IEC 60684-3-283

Edition 2.0 2019-08

REDLINE VERSION

colour inside

Flexible insulating sleeving –
Part 3: Specifications for individual types of sleeving –
Sheet 283: Heat-shrinkable, polyolefin sleeving for bus-bar insulation

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FLEXIBLE INSULATING SLEEVING –

Part 3: Specifications for individual types of sleeving – Sheet 283: Heat-shrinkable, polyolefin sleeving for bus-bar insulation

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International Standard IEC 60684-3-283 has been prepared by IEC technical committee 15: Solid electrical insulating materials.

This second edition cancels and replaces the first edition published in 2010 and Amendment 1:2013. This edition constitutes a technical revision.

This edition includes the following significant technical changes with respect to the previous edition:

a) change of moulded plaque thickness for resistance to tracking and weathering tests to (6 ± 0,5) mm.

The text of this International Standard is based on the following documents:

FDIS	Report on voting
15/892/FDIS	15/901/RVD

Full information on the voting for the approval of this International Standard can be found in the report on voting indicated in the above table.

This document has been drafted in accordance with the ISO/IEC Directives, Part 2.

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INTRODUCTION

This document is one of a series of standards which deals with flexible insulating sleeving for electrical purposes.

The series consists of three parts:

Part 1: Definitions and general requirements (IEC 60684-1)

Part 2: Methods of test (IEC 60684-2)

Part 3: Specifications for individual types of sleeving (IEC 60684-3)

This document comprises one of the sheets of Part 3 as follows:

Sheet 283: Heat-shrinkable, polyolefin sleeving for bus-bar insulation.

FLEXIBLE INSULATING SLEEVING –

Part 3: Specifications for individual types of sleeving – Sheet 283: Heat-shrinkable, polyolefin sleeving for bus-bar insulation

1 Scope

This part of IEC 60684 gives the requirements for two types of heat-shrinkable, polyolefin sleeving for bus-bar insulation, with a nominal shrink ratio of 2,5:1.

This sleeving has been found suitable up to temperatures of 100 °C.

- Type A: Medium wall – internal diameter up to 170,0 mm typically
- Type B: Thick wall – internal diameter up to 165,0 mm typically

These sleevings are normally supplied in colour, red or brown.

Since these types of sleeving~~s~~ cover a significantly large range of sizes and wall thicknesses, Annex A (Tables A.1 and A.2) provides guidance to the range of sizes available. The actual size and wall thickness ~~shall~~ will be agreed between the user and supplier depending on the electric strength of the installed tubing offered and the requirements of the user.

Materials which conform to this specification meet established levels of performance. However, the selection of a material by a user for a specific application ~~should~~ will be based on the actual requirements necessary for adequate performance in that application and not based on this specification alone.

2 Normative references

The following documents are referred to in the text in such a way that some or all of their content constitutes requirements of this document. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

IEC 60296:~~2003~~2012, *Fluids for electrotechnical applications – Unused mineral insulating oils for transformers and switchgear*

IEC 60684-1:2003, *Flexible insulating sleeving – Part 1: Definitions and general requirements*

IEC 60684-2:~~1997~~2011, *Flexible insulating sleeving – Part 2: Methods of test*
~~Amendment 1 (2003)~~
~~Amendment 2 (2005)~~

IEC 60757:1983, *Code for designation of colours*

ISO 846:~~1997~~2019, Plastics – *Evaluation of the action of microorganisms*

ISO 4892-3:~~2006~~2016, Plastics – *Methods of exposure to laboratory light sources – Part 3: Fluorescent UV lamps*

IEC 60684-3-283

Edition 2.0 2019-08

INTERNATIONAL STANDARD

NORME INTERNATIONALE

Flexible insulating sleeving –
Part 3: Specifications for individual types of sleeving –
Sheet 283: Heat-shrinkable, polyolefin sleeving for bus-bar insulation

Gaines isolantes souples –
Partie 3: Spécifications pour types particuliers de gaines –
Feuille 283: Gaines thermorétractables en polyoléfine pour isolation de barres omnibus



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COMMISSION ÉLECTROTECHNIQUE INTERNATIONALE

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GAINES ISOLANTES SOUPLES –

Partie 3: Spécifications pour types particuliers de gaines – Feuille 283: Gaines thermorétractables en polyoléfine pour isolation de barres omnibus

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La Norme internationale IEC 60684-3-283 a été établie par le comité d'études 15 de l'IEC: Matériaux isolants électriques solides.

Cette deuxième édition annule et remplace la première édition parue en 2010 et l'Amendement 1:2013. Cette édition constitue une révision technique.

Cette édition inclut la modification technique majeure suivante par rapport à l'édition précédente:

a) modification de l'épaisseur des plaques moulées pour les essais de résistance aux courants de cheminement et les essais de résistance aux intempéries qui devient (6 ± 0,5) mm.

Le texte de cette Norme internationale est issu des documents suivants:

FDIS	Rapport de vote
15/892/FDIS	15/901/RVD

Le rapport de vote indiqué dans le tableau ci-dessus donne toute information sur le vote ayant abouti à l'approbation de cette Norme internationale.

Ce document a été rédigé selon les Directives ISO/IEC, Partie 2.

Une liste de toutes les parties de la série IEC 60684, publiées sous le titre général *Gaines isolantes souples*, peut être consultée sur le site web de l'IEC.

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INTRODUCTION

Le présent document fait partie d'une série de normes traitant des gaines isolantes souples à usages électriques.

Cette série est constituée de trois parties:

Partie 1: Définitions et exigences générales (IEC 60684-1)

Partie 2: Méthodes d'essai (IEC 60684-2)

Partie 3: Spécifications pour types particuliers de gaines (IEC 60684-3)

Le présent document contient l'une des feuilles qui composent la Partie 3, comme suit:

Feuille 283: Gaines thermorétractables en polyoléfine pour isolation de barre omnibus.

GAINES ISOLANTES SOUPLES –

Partie 3: Spécifications pour types particuliers de gaines – Feuille 283: Gaines thermorétractables en polyoléfine pour isolation de barres omnibus

1 Domaine d'application

La présente partie de l'IEC 60684 donne les exigences relatives à deux types de gaines thermorétractables, en polyoléfine, pour isolation des barres omnibus dont le rapport de rétreint nominal est 2,5:1.

Ces gaines se sont avérées appropriées pour une utilisation à des températures allant jusqu'à 100 °C.

- Type A: Paroi moyenne – diamètre intérieur généralement jusqu'à 170,0 mm
- Type B: Paroi épaisse – diamètre intérieur généralement jusqu'à 165,0 mm

Ces gaines sont normalement disponibles en rouge ou en brun.

Comme ces types de gaines couvrent une plage très étendue de tailles et d'épaisseurs de paroi, l'Annexe A (Tableaux A.1 et A.2) fournit un guide des tailles disponibles dans cette plage. La taille réelle et l'épaisseur de la paroi font l'objet d'un accord entre l'utilisateur et le fournisseur en fonction de la rigidité diélectrique du tube installé et des exigences de l'utilisateur.

Les matériaux conformes à la présente spécification satisfont à des niveaux de performances établis. Cependant, le choix d'un matériau par un utilisateur, pour une application spécifique, est fondé sur les exigences réelles nécessaires pour obtenir des performances adéquates pour l'application concernée, et n'est pas fondé sur cette seule spécification.

2 Références normatives

Les documents suivants cités dans le texte constituent, pour tout ou partie de leur contenu, des exigences du présent document. Pour les références datées, seule l'édition citée s'applique. Pour les références non datées, la dernière édition du document de référence s'applique (y compris les éventuels amendements).

IEC 60296:2012, *Fluides pour applications électrotechniques – Huiles minérales isolantes neuves pour transformateurs et appareillages de connexion*

IEC 60684-1:2003, *Gaines isolantes souples – Partie 1: Définitions et exigences générales*

IEC 60684-2:2011, *Gaines isolantes souples – Partie 2: Méthodes d'essai*

IEC 60757:1983, *Code de désignation de couleurs*

ISO 846:2019, *Plastiques – Évaluation de l'action des micro-organismes*

ISO 4892-3:2016, *Plastiques – Méthodes d'exposition à des sources lumineuses de laboratoire – Partie 3: Lampes fluorescentes UV*