
**Rapeseed — Determination of
chlorophyll content — Spectrometric
method**

*Graines de colza — Détermination de la teneur en chlorophylle —
Méthode spectrométrique*

Sample Document

get full document from standards.iteh.ai



Sample Document

get full document from standards.iteh.ai



COPYRIGHT PROTECTED DOCUMENT

© ISO 2015, Published in Switzerland

All rights reserved. Unless otherwise specified, no part of this publication may be reproduced or utilized otherwise in any form or by any means, electronic or mechanical, including photocopying, or posting on the internet or an intranet, without prior written permission. Permission can be requested from either ISO at the address below or ISO's member body in the country of the requester.

ISO copyright office
Ch. de Blandonnet 8 • CP 401
CH-1214 Vernier, Geneva, Switzerland
Tel. +41 22 749 01 11
Fax +41 22 749 09 47
copyright@iso.org
www.iso.org

Contents

	Page
Foreword	iv
1 Scope	1
2 Normative references	1
3 Terms and definitions	1
4 Principle	1
5 Reagent	1
5.1 Extraction solvent.....	1
6 Apparatus	1
7 Sampling	2
8 Preparation of test sample	2
9 Procedure	3
9.1 Test portions.....	3
9.2 Extraction.....	3
9.3 Determination.....	3
10 Expression of results	3
11 Precision	4
11.1 Repeatability.....	4
11.2 Reproducibility.....	4
12 Test report	4
Annex A (informative) Results of interlaboratory test	5
Bibliography	6

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).

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).

Any trade name used in this document is information given for the convenience of users and does not constitute an endorsement.

For an explanation on the meaning of ISO specific terms and expressions related to conformity assessment, as well as information about ISO's adherence to the WTO principles in the Technical Barriers to Trade (TBT) see the following URL: [Foreword - Supplementary information](#)

The committee responsible for this document is ISO/TC 34, *Food products*, Subcommittee SC 2, *Oleaginous seeds and fruits and oilseed meals*.

This third edition cancels and replaces the second edition (ISO 10519:1997), of which it constitutes a minor revision.

[Annex A](#) of this International Standard is for information only.

Rapeseed — Determination of chlorophyll content — Spectrometric method

1 Scope

This International Standard specifies a spectrometric method for the determination of the chlorophyll content of rapeseed. It is not applicable to the determination of chlorophyll in oils.

2 Normative references

The following documents, in whole or in part, are normatively referenced in this document and are indispensable for its application. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

ISO 648, *Laboratory glassware — Single-volume pipettes*

ISO 664, *Oilseeds — Reduction of laboratory sample to test sample*

ISO 665, *Oilseeds — Determination of moisture and volatile matter content*

3 Terms and definitions

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

3.1

chlorophyll content

mass fraction of substances in the sample contributing to the absorption band at a wavelength near 665 nm, as determined under the operating conditions specified in this International Standard and measured as chlorophyll A

Note 1 to entry: The chlorophyll content is expressed in milligrams per kilogram.

4 Principle

Extraction of a test portion in a suitable apparatus with a specified extraction solvent. Spectrometric determination of the chlorophyll content of the extracted solution.

5 Reagent

Use only reagents of recognized analytical grade unless otherwise stated.

5.1 Extraction solvent

Transfer to a 500 ml beaker 100 ml of anhydrous ethanol. Add to the contents of the beaker 300 ml of anhydrous *iso*-octane (2,2,5-trimethylpentane) or anhydrous technical *n*-heptane or anhydrous petroleum ether (essentially composed of C₇ hydrocarbons, with a boiling range between 90 °C and 100 °C).

6 Apparatus

Usual laboratory apparatus and, in particular, are the following.