

(ISO 9000)

Studies on the Certification Methodology
according to the ISO 9000 Series

(ISO 9000)

(ISO 9000) 가

(ISO)가 가 100 가 .

()가 가 가 3 가 ISO 9000 100

125,000 가 ,

1993 UR 가

4,622)

1994 7 (

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ISO 9000

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Summary

Nations of the world have implemented certifications system for safety, sanitation, environmental preservation and protection of consumers, and there are various types of certification including test/inspection report.

With industrial development manufactured goods began to be mass-produced, and it became difficult for consumer to tell their quality. Thus the product certification system was developed and implemented to allow production license(according to Food Hygiene Act) or usage of certain marks(e.g, KS-mark, Traditional Food Certification Mark, etc) for products conforming to the specifications or technical criteria with focus on safety and sanitations in usage or consumption of the manufactured goods. Then came the recognition that the certification based on specifications and technical criteria levels is problematic in continuously maintaining sufficient level of quality, leading to the development of certification based on the assessment of the company's quality assurance system.

In other hands, different countries had different specifications and operating methods for. But in the case of certification system related to assessment of the quality management system, i.e., the certification system for quality assurance ability, ISO(International Organization for Standardization) established requirements of quality assurance system of companies supplying goods or services worldwide and operating principles of the certification system with a view to removing barriers to international trade. This Standards are a series of ISO 9000.

The international trend of the ISO 9000 certification system is shown below :

- More than 100 countries are now implementing the third party certification(assessment and registration) system to certify conformity to the ISO 9000 standards. And More than 125,000 companies of worldwide are registered their quality assurance system according to the ISO 9001, 9002 or 9003 standards.
- Meeting or exceeding the requirements of the ISO 9000 standards is essential because the standards are the basis of the establishment and

operation of EOTC(European Organization for Test Certification) if they want to export to the newly unified single European Market.

- National or International product certification system include quality assurance system as a prerequisite for licence of a certain mark to be used on products.

The characteristics of ISO 9000 Standards are shown below :

- ISO 9000 system is the certification system giving priority to customer satisfaction.
- This is the quality assurance system that satisfies both supplier and customer simultaneously.
- This assesses organizational ability of quality assurance of producing products.
- This requires thorough documentation.
- This also assesses invisible products, i.e., services.
- This is a preventive system to ensure no defective products are produced or used by establishing a quality system within the organization.

Certification scheme of quality assurance system based on ISO 9000 has adopted 100 countries from the world, and above 125,000 firms were registered by this certification scheme. And we are living in the era of Gloval Village. With marked development of transportation and communication the successful conclusion of the Uruguay Round negotiations is expected to remove trade barriers of the nation, making the whole world into a single market. With the consumer's scope of choice will further to be extended, and international competition is growing tougher.

To survive the competition we must establish quality strategies to satisfy customers and must build the quality assurance system. Generally, domestic food firms have poor ability to establish the quality assurance system in their organizations. It is needed to be introduced the certification

scheme of quality assurance system to improve the ability of food firm's quality assurance.

The purpose of this study is to introduce the certification scheme of quality assurance system for food firms to promote their quality assurance ability and assist export. Through this study we investigated the ISO 9000 standards and related ISO's standards. Also, we have studied "Quality Management Promoting Act" to investigate the national certification scheme and requirements based on the ISO 9000.

It is necessary that KFRI(Korea Food Research Institute) is registered as a specialized certification body for food industry. KFRI will be able to improve the food firm's quality assurance ability and develop the quality systems for food firms. KFRI shall register as a specialized certification body of quality assurance system for food industry in next year. To do this, we developed quality manuals and 14 procedures and trained 3 premature auditors that required by the "Quality Management Promotin Act". And we will carry out more studies to register KFRI as a certification body that meets to the requirements of criteria specified bt the "Quality Management Promotion Act" by ourselves.

In the other hands, we developed guideline document to assist the food firms that want to build a quality assurance system in their organizations. This document will provide guidelines for interpretation and implementation of ISO 9000 series standards to build a quality assurance system in food firms.

It is necessary to use the certification scheme as a export promoting tools of domestic processed foods and developing effective quality assurance systems for food firms.

CONTENTS

. Introduction

1. Motivation
2. Purpose and Scope
3. The Certification Scheme of Quality Assurance System

. Quality Management and ISO 9000 Series

1. Introduction
2. The Background of Developing Standards of Quality System
3. Quality Management in Japan(Total Quality Control)
4. Quality Management in U.S.A.
5. Quality Management in Food Industry

. The Standards of ISO 9000 Series

1. The Establishment of ISO 9000 and Related Standards
2. Present Status and Contents of ISO 9000 Series Standards
3. International Standards and Related Organization

. Certification Scheme based on the ISO 9000 Series

1. Operating System of Certification Scheme based on the ISO 9000 Series
2. Present Operating Status of Certification Scheme based on the ISO 9000 Series

. Requirements of ISO 9001/KS A 9001 Standards

1. Overview
2. General Interpretation of Requirement Articles

. Base Building to Register the Certification Body

1. Education/Training and Consulting
2. Development of Quality Document for Certification Body

. Conclusion

1. The Result of Studies
2. Recommendation to Utilize the Results
3. A Countermeasure of Effective Project Execution
4. Utilization of the Results
5. Expected Effect

APPENDIX

. Booklet of ISO 9000/10010 Series Standards

1. ISO 8402/9000- 1/9000- 2/9000- 3/9000- 4
2. ISO 9001/9002/9003/9004- 1 7(including DIS)
3. ISO 10011- 1 3/10012- 1 2/10013/10014(including DIS, CD, WD)

. Booklet of Quality Systems for the Food and Drink Industry

1. Introduction
2. Foreword
3. Scope and Field of Application
4. Application Guidance of ISO 9001 in the Food and Drink Industry
5. Promoting Procedure of Certification Register based on the ISO 9000 Series

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2 ISO 9000

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3 ISO 9000

- 1 ISO 9000
- 2 ISO 9000
- 3

4 ISO 9000

- 1 ISO 9000
- 2 ISO 9000

5 ISO 9001/KS A 9001

- 1

2 ISO 9001(1994)

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] ISO 9000/10010

1. ISO 8402/9000- 1/9000- 2/9000- 3/9000- 4
2. ISO 9001/9002/9003/9004- 1 7(DIS)
3. ISO 10011- 1 3/10012- 1 2/10013/10014(DIS, CD, WD)

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- 1.
- 2.
- 3.
4. ISO 9001:1994
5. ISO 9000

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1.

1993 (WTO) (UR)가 1995
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 가 10 “ ” 가
 “ 가 ”
 , UR “ ” “ (GR)”
 “ (OHS)”, “ (BR)” “ (TR)”
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 가 WTO() “ ”가
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 , APEC EU NAFTA
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 ’94 SPS TBT WTO
 CODEX , CODEX

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4. ISO 9000

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ISO 9000

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(ISO)가 1987
 (ISO 9000)
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1959 NATO
 MIL-Q-9858 A GMP(
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 가 ANSI/ASQC C1 Z1,15 ,
 (BS5750) ,
 가 3
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3 가 , “
EC
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NATO
가 (BS 5750)
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ISO 1987 ISO 9000 ANSI/ASQC Z1, 15 BS
5750 1987 ISO 9000 가 ,
1994 1 .
(ISO)
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TC 176 ,
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(ISO 8402 : 1994) , (ISO)가
 가 ,
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 가 , (Quality Assurance;QA) ‘
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 ISO 9000 가 .

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W.E. Deming

2.

(Quality System) 가 Requirements" . (Quality Assurance Program) MIL- Q- 9858, "Quality Control System

2 가 30% 1952

(Recommendation) 1957 1958 1959 4 9 1960 1963 MIL- Q- 9858A " (Quality Program Requirements)"

/ 70 80% 가 (Systematic Approach)

3.

MIL- Q- 9858A 가

(NASA) 1962
Quality Publication NPC 200-2 "Quality Program Provision for
Space System Contractors" NATO 1968
NATO A.Q.A.P-1 "Quality System Requirements for Industries"
DEF · STANS

(BSI) 1972 가
BS 4891 - "Quality Assurance Guidelines"

1975 DEF. STANS 05- 21, 22, 24, 25, 29, 30 가
(3 Part) BS 5179가

1979 BS 5750

10CFR50,
Appendix.B(Quality Assurance Criteria for Nuclear Power Plants and Fuel
Reprocessing Plants, 1968), ANSI N45.2 CEGB QA42(1980
BS 5882)

1970

가

, 1978

CSA Z 299

가
(BS 5882가
) BS 5750 Part 1, 2, 3
ISO 9000

1955

2.

2 1955 " SQC"

가 1954 J.M. Juran 가 "

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A.V. Feigenbaum 1950
(rol)'

(Total Quality GE
Cont-

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QC

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1955

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『QC

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1960
가 (Company Wide
Quality Control) (Total Quality Control)

3. TQC

1970 1,2
가 (Product Liability) 가

1960 TQC 1970
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Effect Analysis:) FMEA(Failure Mode &
가

TQC 3가 TQC

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TQC

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 1970
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 TQC
 가 TQC 1. 10가 ,
 1. TQC

- 1) , 가 QC
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- 2) 가 가
- 3) PDCA
- 4) QC
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- 5) . .
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- 6) QC
 - TQC QC
 - QC 『QC 』, 『QC
 - 』 .
- 7) QC
 - .
 - Case Study,
 - , .
- 8) QC
 - QC
 - QC , Operation Research,
 - ,
- 9)
 - , , QC
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- 10) QC
 - QC가

4. TQC ISO 9000

SQC

(TQC)

TQC

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TQC ISO 9000

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ISO 9000

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4

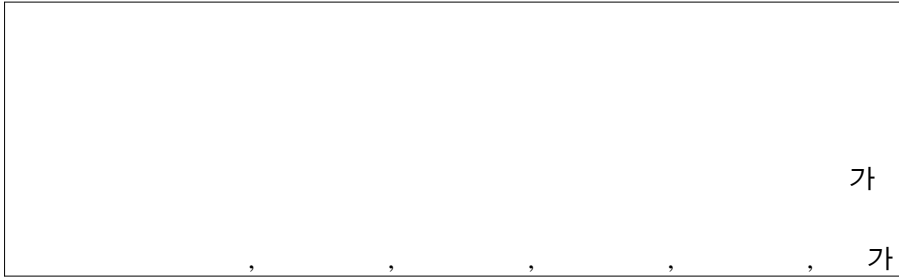
1. TQM(Total Quality Management)

TQC
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1988 Malcolm
 Baldrige Quality Award . Malcolm Baldrige Quality Award

TQM(Total Quality Management)
 . TQM .

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 가 .



1. Total Quality Management

2. TQM 3

가. (Customer Focus)

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(Process Improvement)

: 가 ,
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가(Total Involvement)

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3. TQM 6

가. (Leadership)

: , TQM TQM
가 .

TQM

(Education & Training)

: , , ,

(Supportive Structure)

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(Communication)

: 가 .

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(Reward & Recognition)

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TQM

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TQM

가(Measurement)

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Practices)

(Good Manufacturing

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, 1940
Analysis and Critical Control Points)가

(Hazard

1970

3 ISO 9000

1 ISO 9000

1 TC 176 ISO 9000

2 가 가

가 가

(ISO) (IEC)

(British Standard Institute ; BSI)

(Technical Committee ; TC) ISO

, ISO 1979 "

" TC 176 .

1980 5 TC 176 가 ,

2 (Sub-Committee, SC) 4 (Working Group, WG)

5 TC 176

, 1985 10 TC 176 5

ISO/DIS- 8402, 9000, 9001 9004 6 . ,

1986 ISO 8402()가, 1987 ISO 9000 9004

TC 176 6 가 7

1994 .

2. ISO 9000

ISO 9000 BS 5750 BS 4891,

AFNOR X 50-110, DIN 55-355, NRN 2646, CSA

Z 299 가 ANSI/ASQC Z 1.15, MIL-Q-9858A,

ANSI/ASQC C-1 ASME NQA-1 ,

ANSI/ASQC Z 1.15 BS 5750 CSA Z 299가 ISO 9000

가 . ANSI/ASQC Z 1.15

(Guideline) BS 5750 CSA Z 299 (Multi-level,

) , (Requirements) 가

. BS 5750 3 , CSA Z 299 4 .

ISO 9004
Z 1.15 TC 176 SC 2, WG 2
BS 5750

ANSI/ASQC
, ISO 9001 9003
WG 3

3. ISO 9000

1994 ISO 9000 9004 ,
ISO 9001 ISO 9003
ISO 9000

ISO 9000

ISO 9000 ISO 9004 (Part) 가
TC 176 ISO가 10010

ISO 9000 10010

2 3

2 ISO 9000

1 TC 176

ISO 8402가 1987 ISO 9000

1996 100 가

ISO 9000 , 가

ISO 9000

ISO TC 176 가

, ISO 9000

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2. ISO 9000

(1995)

ISO				KS
8402	1986	1994	-	A 8402
9000- 1	1987	1994	-	A 9000
9000- 2	1993		1 - 2 ISO 9001,	
9000- 3	1991		ISO 9002 ISO 9003 - 3 ,	CP A 1011
9000- 4	1993		ISO 9001 - 4	
9001	1987	1994	- , , ,	A 9001
9002	1987	1994	- ,	A 9002
9003	1987	1994	-	A 9003
9004- 1	1987	1994	- 1	A 9004
9004- 2	1991		- 2	CP A 1012
9004- 3	1993		- 3 가 (Processed Materials)	
9004- 4	1993		- 4 (Quality Improvement)	
9004- 5 (DIS)			- 5 (Quality Plan)	
9004- 6 (WD)			- 6 (Project Management)	
9004- 7 (DIS)			- 7 (Configuration Management)	

* DIS Draft International Standard

* CD : Committee Draft.

* WD : Working Group Draft.

3. ISO 10010

(1995)

ISO			KS
10011- 1	1990	- 1	CP A 1013
10011- 2	1991	- 2	CP A 1014
10011- 3	1991	- 3	CP A 1015
10012- 1	1992	- 1 (Metrological confirmation system)	CP A 1016
10012- 2 (CD)		- 2 (Measurement Assurance)	
10013 (DIS)		(Quality Manual)	
10014 (WD)		(Economics of Quality)	

* DIS Draft International Standard

* CD : Committee Draft.

* WD : Working Group Draft.

ISO 9000

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2. ISO 9000

ISO 9000 , (가
ISO 9001, 9002,
9003 ,
가 (CEN/CENELEC, NAFTA, APEC)
(IEC/ISO, CEFIC, IEEE, CODEX) ,
ISO 9000
(TC
176 , Proliferation) ISO 9000
, TC 176

ISO 9000 , ISO 9000
9001 9003 가

가 ISO 9000
가

TC 176

3. ISO 9000

2 ISO 9000 , 9001 9003
가 9000-1 9004-1 가 가

ISO 9001 , 9002
/ /

9003 ()

, ISO 9004-1 9001 9003

가 TQC TQM
9001

, ISO 9001, 9002, 9003

가 1994

ISO 9000-1

, 가 -ISO 9001, 9002, 9003-

9000-2 ISO 9001, 9002, 9003
1987 ISO 9001, 9002, 9003

ISO 8402 , 9000
ISO 8402

ISO 9000 가
가 ,

4. ISO 10010

ISO 10010 ISO 9000
1990 ISO
1995 4 1 (DIS)
ISO 9000

3

가

10011- 1, 10011- 2, 10011- 3 3가
10012 4

10011 3가

10013

5. ISO 9000 10010

ISO 9000 10010 ISO 9000 Family

가

ISO 9000 Family
KS

가

Improvement),

(Quality Assurance),
(Quality Control) 3가 가

(Quality

가

KS

ISO 9000

ISO 9004 4

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ISO 9000- 1

9000-2, 9000- 3 9000- 4

ISO 9001/9002/9003

ISO 10011 3가

10012 10013

ISO 9000 10010
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2	ISO 9004-2 ISO 9004-3 ISO 9004-4

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1	ISO 9004-1

	Roadmap	
2	ISO 9000-1	2

	ISO 9001, 9002, 9003	1

	(QA)	
	ISO 9000-2 ISO 9000-3 ISO 9000-4	2

	(Q Technology)	
	ISO 10010	

2. ISO 9000 10010

1.

International Organization for Standardization) (ISO:
 International Electrotechnical Commission) (IEC:
 Alimentarius Commission)가 (CAC: Codex
 IEC 1906 , ISO 1928
 ISA 1947
 UN
 (FAO) (WHO)가 1962
 (CAC)가

가
 , ISO 100 IEC 40 가
 , ISO IEC 1963 가
 146 가
 , 1970 가 .

ISO IEC가 CAC가
 , 170
 (TC, Technical Committee)가

IEC 80 가
 , CAC 5 30 .

“ ” (ISO/IEC GUIDE 2) , 가 ,

“ (ISO/IEC GUIDE 21)” 가 ISO/IEC

ISO 9000

ISO 9,300
, IEC 2,000

6,500
, 1990

237

41

CAC
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가 가

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Group
Committee

NP(
) , CD(Subcommittee
) , IS()

), WD(Working
) , DIS(Technical

3가

ISO IEC CAC

, ISO,

IEC CAC 가
가

2. GATT WTO

(GATT: General Agreement on Tariffs and
Trade) 1948 7 1983 5
(SUMMIT)

1986 9 GATT (UR : Uruguay
Round) , 1993 12
, 1995 GATT
(WTO)

1973 1979 7 GATT ,
“
(Agreement on Technical Barriers to Trade)”
"STANDARD CODE" (Preamble)
15 3

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GATT
(Code)
, GATT

STANDARD CODE

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1, 2 가 가

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1950 1960 EC 1980 EC

, , EC 1985

, 가 가 12 가

3 4,000 , EU(European Union)

1985 EC , EC 가

, EC , EC

(IM: Internal Market)

1985 "EC 1992 (IM Program)"

"Completing the Internal Market, White Paper from the Commission to the European Council"

EC 가 , (1957.3.25) 가

1992 12 31

. EU

1985 EU 가 , "New Approach to Technical Harmonization and Standardization"가 , , , EU (Directives) (CEN/CENELEC) (Selective Harmonization) (mutual recognition)

1992 4,600 (EN:Europeaiche Norm)

, 1987 ISO 9000

EN 29000 ,

1989 ISO 10010 EN 45000

(CEN/CENELEC)가 .

EU (Regulation), (Directives),

(EN)

(Regulation):

EU

가 ,

(Directives):

(EN):

가

EU

(HD: Harmonization Document): EN

(ENV: Europäische Vornormen):

가

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EU

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1989 “

(A global Approach to Certification and Testing)”

가(Conformity Assessment)

8

(Module: A H)

7

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CE(Certification Europe'en)

가

EU

1990

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(EOTC:Eur-

opean Organisation for Testing and Certification)

EU

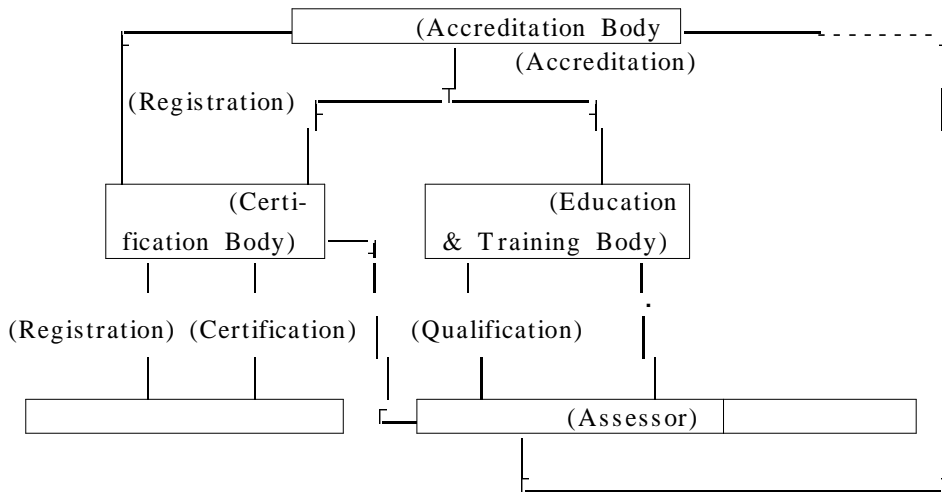
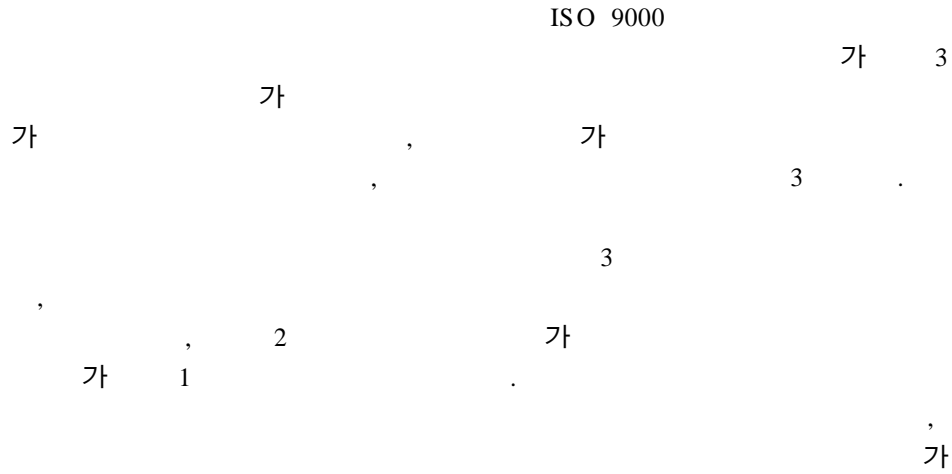
ISO 9000

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4 ISO 9000

1 ISO 9000

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3. ISO 9000

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ISO/IEC GUIDE 2 :

ISO/IEC GUIDE 62- 1996 :

IAF GUIDELINE : ISO/IEC GUIDE 62

ISO 8402- 1994 :

ISO 10011- 1 ; 1990 :

ISO 10011- 2 ; 1991 :

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ISO 8402 ; 1994 :

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ISO 9001 9003 ; 1994 :

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ISO 10011-1 ; 1990 :

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ISO 10011-2 ; 1991 :

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ISO 10011-3 ; 1991 :

- 3 ;

IATCA ; 1996 :

(IATCA Minimum Criteria for Quality Management System Auditors)

5.

6.

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3. 가

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, (Department of Trade and Industry) . 가
 / NACCB(National
 Accreditation Council of Certification Bodies) ,
 / IQA(Institute of Quality
 Assurance) .

BSI QA 48

(Ministere Des Affaires Economiques)가
 , RvC(Road voor de Certifi-
 catie) .

RvC

/

BVQI 17

(Ministere Des Affaires Economiques)가

가

“BELCERT
(B.O.G. 14. 10.1993 : NBN- EN 45000

1993 9 6

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BELCERT

AIB- Vincotte Inter 11

가

가

(Department
of Trade and Industry) , 가 ANSI/RAB joint programme
“American National Accreditation Program for Registrars of Quality System”
ANSI/RAB(Registrar Accreditation Board)

UL(Underwriters Laboratories), Inc. 43

가

(Department of Consumer and
Company)

가

SCC(Standards Council of Canada)

Standards Board 12

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Canadian General

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가 ISO 9003 가 50%

2 ISO 9000

1.

1987 ISO가 ISO 9000

99 가 , 1995
125,000 가 ,

7. . 65.2%가 9001, 34.1%
9002 , 9003 0.7% .

7. 3 ISO 9000

\ %	93 1	93 9	94 6	95 3	95 12
	66.8	60.3	52.3	46.3	41.3
()	16.2	20.8	26.4	29.2	31.4
	4.3	5.6	6.9	7.6	8.0
	6.7	6.8	6.6	6.8	8.3
	2.4	3.4	4.4	6.3	7.2
	3.6	3.1	3.4	3.8	3.8
	27,824	46,546	70,517	95,266	127,389

< : ISO 9000 News(1996 11- 12) >

2.

가 ISO 9000

가 , (ISO) ISO 9000
가

가

가. QSAR(Quality System Assessment Recognition :
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ISO/IEC가

'96

. IATCA(International Auditor and Training Certification Association :
)

'95 7 가 가 MOU가 () , 1996 2 1
IATCA

PAC(), IAF()
, APEC/SCSC(

) 가 , '96
가 ,

, Codex
1992 ISO
9000

가 (MOU)
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MOU 가 MOU

, EU
Network 8 10 , EU
(Bilateral Agreement)

1994 7 (33 4) (45
 3) (8 , 3
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가 1994 7
 ISO 9000
 10 (8) ,
 (9) ,
 5 11
 가 1996 8 1,200
 가 ISO/KS A 9001 9002 829
 가 , 90% ,
 10% 17 ()
 가)가 ISO 9002/KS A 9002
 1%

8.

(KSA-QA)	1993. 12. 26	26
(KMA-QA)	1994. 2. 26	23
(KPC-QA)	1994. 3. 22	15
가	1994. 5. 2	7
(KAITECH-KTL)		
(KQA-QA)	1994. 5. 24	3
(KETI)	1994. 12. 1	8

8.

(KOTRIC- QA)	1995. 3.	8
(Korea Register)	1996. 1.	3
(SMICC)	1996. 3.	7
	1996. 8.	4

9.

(KSA)	1994. 2. 6	
(KMA)	1994. 12. 29	
(KPC)	1995. 2. 15	
(KQA)	1995. 3.	
	1995. 9. 16	

가

2000 5,000

(Peer Review)

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IATAC(

ISO TC 176
) , PAC(

ISO CASCO() ,
가 .

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KS 가

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10. ISO 9000

	ISO 9001 ISO 9004-1			Road Map
	1	2	3	
			()	9004 9000-1
4. 1			Management Responsibility()	4 4.1,4.2, 4.3
4. 2			Quality System()	5 4.4,4.5, 4.8
4. 3			Contract Review()	- 9
4. 4	-	-	Design Control()	8
4. 5			Document and Data Control()	17
4. 6		-	Purchasing()	9
4. 7			Control of Customer Supplied Products()	-
4. 8			Product Identification and Traceability()	17 5
4. 9		-	Process Control()	10, 11 4.6,4.7
4.10			Inspection and Testing()	12
4.11			Control of Inspection, Measuring and Test Equipment(,)	13
4.12			Inspection and Test Status()	10
4.13			Control of nonconforming Products()	14
4.14			Corrective and Preventive Action()	15
4.15			Handling, Storage, Packaging, Preservation and Delivery(, , ,)	16 4.9
4.16			Control of Quality Records()	17 5.4
4.17			Internal Quality Audits()	12
4.18			Training()	18
4.19		-	Servicing()	16.4
4.20			Statistical Techniques()	20
			Quality Economic()	6
			Product Safety()	19
			Marketing()	7

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	ISO 9000 - Quality Management Quality Assurance Management Implementing ISO 9000 ISO/IEC Guide 2/40/53 ISO/IEC Guide Compendium - Conformity Assessment ISO/IEC Directive 1/2/3 Certification and Related Activities Development of Manual 1 8 Statistical Methods for Quality Control / ISO9000 國際品質保證と企業の對應 Proceedings of HACCP Conference HACCP Manual(Canada) Hazards and Control Guide(FDA) HACCP Rule(FDA) 食品の 安全・品質確保のための HACCP	ISO 9000 family ISO 9000 () ISO/IEC 가 ISO/IEC ISO/IEC 가 / () HACCP () HACCP FDA HACCP FDA HACCP HACCP

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KFQP-008		1996.11.30
KFQP-009		1996.11.30
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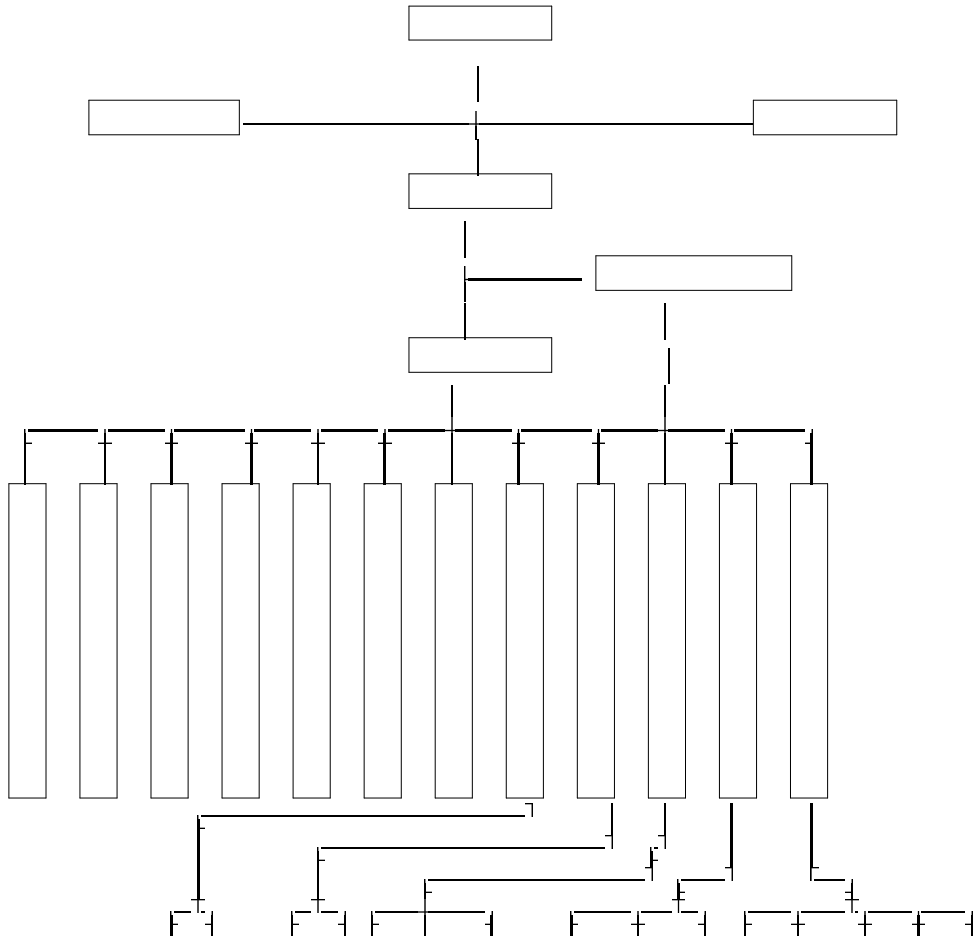
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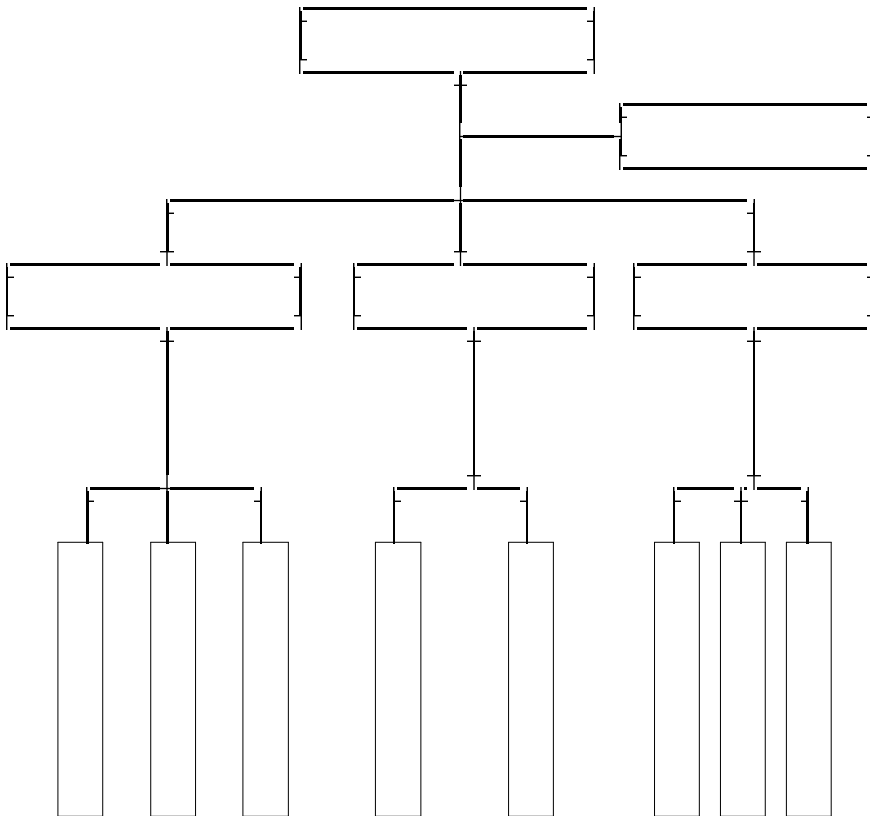
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4.8	8	[KFQP - 005]	
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5.1	6	[KFQP - 007]	
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5.6	9	[KFQP - 001]	
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7	14 , 17	[KFQP - 011]	
8	9 , 13	[KFQP - 001, 014]	
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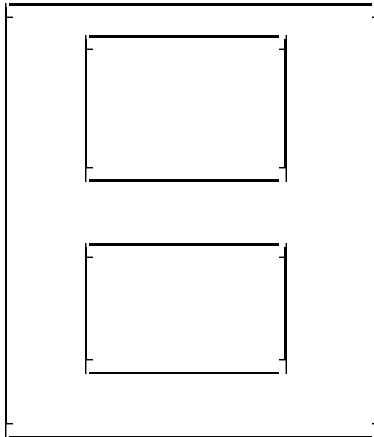
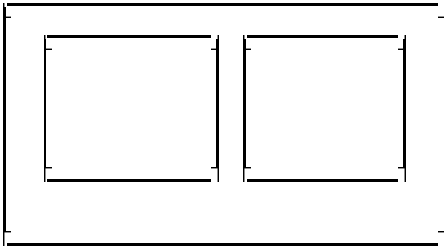
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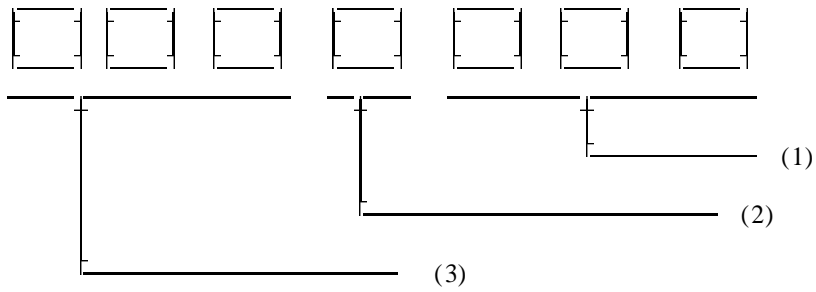
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KFRI- QA	QUALITY ASSURANCE PROCEDURE	KFQP - 003
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KFRI- QA	QUALITY ASSURANCE PROCEDURE		KFQP - 003
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[KFQP - 005] .

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1. A. Govindan ; Shashi Sareen(1991) Standards India; 5(9) 315- 318
2. A. Green(1993) Food Control; 4(1) 2- 6
3. A. Shapiro ; C. Mercier(1994) Science of the Total Environment; 143(1) 75- 92
4. A.D. Morton(1994) Food Science & Technology Today; 8(3) 151- 159
5. A.J.M. Pallett(1994) Food Technology; 48(12) 60- 62
6. B. Halliday(1994) Australian Grapegrower & Winemaker; 371, 71- 72
7. B. Johnson(1993) Ferment- ; 6(5) 351- 355
8. B. Pickles(1993) Food Technologist; 23(1) 19- 21
9. C. Dennis(1990) Food Science & Technology Today; 4(1) 28- 32
10. C.E. Adams(1994) Food Control; 5(3) 187- 189
11. D. Matthews(1994) Australian & NewZealand Wine Industry Journal; 9(3) 241- 244
12. D. Nelson(1992) Technical Quarterly, Master Brewers' Association of the Americas; 29(2) 64- 68
13. D. Richardson(1995) Food Manufacture; 70(4) 39- 40
14. D.M. Edwards(1980) ASAE Paper; No. 80- 6524, 18pp.
15. G. Spriegel(1993) Food Science & Technology Today; 7(3) 171- 175
16. G. Spriegel(1994) Food Control; 5(4) 237- 240
17. H. McIlveen(1994) British Food Journal; 96(3) 18- 22
18. H.H. Huss(1994) FAO Fisheries Technical Paper; No. 334, ix + 169pp
19. J. Emmott(1992) Dairy Industries International; 57(12) 25
20. J. Gledhill(1990) Soft Drinks Management International; May, 18, 20
21. J. Thornton(1992) International Food Ingredients; No. 4, 8- 11, 13- 14
22. J. Thornton(1992) International Food Ingredients; No. 6, 8- 13
23. J.A. Camperi(1994) Food Technology; 48(9) 160- 162
24. J.E. Stauffer(1993) Cereal Foods World; 38(11) 866- 867
25. J.G. Surak(1992) Food Technology; 46(11) 74, 76, 78, 80
26. J.G. Surak ; K.E. Simpson(1994) Food Technology; 48(12) 63- 65
27. J.J. Dick(1994) Indian Food Industry; 12(6) 16- 18
28. L.Thaisen; D.Evans(1993) Food Technology in New Zealand; 28(11) 29, 32
29. M. Jakobsen ; A. Lillie(1992) Quality assurance in the fish industry pp. 515- 520

30. M. Jakobsen(1993) INFOFISH International; No. 2, 31- 32, 34, 36
31. M.F. Stringer(1994) Dairy, Food and Environmental Sanitation; 14(8) 478- 481
32. M.J. Eyles(1994) Dairy, Food and Environmental Sanitation; 14(8) 467- 470
33. N.R. Whittaker(1993) Food Science & Technology Today; 7(2) 108- 111
34. R. Allman(1993) Food Technologist; 23(1) 16- 18
35. Sohrab(1993) Indian Food Industry; 12(3) 38- 40
36. Sohrab(1993) Indian Food Packer; 47(5) 65- 69
37. T. Mayes(1993) Trends in Food Science & Technology; 4(7) 216- 219
38. W.A. Golomski(1994) Food Technology; 48(12) 57- 59
39. W.E. Pursley(1993) Bulletin, Association of Operative Millers; Aug., 6259- 6261
40. W.F. Harrigan(1993) Food Control; 4(2) 105- 111

1. <http://foodnet.fic.ca/>
2. <http://ifse.tamu.edu/alliance/>
3. <http://isis1.gxinet.com/>
4. <http://vm.cfsan.fda.gov/>
5. <http://www.ansi.org/>
6. <http://www.coi.gov.uk/maff/pages/>
7. <http://www.coi.gov.uk/coi/depts/GMF/>
8. <http://www.fao.org/>
9. <http://www.fao.org/WAICENT/faoinfo/nutritio/codex/>
10. <http://www.fda.gov/>
11. http://www.hike.te.chiba-u.ac.jp/ikeda/documentation/iso_9000/
12. <http://www.iso.ch/>
13. <http://www.isonotes.com/>
14. <http://www.maff.gov.uk/>
15. <http://www.open.gov.uk/maff/pages/>
16. <http://www.os.dhhs.gov/progorg/>
17. <http://www.os.dhhs.gov:80>
18. <http://www.tqm.com/digest/>
19. <http://www.who.ch/>
20. <http://wto.org/>

[] ISO 9000/10010

<1> ISO 8402 9000

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2. ISO 9000-1 KS A 9000
3. ISO 9000-2
4. ISO 9000-3 KS CP A 1011
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<2> ISO 9001/9002/9003/9004

6. ISO 9001 KS A 9001
7. ISO 9002 KS A 9002
8. ISO 9003 KS A 9003
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<3> ISO 10010

15. ISO 10011-1 KS CP A 1013
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18. ISO 10012-1 KS CP A 1016
19. ISO/DIS 10013

[]

(Introduction)

(Foreword)

(Scope and Field of Application)

ISO 9001:1994

1. (Introduction)
2. (References)
3. (Definition)
- 4.
5. (Quality Manual for Food Industry)-
6. (HACCP)-
7. ISO 9002:1994 -

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