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INTERNATIONAL STANDARD

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Touch and interactive displays –
Part 13-10: Reliability test methods of touch displays – Environmental durability test methods

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FOREWORD

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International Standard IEC 62908–13–10 has been prepared by IEC technical committee TC 110: Electronic display devices.

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

CDV	Report on voting
110/748/CDV	110/790A/RVC

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.

A list of all parts in the IEC 62908 series, published under the general title *Touch and interactive displays*, can be found on the IEC website.

The committee has decided that the contents of this document will remain unchanged until the stability date indicated on the IEC website under "http://webstore.iec.ch" in the data related to the specific document. At this date, the document will be

- reconfirmed,
- withdrawn,
- replaced by a revised edition, or
- amended.

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IMPORTANT – The 'colour inside' logo on the cover page of this publication indicates that it contains colours which are considered to be useful for the correct understanding of its contents. Users should therefore print this document using a colour printer.

INTRODUCTION

This part of IEC 62908 was developed in response to the demand for standardization of the test methods for the endurance of touch displays.

The touch display is one of the most important interfaces between a user and a display. Various technologies for touch displays have been developed, and it is expected that touch display technology will make rapid progress in the future. This document is especially effective for capacitive and resistive touch displays.

Durability is one of the most important aspects of touch display modules. Touch displays connected to display modules are used under a variety of environmental conditions, including indoor/outdoor, hot/cold, dry/humid, for long periods of time and may be subjected to severe environmental stress.

This document describes standardized test methods to evaluate the durability of touch displays subjected to environmental stresses. It is valid for research and development, quality assurance, and comparison of devices when making purchasing decisions.

TOUCH AND INTERACTIVE DISPLAYS –

Part 13-10: Reliability test methods of touch displays – Environmental durability test methods

1 Scope

This part of IEC 62908 specifies the methods for testing the environmental durability of touch display modules, touch sensor modules and test pattern cells, and can be used for devices at the production level, the prototype level or the trial model level when they are exposed to environmental stress.

This document is applicable for touch displays that use capacitive or resistive detection sensors. It may also be applicable to other types of sensors as well as to touch display modules with both flat and flexible displays.

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 60068-1:2013, *Environmental testing – Part 1: General and guidance*

IEC 60068-2-1, *Environmental testing – Part 2-1: Tests – Test A: Cold*

IEC 60068-2-2, *Environmental testing – Part 2-2: Tests – Test B: Dry heat*

IEC 60068-2-14, *Environmental testing –Part 2-14: Tests – Test N: Change of temperature*

IEC 60068-2-30, *Environmental testing – Part2: Tests – Test Db: Damp heat, cyclic (12 + 12 h cycle)*

IEC 60068-2-78, *Environmental testing – Part 7-38: Tests – Test Cab: Damp heat, steady state*

IEC 61747-30-1:2012, *Liquid crystal display devices – Part 30-1: Measuring methods for liquid crystal display modules – Transmissive type*

IEC 62906-1-2[1], *Touch and interactive displays – Part 1-2: Generic – Terminology and letter symbols*

IEC 62908-12-10[2], *Touch and interactive displays – Part 12-10: Measurement methods of touch displays – Touch and electrical performance*

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1 Under preparation. Stage at the time of publication: IEC CDV 62908-1-2:2016.

2 Under preparation. Stage at the time of publication: IEC CDV 62908-12-10:2016.