National Standards Authority of Ireland

IRISH STANDARD

I.S. EN 62271-108:2006

ICS 29.130.10

HIGH-VOLTAGE SWITCHGEAR AND CONTROLGEAR -- PART 108: HIGH-VOLTAGE ALTERNATING CURRENT DISCONNECTING CIRCUIT-BREAKERS FOR RATED VOLTAGES OF 72,5 KV AND ABOVE

National Standards
Authority of Ireland
Glasnevin, Dublin 9
Ireland

Tel: +353 1 807 3800
Fax: +353 1 807 3838
http://www.nsai.ie

Sales
http://www.standards.ie

This Irish Standard was published under the authority of the National Standards Authority of Ireland and comes into effect on:
April 10, 2006

Price Code Q

Údarás um Chaighdeáin Náisiúnta na hÉireann

EUROPEAN STANDARD

NORME EUROPÉENNE

EUROPÄISCHE NORM

EN 62271-108

March 2006

ICS 29.130.10

English version

High-voltage switchgear and controlgear Part 108: High-voltage alternating current disconnecting circuit-breakers for rated voltages of 72,5 kV and above

(IEC 62271-108:2005)

Appareillage à haute tension
Partie 108: Disjoncteurs-sectionneurs
à courant alternatif à haute tension
de tensions assignées supérieures
ou égales à 72,5 kV
(CEI 62271-108:2005)

Hochspannungs-Schaltgeräte
und -Schaltanlagen
Teil 108: Hochspannungs-Wechselstrom-
Leistungsschalter mit Trennfunktion
für Bemessungsspannungen
größer oder gleich 72,5 kV
(IEC 62271-108:2005)

This European Standard was approved by CENELEC on 2005-12-01. CENELEC 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 Central Secretariat or to any CENELEC 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 CENELEC member into its own language and notified to the Central Secretariat has the same status as the official versions.

CENELEC members are the national electrotechnical committees of Austria, Belgium, Cyprus, the Czech Republic, Denmark, Estonia, Finland, France, Germany, Greece, Hungary, Iceland, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, the Netherlands, Norway, Poland, Portugal, Romania, Slovakia, Slovenia, Spain, Sweden, Switzerland and the United Kingdom.

CENELEC

European Committee for Electrotechnical Standardization
Comité Européen de Normalisation Electrotechnique
Europäisches Komitee für Elektrotechnische Normung

Central Secretariat: rue de Stassart 35, B - 1050 Brussels

Ref. No. EN 62271-108:2006 E

Foreword

The text of document 17A/742/FDIS, future edition 1 of IEC 62271-108, prepared by SC 17A, High-voltage switchgear and controlgear, of IEC TC 17, Switchgear and controlgear, was submitted to the IEC-CENELEC parallel vote and was approved by CENELEC as EN 62271-108 on 2005-12-01.

The following dates were fixed:

– latest date by which the EN has to be implemented at national level by publication of an identical national standard or by endorsement	(dop)	2006-10-01
– latest date by which the national standards conflicting with the EN have to be withdrawn	(dow)	2008-12-01

This European Standard should be read in conjunction with EN 62271-100:2001, EN 62271-102:2002 and EN 60694:1996, to which it refers and which is applicable, unless otherwise specified. In order to simplify the indication of corresponding requirements, the same numbering of clauses and subclauses is used as in EN 60694. Additional subclauses are numbered from 101.

This European Standard makes reference to International Standards. Where the International Standard referred to has been endorsed as a European Standard or a home-grown European Standard exists, this European Standard shall be applied instead. Pertinent information can be found on the CENELEC web site.

Annex ZA has been added by CENELEC.

Endorsement notice

The text of the International Standard IEC 62271-108:2005 was approved by CENELEC as a European Standard without any modification.

Annex ZA
(informative)

A-deviations

A-deviation: National deviation due to regulations, the alteration of which is for the time being outside the competence of the CENELEC member.

A-deviations in an EFTA-country are valid instead of the relevant provisions of the European Standard in that country until they have been removed.

Clause	Deviation
1.1	**Italy** (I.S.P.E.S.L.[1)] Rules, 95 revision: VSR.8.B.1; VSR.8.B.2; M.15.D.2) Italian laws apply to gas pressurized enclosures made of both insulating and metallic materials with a capacity of 25 litres or above, a design pressure higher than 0,05 kg/cm² and a temperature range: -25 °C/+100 °C (only for insulating materials). Moreover the manufacturer of any electrical equipment which comprehends gas pressurized enclosures must submit the design of the pressurized enclosures itself to a proper legal Authority indicating the stresses and the loads which have any influence on the design itself. For each of the stresses the manufacturer must indicate the design values and the relevant computations. – For metal-enclosed switchgear and controlgear containing gas-filled compartments, the design pressure is limited to a maximum of 0,5 bar (gauge) and the volume is limited to a maximum of 2 m^3. – Gas filled compartments having a design pressure exceeding 0,5 bar (gauge) or a volume exceeding 2 m^3 shall be designed according to Italian pressure vessel code for electrical switchgear (DM 1 December 1980 and DM 10 September 1981 published on Gazzetta Ufficiale n° 285 dated 16.10.1981).
5	**Italy** (I.S.P.E.S.L. [1)] Rules, 95 revision: VSR.8.B.1 and M.15.D.3. Tab I for porcelain) Only the use of porcelain type A or S. (Aluminous or Siliceous) is permitted.
6	**Italy** (I.S.P.E.S.L. [1)] Rules, 95 revision: VSR.8.B.1 Clause 2) The type test shall be performed in the presence of the Authority Supervisor. (I.S.P.E.S.L. [1)] Rules, 95 revision: VSR.8.B.2 Clause 2; M.15.D.4) An additional pressure test shall be performed on a complete pressurized enclosure. This has to withstand 1,5 times the design pressure without failure for five minutes. Temperature cycles test and electrical test shall be made; after these tests shall be carried out consecutively the pressure test at pressure p ≥ 4,25 times the design pressure.
7	**Italy** (I.S.P.E.S.L. [1)] Rules, 95 revision: VSR.8.B.1 subclause 4.1.2) For a homogeneous batch of 100 pieces max., one hollow insulator shall be subjected to the failure test with a pressure 4,25 times the design pressure.

[1)] I.S.P.E.S.L.: Istituto Superiore per la Prevenzione e la Sicurezza del Lavoro