



NSAI
Standards

Irish Standard
I.S. EN ISO 19063-1:2015

Plastics - Impact-resistant polystyrene (PS-I)
moulding and extrusion materials - Part 1:
Designation system and basis for
specifications

I.S. EN ISO 19063-1:2015

Incorporating amendments/corrigenda/National Annexes issued since publication:

The National Standards Authority of Ireland (NSAI) produces the following categories of formal documents:

I.S. xxx: Irish Standard — national specification based on the consensus of an expert panel and subject to public consultation.

S.R. xxx: Standard Recommendation — recommendation based on the consensus of an expert panel and subject to public consultation.

SWiFT xxx: A rapidly developed recommendatory document based on the consensus of the participants of an NSAI workshop.

This document replaces/revises/consolidates the NSAI adoption of the document(s) indicated on the CEN/CENELEC cover/Foreword and the following National document(s):

NOTE: The date of any NSAI previous adoption may not match the date of its original CEN/CENELEC document.

This document is based on:

EN ISO 19063-1:2015

Published:

2015-12-02

This document was published under the authority of the NSAI and comes into effect on:

2015-12-20

ICS number:

83.080.20

NOTE: If blank see CEN/CENELEC cover page

NSAI
1 Swift Square,
Northwood, Santry
Dublin 9

T +353 1 807 3800
F +353 1 807 3838
E standards@nsai.ie
W NSAI.ie

Sales:
T +353 1 857 6730
F +353 1 857 6729
W standards.ie

Údarás um Chaighdeáin Náisiúnta na hÉireann

National Foreword

I.S. EN ISO 19063-1:2015 is the adopted Irish version of the European Document EN ISO 19063-1:2015, Plastics - Impact-resistant polystyrene (PS-I) moulding and extrusion materials - Part 1: Designation system and basis for specifications

This document does not purport to include all the necessary provisions of a contract. Users are responsible for its correct application.

Compliance with this document does not of itself confer immunity from legal obligations.

In line with international standards practice the decimal point is shown as a comma (,) throughout this document.

This page is intentionally left blank

EUROPEAN STANDARD

EN ISO 19063-1

NORME EUROPÉENNE

EUROPÄISCHE NORM

December 2015

ICS 83.080.20

Supersedes EN ISO 2897-1:1999

English Version

**Plastics - Impact-resistant polystyrene (PS-I) moulding
and extrusion materials - Part 1: Designation system and
basis for specifications (ISO 19063-1:2015)**

Plastiques - Polystyrènes résistants au choc (PS-I) pour
moulage et extrusion - Partie 1 : Système de
désignation et base de spécification (ISO 19063-
1:2015)

Kunststoffe - Schlagzähe Polystyrol (PS-I)-Formmassen
- Teil 1: Bezeichnungssystem und Basis für
Spezifikationen (ISO 19063-1:2015)

This European Standard was approved by CEN on 26 September 2015.

CEN members are bound to comply with the CEN/CENELEC Internal Regulations which stipulate the conditions for giving this European Standard the status of a national standard without any alteration. Up-to-date lists and bibliographical references concerning such national standards may be obtained on application to the CEN-CENELEC Management Centre or to any CEN member.

This European Standard exists in three official versions (English, French, German). A version in any other language made by translation under the responsibility of a CEN member into its own language and notified to the CEN-CENELEC Management Centre has the same status as the official versions.

CEN members are the national standards bodies of Austria, Belgium, Bulgaria, Croatia, Cyprus, Czech Republic, Denmark, Estonia, Finland, Former Yugoslav Republic of Macedonia, France, Germany, Greece, Hungary, Iceland, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, Netherlands, Norway, Poland, Portugal, Romania, Slovakia, Slovenia, Spain, Sweden, Switzerland, Turkey and United Kingdom.



EUROPEAN COMMITTEE FOR STANDARDIZATION
COMITÉ EUROPÉEN DE NORMALISATION
EUROPÄISCHES KOMITEE FÜR NORMUNG

CEN-CENELEC Management Centre: Avenue Marnix 17, B-1000 Brussels

EN ISO 19063-1:2015 (E)

Contents

Page

European foreword.....	3
-------------------------------	----------

European foreword

This document (EN ISO 19063-1:2015) has been prepared by Technical Committee ISO/TC 61 "Plastics" in collaboration with Technical Committee CEN/TC 249 "Plastics" the secretariat of which is held by NBN.

This European Standard shall be given the status of a national standard, either by publication of an identical text or by endorsement, at the latest by June 2016, and conflicting national standards shall be withdrawn at the latest by June 2016.

Attention is drawn to the possibility that some of the elements of this document may be the subject of patent rights. CEN [and/or CENELEC] shall not be held responsible for identifying any or all such patent rights.

This document supersedes EN ISO 2897-1:1999.

According to the CEN-CENELEC Internal Regulations, the national standards organizations of the following countries are bound to implement this European Standard: Austria, Belgium, Bulgaria, Croatia, Cyprus, Czech Republic, Denmark, Estonia, Finland, Former Yugoslav Republic of Macedonia, France, Germany, Greece, Hungary, Iceland, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, Netherlands, Norway, Poland, Portugal, Romania, Slovakia, Slovenia, Spain, Sweden, Switzerland, Turkey and the United Kingdom.

Endorsement notice

The text of ISO 19063-1:2015 has been approved by CEN as EN ISO 19063-1:2015 without any modification.

This page is intentionally left blank

**INTERNATIONAL
STANDARD**

**ISO
19063-1**

First edition
2015-11-15

**Plastics — Impact-resistant
polystyrene (PS-I) moulding and
extrusion materials —**

**Part 1:
Designation system and basis for
specifications**

*Plastiques — Polystyrènes résistants au choc (PS-I) pour moulage
et extrusion —*

Partie 1: Système de désignation et base de spécification



Reference number
ISO 19063-1:2015(E)

© ISO 2015

ISO 19063-1:2015(E)



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
Introduction	v
1 Scope	1
2 Normative references	1
3 Designation system	2
3.1 General.....	2
3.2 Data block 1.....	2
3.3 Data block 2.....	2
3.4 Data block 3.....	3
3.5 Data block 4.....	4
3.5.1 Vicat softening temperature.....	4
3.5.2 Melt mass-flow rate.....	4
3.5.3 Charpy notched impact strength.....	5
3.5.4 Flexural modulus.....	5
3.6 Data block 5.....	5
4 Examples of designations	6

ISO 19063-1:2015(E)

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 61, *Plastics*, Subcommittee SC 9, *Thermoplastic materials*.

This first edition of ISO 19063-1 cancels and replaces ISO 2897-1:1997, which has been technically revised to introduce a new designation system.

The revised designation system is published under a new ISO number, as many existing documents refer to ISO 2897-1. If the existing ISO 2897-1 would be replaced by the new designation system, these documents would refer to the incorrect designation system.

In order to give users time to switch from ISO 2897-1 to ISO 19063-1, any designation system according to ISO 2897-1 is to be phased out in 5 to 10 years. During this period, ISO 2897-2 will effectively be Part 2 of this International Standard.

ISO 19063 consists of the following parts, under the general title *Plastics — Impact-resistant polystyrene (PS-I) moulding and extrusion materials*:

— *Part 1: Designation system and basis for specifications*

Introduction

ISO 2897-1 is complex and does not fit with daily practice anymore. In practice, ISO 1043 (all parts) and ISO 11469 are, in combination, “improperly” being used as a designation system for, e.g. marking. The aim of this International Standard is to simplify the data block system and to connect more to ISO 1043 (all parts) and ISO 11469, where the first two blocks are used for generic identification and marking of products.

Plastics — Impact-resistant polystyrene (PS-I) moulding and extrusion materials —

Part 1: Designation system and basis for specifications

1 Scope

This part of ISO 19063 establishes a system of designation for impact-resistant polystyrene (PS-I) moulding and extrusion materials, which may be used as the basis for specifications.

The types of impact-resistant polystyrene plastic are differentiated from each other by a classification system based on appropriate levels of the designatory properties:

- a) Vicat softening temperature;
- b) melt mass-flow rate;
- c) Charpy notched impact strength;
- d) flexural modulus;

and on information about composition, intended application and/or method of processing, important properties, additives, colorants, fillers, and reinforcing materials.

This part of ISO 19063 is applicable to all impact-resistant polystyrene plastics with a two-phase polymer system comprised of a continuous phase, consisting of polystyrene and/or a copolymer of styrene with an alkyl-substituted styrene, and a dispersed elastomeric phase based on butadiene.

It applies to materials ready for normal use, unmodified or modified by colorants, additives, fillers, etc.

This part of ISO 19063 does not apply to expandable materials.

It is not intended to imply that materials having the same designation give necessarily the same performance. This part of ISO 19063 does not provide engineering data, performance data, or data on processing conditions which may be required to specify a material for a particular application and/or method of processing.

If such additional properties are required, they will be determined in accordance with the test methods specified in ISO 2897-2, if suitable.

In order to specify a thermoplastic material for a particular application or to ensure reproducible processing, additional requirements may be given in data block 5 (see [3.1](#)).

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 1043-1, *Plastics — Symbols and abbreviated terms — Part 1: Basic polymers and their special characteristics*

ISO 1043-2, *Plastics — Symbols and abbreviated terms — Part 2: Fillers and reinforcing materials*

This is a free preview. Purchase the entire publication at the link below:

[Product Page](#)

-
- [Looking for additional Standards? Visit Intertek Inform Infostore](#)
 - [Learn about LexConnect, All Jurisdictions, Standards referenced in Australian legislation](#)
-