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AS 3901—1987  
NZS 9001:1990  
ISO 9001:1987

Australian Standard®  
New Zealand Standard

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**Quality systems for  
design/development, production,  
installation and servicing**

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(ISO Title: Quality systems—Model for quality assurance in  
design/development, production, installation and servicing)

AUS CC  
NZ DD



Standards Association  
of New Zealand

STANDARDS AUSTRALIA



## AS 3901—1987/NZS 9001:1990/ISO 9001:1987

This Standard was prepared under a joint arrangement by the Standards Association of New Zealand and Standards Australia. NZS 9001 (formerly NZS 5601) was approved for publication on behalf of the Council of New Zealand on 9 October 1987 and AS 3901 on behalf of the Council of Standards Australia on 3 September 1987. This Joint Standard was published on 11 June 1990.

**The following organizations are represented on the Committees responsible for this Standard:**

### **Standards Association of New Zealand Committee 56/1, Quality Assurance/Management Standards**

Cadform Manufacturing Services Limited  
Department of Scientific and Industrial Research—Auckland Industrial Development Division  
International Quality Consultants Limited  
Massey University  
Ministry of Works and Development  
New Zealand Dairy Board  
Standards Association of New Zealand  
Testing Laboratory Registration Council of New Zealand  
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U.E.B. Packaging Limited

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### **Standards Australia Committee QR/-, Quality and Reliability Standards.**

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Bureau of Steel Manufacturers of Australia  
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Department of Defence  
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Department of Transport and Communications  
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Suggestions for improvements to Australian and New Zealand Standards, addressed to the head office of the relevant organizations are welcomed. Notification of any inaccuracy or ambiguity found in either an Australian or New Zealand Standard should be made without delay in order that the matter may be investigated and appropriate action taken.

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## AS 3901—1987 PREFACE

This Standard is identical with ISO 9001—1987, Quality systems—Model for quality assurance in design/development, production, installation and servicing, published by the International Organization for Standardization (ISO). It has been adopted under the direction of the Quality and Reliability Standards Committee.

The Australian Committee provided input to the International Committee ISO/TC 176 in the preparation of ISO 9000 to ISO 9004 and following a review of the final Standards it was decided that these should be endorsed in the interests of international harmonization and trade and issued nationally using a dual-number Australian Standard/ISO Standard reference.

This Standard specifies requirements for a quality system covering all aspects of a product including design, development, production, delivery and servicing.

The text of the International Standard has been approved for publication as an Australian Standard without deviation. However, where the words 'International Standard' appear in this Standard, they should be read as 'Australian Standard'.

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## NZS 9001:1990 FOREWORD

These Standards have been prepared by the Standards Association of New Zealand at the request of the New Zealand Organisation for Quality Assurance which considered there was a need to provide clear guidance on Quality Assurance/Management Standards and a basis for training in New Zealand.

The Standards, previously numbered in the NZS 5600 series have been renumbered without change to the technical content and are identical in all respects to the ISO 9000-4 series, hence the dual numbering system.

There are three quality assurance levels defined in the Standards. Each level in the series is less comprehensive than the one above it. The cross-reference list of quality system Standards given in the Annex of NZS 9000 (ISO 9000) shows the decreasing requirements by clause. The list will assist when cross-referencing or upgrading from one Standard to another.

When contractually required to produce a product or provide a service to one of the Standards, suppliers should consider the benefits to them of implementing the applicable additional requirements of the higher levels.

The objectives of these Standards are:

- (a) To provide a customer with the assurance that a quality product or service will be supplied.
- (b) To give the supplier the minimum guidelines to allow the development of an appropriate quality management system which can demonstrate product or service Quality Assurance to the customers.

The selection of any one Standard does not change the contractual requirements to produce a product or provide a service of the required quality. Specifying a more comprehensive Standard does, in general, provide the customer and the supplier with greater assurance, supported by documentary evidence, that the quality requirements will be met providing that the quality assurance system is implemented and is effective.

For selecting and implementing the most appropriate Standard, the use of NZS 9000 (ISO 9000) Quality Systems—Guide to selection and use and NZS 9004.1 (ISO 9004) Quality management and quality system elements—Guidelines is recommended. These guidelines provide explanations and suggest means for satisfying the requirements of the Standard.

For some products or services, specifying a more comprehensive Standard may not lead to a higher degree of assurance. Selection of the appropriate Standard should be made by considering the parameters that are inherent in the product or service.

It should be noted that the quality system of an organization is influenced by the objectives of the organization, by the product or service and by the practices specific to the organization, and, therefore, the quality system varies from one organization to another and must suit that organization's operation.

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# Quality systems — Model for quality assurance in design/development, production, installation and servicing

## 0 Introduction

This International Standard is one of a series of three International Standards dealing with quality systems that can be used for external quality assurance purposes. The alternative quality assurance models, set out in the three International Standards listed below, represent three distinct forms of "functional or organizational capability" suitable for two-party contractual purposes :

- ISO 9001, *Quality systems — Model for quality assurance in design/development, production, installation and servicing.*

For use when conformance to specified requirements is to be assured by the supplier during several stages which may include design/development, production, installation and servicing.

- ISO 9002, *Quality systems — Model for quality assurance in production and installation.*

For use when conformance to specified requirements is to be assured by the supplier during production and installation.

- ISO 9003, *Quality systems — Model for quality assurance in final inspection and test.*

For use when conformance to specified requirements is to be assured by the supplier solely at final inspection and test.

It is emphasized that the quality system requirements specified in this International Standard, ISO 9002 and ISO 9003 are complementary (not alternative) to the technical (product/service) specified requirements.

It is intended that these International Standards will normally be adopted in their present form, but on occasions they may need to be tailored for specific contractual situations. ISO 9000 provides guidance on such tailoring as well as selection of the appropriate quality assurance model, viz ISO 9001, ISO 9002 or ISO 9003.

## 1 Scope and field of application

### 1.1 Scope

This International Standard specifies quality system requirements for use where a contract between two parties requires the demonstration of a supplier's capability to design and supply product.

The requirements specified in this International Standard are aimed primarily at preventing nonconformity at all stages from design through to servicing.

### 1.2 Field of application

This International Standard is applicable in contractual situations when

- a) the contract specifically requires design effort and the product requirements are stated principally in performance terms or they need to be established;
- b) confidence in product conformance can be attained by adequate demonstration of certain supplier's capabilities in design, development, production, installation and servicing.

## 2 References

ISO 8402, *Quality — Vocabulary.*

ISO 9000, *Quality management and quality assurance standards — Guidelines for selection and use.*

## 3 Definitions

For the purposes of this International Standard, the definitions given in ISO 8402 apply.

NOTE — For the purposes of this International Standard, the term "product" is also used to denote "service", as appropriate.