

# IEEE Standard Reliability Program for the Development and Production of Electronic Products

IEEE Reliability Society

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IEEE Std 1332™-2012  
(Revision of  
IEEE Std 1332-1998)

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(Revision of  
IEEE Std 1332-1998)

# **IEEE Standard Reliability Program for the Development and Production of Electronic Products**

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**Standards Committee  
of the  
IEEE Reliability Society**

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**IEEE-SA Standards Board**

**Abstract:** A standard set of reliability program objectives for use between customers and producers, or within product development teams, to express reliability program requirements early in the development phase of electronic products and systems is provided in this document.

**Keywords:** electronic equipment, electronic systems, electronics, IEEE 1332, reliability, reliability program, reliability program standard

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## Introduction

This introduction is not part of IEEE Std 1332-2012, IEEE Standard Reliability Program for the Development and Production of Electronic Products.

The original version of IEEE Std 1332<sup>TM</sup> was developed in 1998 in response to the impending cancellation of MIL-STD-785, “Reliability Program for Systems and Equipment Development and Production.” The intent was to create a reliability program standard that would be equally useful to both the commercial and military sectors of industry. Initial recommendations from industry, government, and academia were solicited through a questionnaire published in the April 1994 *IEEE Reliability Society Newsletter*. The recommendations formed the basis for the document’s philosophy.

The current revision of IEEE Std 1332 incorporates concepts and practices introduced in the two recently issued reliability program-related standards, IEEE Std 1624<sup>TM</sup> [B6]<sup>a</sup> and ANSI/GEIA-STD-0009 [B3]. IEEE Std 1624 defines the term, “organizational reliability capability,” and provides specific criteria for assessing the capability of organizations to design and produce systems and products that consistently meet reliability requirements. These criteria were structured around three reliability program objectives defined in the original version of IEEE Std 1332 and were elaborated through the identification of eight key practices with associated activities.

ANSI/GEIA-STD-0009 provides additional requirements for reliability management practices, design, and testing activities that make up an effective reliability program, without being prescriptive with regards to the specific methods used to accomplish those requirements.

This document recognizes the reliability program structures described in IEEE Std 1624 [B6] and ANSI/GEIA-STD-0009 [B3] and incorporates these into the compliance requirements for an effective reliability program. It has been written to address the needs of both military program managers, where products are typically developed on the basis of contractual specifications, and the commercial sector, where products may be designed and manufactured without the prior receipt of an order.

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<sup>a</sup> The numbers in brackets correspond to those of the bibliography in Annex A

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## 1. Overview

### 1.1 Scope

This document provides a standard set of reliability program objectives for use between customers and producers, or within product development teams, to express reliability program requirements early in the development phase of electronic products and systems.

### 1.2 Purpose

The purpose of this document is to establish a standard set of objectives which provide an effective structure for the life-cycle activities needed to design, manufacture and utilize reliable electronic products and systems across the supply chain.