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(ICS 01.080.10)

SINGAPORE STANDARD

Graphical symbols – Safety colours and safety signs

Part 1 : Design principles for safety signs and safety markings

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- Part 1 : Design principles for safety signs and safety markings

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The General Engineering and Safety Standards Committee, appointed by the Standards Council, consists of the following members:

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Deputy Chairman	:	Mr Seet Choh San	Singapore Institution of Safety Officers
Secretary	:	Ms Kong Wai Yee	Singapore Manufacturing Federation – Standards Development Organisation
Members	:	Dr Kenneth Choy	Ministry of Manpower
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Society of Loss Prevention in the Process Industries

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National Foreword

This Singapore Standard was prepared by the Technical Committee on Workplace Safety and Health under the direction of the General Engineering and Safety Standards Committee.

The review of the SS 508 series of standards (Parts 1 to 4) resulted in the following:

- Confirmation with amendments of Part 2.
- Revision of Parts 1, 3 and 4: these parts have been renumbered, rearranged and retitled to be aligned with the ISO 3864 Parts 1, 3 and 4 as well as ISO 7010. The part on 'Safety signs used in workplaces and public areas' has been retitled to 'Registered safety signs'. A new part on colorimetric and photometric properties of safety sign materials was also added to the series.

The revised SS 508 now consists of the following five parts, under the general title 'Graphical symbols — Safety colours and safety signs':

- Part 1: Design principles for safety signs and safety markings (Identical adoption of ISO 3864-1:2011)
- Part 2: Design principles for product safety labels (Identical adoption of ISO 3864-2:2004 and ISO 3864-2:2004/Amd 1:2011)
- Part 3: Design principles for graphical symbols for use in safety signs (Identical adoption of ISO 3864-3:2012)
- Part 4: Colorimetric and photometric properties of safety sign materials (Identical adoption of ISO 3864-4:2011)
- Part 5: Registered safety signs (Identical adoption of ISO 7010:2011, ISO 7010:2011/Amd 1:2012, ISO 7010:2011/Amd 2:2012 and ISO 7010:2011/Amd 3:2012)

With this standard, there is harmonisation of all safety signs used in workplaces and public areas which will result in better understanding and communication of safety information.

This part of SS 508 is identical with ISO 3864-1: 2011 - 'Graphical symbols - Safety colours and safety signs - Part 1: Design principles for safety signs and safety markings', published by the International Organization for Standardization. It is applicable to all locations where safety issues related to people need to be addressed. However, it is not applicable to the signalling used for guiding rail, road, river, maritime and air traffic and, generally speaking, to those sectors subject to a As amended, regulation which may differ. Symbols, labels and safety signs for chemicals and dangerous goods can be found in the following documents:

Dec 16

- SS 586 Specification for hazard communication for hazardous chemicals and dangerous a) goods
 - Part 1: Transport and storage of dangerous goods
 - Part 2: Globally harmonized system of classification and labelling of chemicals Singapore's adaptations
 - Part 3: Preparation of safety data sheets (SDS)
- b) The Globally Harmonised System of Classification and Labelling of Chemicals (http://www.unece.org/trans/danger/publi/ghs/ghs_pubdet.html)

c) The UN Recommendations on the Transport Of Dangerous Goods Model Regulations (http://www.unece.org/trans/danger/publi/unrec/rev19/19files_e.html)

Attention is drawn to the following:

- Where the words 'this part of ISO 3864' appear, they should be interpreted as 'this part of SS 508'.
- 2. The comma has been used throughout as a decimal marker in ISO 3864-1, whereas in Singapore Standards it is a practice to use a full-point on the baseline as the decimal marker.
- The reference to International Standards shall be replaced by the following Singapore Standards:

International Standard Corresponding Singapore Standard

ISO 3864-2 SS 508 : Part 2 : 2008 (2013)

ISO 3864-3 SS 508 : Part 3 : 2013 ISO 3864-4 SS 508 : Part 4 : 2013 ISO 7010 SS 508 : Part 5 : 2013

Attention is drawn to the possibility that some of the elements of this Singapore Standard may be the subject of patent rights. Enterprise Singapore shall not be held responsible for identifying any or all of such patent rights.

NOTE

- 1. Singapore Standards (SSs) and Technical References (TRs) are reviewed periodically to keep abreast of technical changes, technological developments and industry practices. The changes are documented through the issue of either amendments or revisions.
- 2. An SS or TR is voluntary in nature except when it is made mandatory by a regulatory authority. It can also be cited in contracts making its application a business necessity. Users are advised to assess and determine whether the SS or TR is suitable for their intended use or purpose. If required, they should refer to the relevant professionals or experts for advice on the use of the document. Enterprise Singapore shall not be liable for any damages whether directly or indirectly suffered by anyone or any organisation as a result of the use of any SS or TR.
- Compliance with a SS or TR does not exempt users from any legal obligations.

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.

International Standards are drafted in accordance with the rules given in the ISO/IEC Directives, Part 2.

The main task of technical committees is to prepare International Standards. Draft International Standards adopted by the technical committees are circulated to the member bodies for voting. Publication as an International Standard requires approval by at least 75 % of the member bodies casting a vote.

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.

ISO 3864-1 was prepared by Technical Committee ISO/TC 145, *Graphical symbols*, Subcommittee SC 2, *Safety identification*, *signs*, *shapes*, *symbols and colours*.

This part of ISO 3864, together with ISO 3864-4, cancels and replaces ISO 3864-1:2002, which has been technically revised.

ISO 3864 consists of the following parts, under the general title *Graphical symbols* — *Safety colours* and safety signs:

- Part 1: Design principles for safety signs and safety markings
- Part 2: Design principles for product safety labels
- Part 3: Design principles for graphical symbols for use in safety signs
- Part 4: Colorimetric and photometric properties of safety sign materials

Introduction

There is a need to standardize a system of giving safety information that relies as little as possible on the use of words to achieve understanding.

Continued growth in international trade, travel and mobility of labour requires a common method of communicating safety information.

Lack of standardization may lead to confusion and the risk of accidents.

The use of standardized safety signs does not replace proper work methods, instructions and accident prevention training or measures. Education is an essential part of any system that provides safety information.

NOTE Information on procedures, criteria of acceptability, safety sign templates and application of safety signs are given on the website: http://www.iso.org/tc145/sc2.

Graphical symbols - Safety colours and safety signs -

Part 1:

Design principles for safety signs and safety markings

IMPORTANT — The colours represented in the electronic file of this part of ISO 3864 can be neither viewed on screen nor printed as true representations. Although the copies of this part of ISO 3864 printed by ISO have been produced to correspond (with an acceptable tolerance as judged by the naked eye) to the colour requirements, it is not intended that these printed copies be used for colour matching. Instead, consult ISO 3864-4 which provides colorimetric and photometric properties together with, as a guideline, references from colour order systems.

1 Scope

This part of ISO 3864 establishes the safety identification colours and design principles for safety signs and safety markings to be used in workplaces and in public areas for the purpose of accident prevention, fire protection, health hazard information and emergency evacuation. It also establishes the basic principles to be applied when developing standards containing safety signs.

This part of ISO 3864 is applicable to all locations where safety issues related to people need to be addressed. However, it is not applicable to the signalling used for guiding rail, road, river, maritime and air traffic and, generally speaking, to those sectors subject to a regulation which may differ.

NOTE Some countries' statutory regulations might differ in some respect from those given in this part of ISO 3864.

2 Normative references

The following referenced documents are indispensable for the application 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.

ISO 3864-3, Graphical symbols — Safety colours and safety signs — Part 3: Design principles for graphical symbols for use in safety signs

ISO 3864-4, Graphical symbols — Safety colours and safety signs — Part 4: Colorimetric and photometric properties of safety sign materials

ISO 17724:2003, Graphical symbols — Vocabulary