1:2026)

Lait - Dénombrement des cellules somatiques - Partie 1: Méthode au microscope
(Méthode de référence) (ISO/DIS 13366-1:2026)

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ICS:

67.100.10	Mleko in predelani mlečni proizvodi	Milk and processed milk products
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Milk — Enumeration of somatic cells —

Part 1: Microscopic method (Reference method)

ICS: 67.100.10

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Foreword

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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 document 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).

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This document was prepared by Technical Committee ISO/TC 34, *Food products*, Subcommittee SC 5, *Milk and milk products*, and the International Dairy Federation (IDF), in collaboration with the European Committee for Standardization (CEN) Technical Committee CEN/TC 302, *Milk and milk products – Methods of sampling and analysis*, in accordance with the Agreement on technical cooperation between ISO and CEN (Vienna Agreement). It is being published jointly by ISO and IDF.

This third edition cancels and replaces the second edition (ISO 13366-1|IDF 148-1:2008), which has been technically revised.

The main changes are as follows:

- ISO 13366-1:2008/Cor 1:2009 is incorporated;
- Smear preparation is better described and xylene is introduced instead of tetrachloroethane;
- [Annex D](#) describes a method to analyze liquid milk.

A list of all parts in the ISO 13366 | IDF 148 series can be found on the ISO website.

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.

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IDF (the International Dairy Federation) is a non-profit private sector organization representing the interests of various stakeholders in dairying at the global level. IDF members are organized in National Committees, which are national associations composed of representatives of dairy-related national interest groups including dairy farmers, dairy processing industry, dairy suppliers, academics and governments/food control authorities.

ISO and IDF collaborate closely on all matters of standardization relating to methods of analysis and sampling for milk and milk products. Since 2001, ISO and IDF jointly publish their International Standards using the logos and reference numbers of both organizations.

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The work was carried out by the IDF/ISO Action Team S19 of the *Standing Committee on Laboratory Statistics and Quality Assurance* under the aegis of its project leaders Mrs S. Orlandini (IT) and Mrs C. Egger (CH).

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Milk — Enumeration of somatic cells —

Part 1: Microscopic method (Reference method)

1 Scope

This document specifies a microscopic method (reference method) for the counting of somatic cells in both raw and chemically preserved milk.

This document is applicable for the counting of somatic cells in cows' milk, provided that the eventually mentioned prerequisites are met.

This method is suitable for preparing standard test samples and determining reference method values that are required for calibrating mechanized and automated cell-counting methods.

WARNING — The use of this standard may involve hazardous materials, operations and equipment. This standard does not purport to address all of the safety problems associated with its use. It is the responsibility of the user of this standard to establish appropriate safety and health practices and determine the applicability of regulatory limitations prior to use.

2 Normative references

There are no normative references in this document.

3 Terms and definitions

For the purposes of this document, the following terms and definitions apply.

ISO and IEC maintain terminology databases for use in standardization at the following addresses:

- ISO Online browsing platform: available at <https://www.iso.org/obp>
- IEC Electropedia: available at <https://www.electropedia.org/>

3.1

somatic cells

those cells with nuclei, that is all leucocytes and epithelial cells, determined according to the procedure described in this part of ISO 13366-1 | IDF 148-1

3.2

microscope field

circular area visible when looking through a microscope's eyepiece at a specific magnification

3.3

cell cluster

two or more cells loosely grouped together and detected or interpreted as a single larger object

3.4

polymorphonuclear

type of white blood cell characterized by a multi-lobed or segmented nucleus, a feature that distinguishes it from other white blood cells