

ITU-T

TELECOMMUNICATION
STANDARDIZATION SECTOR
OF ITU

X.666

(08/2008)

SERIES X: DATA NETWORKS, OPEN SYSTEM
COMMUNICATIONS AND SECURITY

OSI networking and system aspects – Naming,
Addressing and Registration

**Information technology – Open Systems
Interconnection – Procedures for the operation
of OSI Registration Authorities: Joint ISO
and ITU-T registration of international
organizations**

ITU-T Recommendation X.666

ITU-T X-SERIES RECOMMENDATIONS
DATA NETWORKS, OPEN SYSTEM COMMUNICATIONS AND SECURITY

PUBLIC DATA NETWORKS	
Services and facilities	X.1–X.19
Interfaces	X.20–X.49
Transmission, signalling and switching	X.50–X.89
Network aspects	X.90–X.149
Maintenance	X.150–X.179
Administrative arrangements	X.180–X.199
OPEN SYSTEMS INTERCONNECTION	
Model and notation	X.200–X.209
Service definitions	X.210–X.219
Connection-mode protocol specifications	X.220–X.229
Connectionless-mode protocol specifications	X.230–X.239
PICS proformas	X.240–X.259
Protocol Identification	X.260–X.269
Security Protocols	X.270–X.279
Layer Managed Objects	X.280–X.289
Conformance testing	X.290–X.299
INTERWORKING BETWEEN NETWORKS	
General	X.300–X.349
Satellite data transmission systems	X.350–X.369
IP-based networks	X.370–X.379
MESSAGE HANDLING SYSTEMS	X.400–X.499
DIRECTORY	X.500–X.599
OSI NETWORKING AND SYSTEM ASPECTS	
Networking	X.600–X.629
Efficiency	X.630–X.639
Quality of service	X.640–X.649
Naming, Addressing and Registration	X.650–X.679
Abstract Syntax Notation One (ASN.1)	X.680–X.699
OSI MANAGEMENT	
Systems Management framework and architecture	X.700–X.709
Management Communication Service and Protocol	X.710–X.719
Structure of Management Information	X.720–X.729
Management functions and ODMA functions	X.730–X.799
SECURITY	X.800–X.849
OSI APPLICATIONS	
Commitment, Concurrency and Recovery	X.850–X.859
Transaction processing	X.860–X.879
Remote operations	X.880–X.889
Generic applications of ASN.1	X.890–X.899
OPEN DISTRIBUTED PROCESSING	X.900–X.999
INFORMATION AND NETWORK SECURITY	X.1000–X.1099
SECURE APPLICATIONS AND SERVICES	X.1100–X.1199
CYBERSPACE SECURITY	X.1200–X.1299
SECURE APPLICATIONS AND SERVICES	X.1300–X.1399

For further details, please refer to the list of ITU-T Recommendations.

**Information technology – Open Systems Interconnection – Procedures for the operation
of OSI Registration Authorities: Joint ISO and ITU-T registration
of international organizations**

Summary

ITU-T Recommendation X.666 | ISO/IEC 9834-7 specifies procedures for Registration Authorities that are responsible for the assignment to international organizations of names that are globally unambiguous in the context of Originator/Recipient addresses, Directory names and the International Object Identifier tree.

Source

ITU-T Recommendation X.666 was approved on 29 August 2008 by ITU-T Study Group 17 (2005-2008) under ITU-T ITU-T Recommendation A.8 procedure. An identical text is also published as ISO/IEC 9834-7.

FOREWORD

The International Telecommunication Union (ITU) is the United Nations specialized agency in the field of telecommunications, information and communication technologies (ICTs). The ITU Telecommunication Standardization Sector (ITU-T) is a permanent organ of ITU. ITU-T is responsible for studying technical, operating and tariff questions and issuing Recommendations on them with a view to standardizing telecommunications on a worldwide basis.

The World Telecommunication Standardization Assembly (WTSA), which meets every four years, establishes the topics for study by the ITU-T study groups which, in turn, produce Recommendations on these topics.

The approval of ITU-T Recommendations is covered by the procedure laid down in WTSA Resolution 1.

In some areas of information technology which fall within ITU-T's purview, the necessary standards are prepared on a collaborative basis with ISO and IEC.

NOTE

In this Recommendation, the expression "Administration" is used for conciseness to indicate both a telecommunication administration and a recognized operating agency.

Compliance with this Recommendation is voluntary. However, the Recommendation may contain certain mandatory provisions (to ensure e.g. interoperability or applicability) and compliance with the Recommendation is achieved when all of these mandatory provisions are met. The words "shall" or some other obligatory language such as "must" and the negative equivalents are used to express requirements. The use of such words does not suggest that compliance with the Recommendation is required of any party.

INTELLECTUAL PROPERTY RIGHTS

ITU draws attention to the possibility that the practice or implementation of this Recommendation may involve the use of a claimed Intellectual Property Right. ITU takes no position concerning the evidence, validity or applicability of claimed Intellectual Property Rights, whether asserted by ITU members or others outside of the Recommendation development process.

As of the date of approval of this Recommendation, ITU [had/had not] received notice of intellectual property, protected by patents, which may be required to implement this Recommendation. However, implementers are cautioned that this may not represent the latest information and are therefore strongly urged to consult the TSB patent database at <http://www.itu.int/ITU-T/ipr/>.

© ITU 2009

All rights reserved. No part of this publication may be reproduced, by any means whatsoever, without the prior written permission of ITU.

CONTENTS

	<i>Page</i>
1 Scope	1
2 Nor ITU-T Recommendation native references.....	1
2.1 Identical Recommendations International Standards	1
3 Definitions	1
3.1 ASN.1 terms	1
3.2 Directory terms.....	2
3.3 Directory attribute terms.....	2
3.4 Registration terms	2
3.5 Message Handling System terms	2
3.6 Additional definitions	2
4 Abbreviations	3
5 General.....	3
6 Operation of Registration Authorities	3
7 Appointment of Registration Authorities	4
8 Fees	4
Annex A – The assignment of international ADMD and PRMD names.....	5
A.1 Purpose	5
A.2 Requirements from ITU-T Rec. X.402 ISO/IEC 10021-2	5
A.3 Use of names.....	5
A.4 Registration procedures	6
A.5 Register.....	7
A.6 Content of forms	8
Annex B – The assignment of international organization names for use in Directory services.....	11
B.1 Purpose	11
B.2 Requirements from ITU-T Rec. X.520 ISO/IEC 9594-6	11
B.3 Use of international organization names	11
B.4 Registration procedures	11
B.5 Register.....	13
B.6 Content of forms	13
Annex C – The assignment of joint international organization arcs	17
C.1 Purpose	17
C.2 Requirements for arc properties	17
C.3 Use of arc properties for object identifier values.....	17
C.4 Use of arc properties for OID international resource identifier values	17
C.5 Registration procedures	17
C.6 Register.....	19
C.7 Content of forms	20

**INTERNATIONAL STANDARD
ITU-T RECOMMENDATION**

**Information technology – Open Systems Interconnection – Procedures for the operation
of OSI Registration Authorities: Joint ISO and ITU-T registration
of international organizations**

1 Scope

This Recommendation | International Standard specifies procedures for Registration Authorities that are responsible for the assignment to international organizations of names that are globally unambiguous in the context of:

- a) O/R addresses, as defined in ITU-T Rec. X.402 | ISO/IEC 10021-2;
- b) Directory names, as defined in ITU-T Rec. X.501 | ISO/IEC 9594-2;
- c) The joint international organizations arc (see 3.6.6) of the International Object Identifier tree, as defined in ITU-T Rec. X.660 | ISO/IEC 9834-1.

2 Nor ITU-T Recommendation native references

The following Recommendations and International Standards contain provisions which, through reference in this text, constitute provisions of this Recommendation | International Standard. At the time of publication, the editions indicated were valid. All Recommendations and Standards are subject to revision, and parties to agreements based on this Recommendation | International Standard are encouraged to investigate the possibility of applying the most recent edition of the Recommendations and Standards listed below. Members of IEC and ISO maintain registers of currently valid International Standards. The Telecommunication Standardization Bureau of the ITU maintains a list of currently valid ITU-T Recommendations.

2.1 Identical Recommendations | International Standards

- ITU-T Recommendation X.402 (1999) | ISO/IEC 10021-2:2003, *Information technology – Message Handling Systems (MHS) – Overall architecture*.
- ITU-T Recommendation X.500 (2008) | ISO/IEC 9594-1:2008, *Information technology – Open Systems Interconnection – The Directory: Overview of concepts, models and services*.
- ITU-T Recommendation X.501 (2008) | ISO/IEC 9594-2:2008, *Information technology – Open Systems Interconnection – The Directory: Models*.
- ITU-T Recommendation X.520 (2008) | ISO/IEC 9594-6:2008, *Information technology – Open Systems Interconnection – The Directory: Selected attribute types*.
- ITU-T Recommendation X.660 (2008) | ISO/IEC 9834-1:2008, *Information technology – Open Systems Interconnection – Procedures for the operation of OSI Registration Authorities: General procedures and top arcs of the International Object Identifier tree*.
- ITU-T Recommendation X.680 (2008) | ISO/IEC 8824-1:2008, *Information technology – Abstract Syntax Notation One (ASN.1): Specification of basic notation*.

3 Definitions

For the purposes of this Recommendation | International Standard, the following definitions apply.

3.1 ASN.1 terms

This Recommendation | International Standard uses the following terms defined in ITU-T Rec. X.680 | ISO/IEC 8824-1:

- a) **NumericString**;
- b) **PrintableString**;
- c) **TeletexString**.

3.2 Directory terms

This Recommendation | International Standard uses the following terms defined in ITU-T Rec. X.501 | ISO/IEC 9594-2:

- a) Directory Information Tree;
- b) Directory System Agent;
- c) directory name;
- d) relative distinguished name.

3.3 Directory attribute terms

This Recommendation | International Standard uses the following terms defined in ITU-T Rec. X.520 | ISO/IEC 9594-6:

- a) Country Name;
- b) Organization Name.

3.4 Registration terms

This Recommendation | International Standard uses the following terms defined in ITU-T Rec. X.660 | ISO/IEC 9834-1:

- a) object identifier;
- b) OID internationalized resource reference;
- c) primary integer value;
- d) registration;
- e) Registration Authority;
- f) registration procedures;
- g) secondary identifier;
- h) sponsoring authority;
- i) Unicode label;
- j) long arc.

3.5 Message Handling System terms

This Recommendation | International Standard uses the following terms defined in ITU-T Rec. X.402 | ISO/IEC 10021-2:

- a) administration-domain-name;
- b) country-name;
- c) management domain;
- d) O/R address;
- e) private-domain-name;
- f) standard attribute.

3.6 Additional definitions

3.6.1 arc identifications: The totality of the names assigned to an arc of the Internationalized Object Identifier tree.

NOTE – These consist (except for long arcs) of a single unambiguous primary integer (defining an integer-valued Unicode label), zero or more unambiguous non-integer Unicode labels and zero or more (possibly ambiguous) secondary identifiers.

3.6.2 international ADMD name: An ADMD which can be used in the formation of O/R addresses which contain a country name standard attribute value identifying the Registration Authority operating under the provisions of this Recommendation | International Standard.

3.6.3 international name: A name that is globally unambiguous in some context.

3.6.4 international PRMD name: A PRMD name which can be used in the formation of O/R addresses which contain a country name standard attribute value identifying the Registration Authority operating under the provisions of this Recommendation | International Standard, and an ADMD name attribute value of a single space.

3.6.5 international organization name: An Organization Name value which can be used in an RDN that, without qualification by a Country Name RDN, is the directory name of the entry for the organization concerned.

3.6.6 joint international organization arc: An arc beneath the node of the International Object Identifier tree identified by the ASN.1 object identifier value {`joint-iso-itu-t international-organizations (23)`} and the ASN.1 OID internationalized resource identifier values `"/Joint-ISO-ITU-T/International-Organizations"` and `"/International-Organizations"`.

4 Abbreviations

For the purposes of this Recommendation | International Standard, the following abbreviations apply:

ADMD	Administration Management Domain
ASN.1	Abstract Syntax Notation One
DIT	Directory Information Tree
DSA	Directory System Agent
ITO	International Treaty Organization
MD	Management Domain
MHS	Message Handling System
MTS	Message Transfer System
O/R	Originator/Recipient
PRMD	Private Management Domain
PRMD name	private-domain-name
RDN	Relative Distinguished Name

5 General

5.1 ITU-T Rec. X.660 | ISO/IEC 9834-1 defines procedures that are generally applicable to the registration of objects. It allows for other Recommendations | International Standards to define procedures for registration of specific objects.

5.2 This Recommendation | International Standard defines procedures for registration that assigns international names to organizations, where the term "international name" denotes a name that is globally unambiguous within a specific context. This Recommendation | International Standard covers three kinds of international names:

- a) international ADMD and PRMD names for use in O/R addresses as defined in ITU-T Rec. X.402 | ISO/IEC 10021-2;
- b) international organization names for use in directory names as defined in ITU-T Rec. X.501 | ISO/IEC 9594-2;
- c) arc identifications for joint international organization arcs.

5.3 A separate Registration Authority is responsible for the assignment of each kind of international name and there is only one Registration Authority for each kind of international name. The same entity may act as more than one of the authorities.

5.4 An organization that requires the assignment of equivalent name values for different kinds of name must make appropriate registration requests to each of the separate Registration Authorities.

6 Operation of Registration Authorities

6.1 The general operation of Registration Authorities is defined in ITU-T Rec. X.660 | ISO/IEC 9834-1, 8.2. Specific procedures for each kind of international name are defined in the annexes to this Recommendation | International Standard as follows:

- a) procedures for the assignment of international MD names are defined in Annex A;

- b) procedures for the assignment of international organization names are defined in Annex B;
- c) procedures for the assignment of joint international organization arcs are defined in Annex C.

6.2 ITU-T Rec. X.660 | ISO/IEC 9834-1, 8.2, and the annexes to this Recommendation | International Standard define the principles governing the registration procedures to be applied. The Registration Authorities themselves define the mechanisms through which the principles are realized (e.g., through electronic operations), subject to the approval of ITU-T | ISO/IEC.

7 Appointment of Registration Authorities

It is within the mandate of ITU-T and ISO/IEC to organize registration as specified in this Recommendation | International Standard. In order to do this, ITU-T and ISO/IEC appoint, according to their internal requirements and rules, an organization to act as the Registration Authority for each kind of name covered by this Recommendation | International Standard.

8 Fees

8.1 An organization providing a Registration Authority function does so on a cost-recovery basis. The fee structure is designed to recover the expenses of operating a Registration Authority, and to discourage frivolous and multiple requests.

8.2 The fee values are determined by the Registration Authority, subject to the approval of ITU-T | ISO/IEC. Fees can apply to:

- a) registration;
- b) inquiry request;
- c) publication request;
- d) request for update;
- e) name retention.

Annex A

The assignment of international ADMD and PRMD names

(This annex forms an integral part of this Recommendation | International Standard)

A.1 Purpose

The purpose of this annex is to define procedures for the assignment of international ADMD and PRMD names to organizations for use in O/R addresses as defined in ITU-T Rec. X.402 | ISO/IEC 10021-2.

A.2 Requirements from ITU-T Rec. X.402 | ISO/IEC 10021-2

A.2.1 ADMD and PRMD names are used in several elements of MHS protocols specified in the ITU-T Rec. X.400 | ISO/IEC 10021 series. Two syntaxes are specified for ADMD and PRMD name values: a value of type **NumericString** and a value of type **PrintableString**.

A.2.2 The procedures defined in this annex provide for the assignment, as international ADMD and PRMD names, of alphanumeric name values comprising characters from the **PrintableString** character set. In accordance with the requirements of ITU-T Rec. X.402 | ISO/IEC 10021-2, these names are limited in length to 16 characters.

A.2.3 Where an assigned name value consists solely of digits and spaces, then the equivalent **NumericString** name is also regarded as assigned.

NOTE – A **PrintableString** comprising solely digits and spaces is equivalent to a **NumericString**.

A.2.4 In the handling of name values for registration purposes:

- a) comparison is case insensitive;
- b) multiple consecutive spaces are treated as a single space;
- c) leading and trailing spaces are not treated as part of the name value;
- d) name values of a single space or single zero are not registered.

A.3 Use of names

There is a single register of international MD names. Each entry in the register has an indication whether the associated name value is used as an ADMD name or a PRMD name.

NOTE 1 – For ADMD and PRMD names to be used within message handling systems conforming to ITU-T Rec. X.402 | ISO/IEC 10021-2, it is necessary to specify procedures for identifying names and associated Registration Authorities within concrete protocols. Such procedures exist for ADMD and PRMD names registered within the context of a specific country name. Procedures for international ADMD and PRMD names, as defined in this Recommendation | International Standard, are under study.

NOTE 2 – Recommendations specifying MTS behaviour for voluntary participation in an international MD name structure may place additional requirements on the use of international ADMD and PRMD names assigned according to the procedures defined in this annex.

A.3.1 Use of international ADMD names

A.3.1.1 An ADMD name assigned by the procedures defined in this annex can be used in the formation of O/R addresses which contain a country name standard attribute value identifying the Registration Authority operating under the provisions of this Recommendation | International Standard.

A.3.1.2 The assignment of an ADMD name to an organization also delegates to that organization the authority to assign standard attributes for O/R addresses within the context of that name, subject to the constraints defined in ITU-T Rec. X.402 | ISO/IEC 10021-2.

A.3.2 Use of international PRMD names

A.3.2.1 A PRMD name assigned by the procedures defined in this annex can be used in the formation of O/R addresses which contain a country name standard attribute value identifying the Registration Authority operating under the provisions of this Recommendation | International Standard, and an ADMD name attribute value of a single space.

A.3.2.2 The assignment of a PRMD name to an organization also delegates to that organization the authority to assign O/R address components within the context of that name subject to the constraints defined in ITU-T Rec. X.402 | ISO/IEC 10021-2.

A.4 Registration procedures

This subclause specifies the procedures to be followed in the assignment of international ADMD and PRMD names to organizations. The procedures are designed to assure openness and due process in the registration process.

A.4.1 Application for registration

A.4.1.1 An ITO submits an application directly to the Registration Authority. Other applications are submitted through a Sponsoring Authority. The content of the application is defined in A.6.1.

A.4.1.2 Upon successful completion of the procedures specified in this annex, the alphanumeric value supplied by the applicant as constrained by the rules in A.2, is registered as assigned.

A.4.1.3 When applicants require multiple names, they must submit a separate application for each name.

A.4.2 Review of applications

A.4.2.1 Procedure

A.4.2.1.1 Since an alphanumeric name may have meaning outside the registration process, in order for an application to be processed, it shall contain a signed statement asserting the applicant's right to the name. If the statement is missing, the application is rejected by sending a notice of rejection as specified in A.6.6, citing this subclause as the reason for the rejection.

NOTE – In the context of registration, the signed statement is collected for recording purposes only. The statement may be useful, for example, in the Sponsoring Authority challenge process; however, such use is outside the scope of this Recommendation | International Standard.

A.4.2.1.2 If the application does not contain the information specified in A.6.1, the application is rejected by sending a notice of rejection as specified in A.6.6, citing this subclause as the reason for rejection.

A.4.2.1.3 If a new application arrives for an alphanumeric name that has already been requested, but the previous request has not yet been confirmed, the following process is followed:

- a) If the new application arrives before the confirmation process for the previous application has started, then both applications are rejected by sending a notice of rejection as specified in A.6.6, citing this subclause as the reason for rejection.
- b) If the new application arrives after the confirmation process for the previous application has started, then the new application is put on hold until the confirmation process for the previous application is completed. The new applicant is immediately notified that a previous application for the name requested is in the confirmation process defined by this subclause. If the confirmation is successful, then the new application is rejected by sending a notice of rejection as specified in A.6.6, citing this subclause as the reason for rejection. If the confirmation is not successful, then the new application continues with the confirmation process.

A.4.2.1.4 If the application is accepted, it is put into the confirmation process specified in A.4.3.

A.4.2.2 Response time

A.4.2.2.1 To the extent practicable, review of an application under the procedures specified in A.4.2.1 is completed within ten working days of the receipt of the application.

A.4.2.2.2 The Registration Authority may batch together several applications for registration when communicating the confirmation requests to Sponsoring Authorities. Nevertheless, the beginning of the confirmation process for any application is not delayed by more than two months from the date at which the application was submitted.

A.4.2.3 Unprocessable applications

An application is unprocessable if the requested name value does not comply with the requirements specified in A.2. The application is rejected by sending a notice of rejection as specified in A.6.6, citing this subclause as the reason for the rejection.

A.4.3 Confirmation process

A.4.3.1 The requested name value is compared with all other name values in the Register. If the name value is a duplicate, the request is rejected by sending a notice of rejection as specified in A.6.6, citing this subclause as the reason for the rejection. If the supplied value is not a duplicate, it is entered into the Review List. The Review List is published and a request for confirmation as specified in A.6.2 is sent to each Sponsoring Authority.

A.4.3.2 The review period is at least six months. The start and end dates of the review period are published. To the extent practicable, notice of the publication of the supplied name value and of the start of the review period are sent to the applicant within 20 working days.

A.4.3.3 Sponsoring organizations respond to the request for confirmation in the form specified in A.6.3. Abstention, or the absence of a reply from a sponsoring organization within the specified review period, is considered as a confirmation by that sponsoring authority that the name value can be used within the context for which it is responsible.

A.4.3.4 If there is unanimous confirmation of the assignment of the requested name value at the end of the review period (i.e., if no sponsoring organization objects), then the name value is removed from the Review List and entered in the Register and an announcement of registration as specified in A.6.5 is sent to the applicant. The announcement of registration is sent within ten working days of the close of the review period.

A.4.3.5 If there is no unanimous confirmation of the assignment of the requested name value, then the name value is removed from the Review List and a notice of rejection as specified in A.6.6, is sent to the applicant, citing this subclause as the reason for the rejection. The notice of rejection is sent within ten working days of the close of the review period.

A.4.3.6 Neither the Registration Authority nor ITU-T | ISO/IEC plays any role in the resolution of disputes over the use of names. Such disputes are assumed to be resolved by action outside the provisions of this Recommendation | International Standard followed by new applications to the Registration Authority.

A.5 Register

A.5.1 Maintenance

A.5.1.1 The Registration Authority maintains a Register of assigned name values, together with the information specified in A.6.10. The Registration Authority is responsible for defining the internal procedures necessary for the maintenance of the Register.

A.5.1.2 Of the information elements specified in A.6.10, the assigned name value, the initial submitting organization, the initial requesting organization name and address, the initial requester name and title, and the initial date of registration are not updated. All other information elements can be updated by the Registration Authority when requested to do so in the form specified in A.6.11 by an official of the organization to which the name has been assigned or, if an official of the organization does not exist, by the Sponsoring Authority for the assignment of the name value.

A.5.1.3 A Sponsoring Authority can request that an entry in the Register be marked as *invalid* for the context for use of the name value with which it is concerned. Such a request could result, for example, from a challenge process operated by the sponsoring authority or from the determination that intellectual property rights are being violated. Since the request is based on information not available at the time of the confirmation process, in general it is granted. However, the *invalid* mark will not be posted in the entry until at least one year after the request is accepted in order to allow sufficient time for users of the name value to accommodate the change.

A.5.1.4 When an *invalid* mark is put on a Register entry, then the name value for the entry cannot be used in the context for use of the name that has been specified by the corresponding Sponsoring Authority. As soon as the request to post an *invalid* mark is granted, the Registration Authority promulgates the information to all Sponsoring Authorities.

A.5.1.5 A Sponsoring Authority or an ITO can request the deletion of a Register entry for which it is responsible. When a Register entry is deleted, the name value in the entry is no longer usable. The Registration Authority promulgates the information to all Sponsoring Authorities and ITOs. The name from the deleted entry is not made eligible for reuse until at least one year after the request is accepted in order to allow sufficient time for there to be no confusion with the previous use of the name.

A.5.1.6 At specified intervals, the Registration Authority requests validation of entries in the Register from the organizations concerned. If validation is not received, and there is confirmation either from the organization itself or from the Sponsoring Authority that the name is no longer in use, the entry is deleted.

NOTE – There may be cases in which reuse is not advisable (e.g., because of the use of security mechanisms). The decision is made on a case-by-case basis by the Registration Authority in consultation with the Sponsoring Authority or ITO.

A.5.2 Inquiry

A.5.2.1 An inquiry service is available from the Registration Authority. The service allows potential applicants for the assignment of international ADMD or PRMD names to determine if a name value has already been assigned.

A.5.2.2 To make an inquiry, an organization submits an Inquiry request as specified in A.6.7.

A.5.2.3 The Registration Authority responds to an inquiry request in an inquiry response as specified in A.6.8. To the extent practicable, the response is returned within ten working days of the request.

A.5.3 Publication

A.5.3.1 A publication service is available from the Registration Authority. The service provides copies of subsets of the Register entries. The Register entry information is not made available for those organizations that have not authorized the release of information.

A.5.3.2 A request for information is made in the form of a publication request as specified in A.6.9.

A.5.3.3 The Registration Authority returns the requested information in a publication response as specified in A.6.9 in an appropriate form (i.e., hard copy or electronic). The time required for the response will vary depending upon the complexity of the selection criteria and the amount of data to be extracted.

A.6 Content of forms

This subclause specifies the information required in the forms used by the Registration Authority to conduct the registration process.

A.6.1 Registration application

The application shall include the following information:

- 1) Name of Sponsoring Authority or ITO submitting the application.
- 2) Name of requesting organization (null in the case of an ITO).
- 3) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the requesting organization.
- 4) Name and title of the requestor.
- 5) Proposed alphanumeric name value.
- 6) Intended use of the name value (ADMD name or PRMD name).
- 7) Statement of the right to the name value.
- 8) Statement of whether or not the information can be published.

A.6.2 Request for confirmation

The request for confirmation sent by the Registration Authority to all Sponsoring Authorities shall include the following information:

- 1) Start date of the review period.
- 2) End date of the review period (response due date).
- 3) The requested name value.
- 4) Intended use of the name value (ADMD name or PRMD name).
- 5) The identity of the ITO, or of the sponsoring authority and requesting organization.
- 6) A copy of this Recommendation | International Standard.

A.6.3 Response to a request for confirmation

The response to a request for confirmation sent by the Sponsoring Authority shall include the following information:

- 1) Confirmation or denial that the requested name value can be used in the context for use of the name value of concern to the sponsoring authority.
- 2) Optionally, comments and supporting information (e.g., explaining a denial).

A.6.4 Notification

The Registration Authority sends a notification to an applicant when the requested name value is entered into the confirmation process. The notification shall include the following information:

- 1) Start date of the review period.
- 2) End date of the review period (Sponsoring Authority due response date).
- 3) The requested ADMD or PRMD name value.

A.6.5 Registration announcement

The Registration Authority sends a registration announcement to an applicant when the assignment of a name value has been confirmed and entered in the Register. The registration announcement shall include the following information:

- 1) Name of the ITO or Sponsoring Authority submitting the application.
- 2) Name of the requesting organization (null in the case of an ITO).
- 3) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the requesting organization.
- 4) Name and title of the requestor.
- 5) Confirmed alphanumeric name value.
- 6) Approved use of the name value (ADMD name or PRMD name).

A.6.6 Notice of rejection

The Registration Authority sends a notice of rejection to an applicant when the assignment of a name value has been rejected. The notice of rejection shall include the following information:

- 1) Name of the ITO or Sponsoring Authority submitting the application.
- 2) Name of the requesting organization (null in the case of an ITO).
- 3) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the requesting organization.
- 4) Name and title of the requestor.
- 5) Requested alphanumeric name value.
- 6) Reason for rejection – identified by citing the relevant subclause of this annex.

A.6.7 Inquiry request

The inquiry request service is provided to allow potential applicants to determine if a name value has already been assigned. An inquiry request shall include the following information:

- 1) Requesting organization name.
- 2) Requesting organization address.
- 3) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the requesting organization.
- 4) Queried name value.

A.6.8 Inquiry response

An inquiry response shall include the following information:

- 1) Requesting organization name.
- 2) Requesting organization address.
- 3) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the requesting organization.
- 4) Queried name value.
- 5) Status of queried name value:
 - a) not assigned;
 - b) assigned and, if any, marked as *invalid* or *inactive*;
 - c) under review.

A.6.9 Publication request and response

A publication request service is provided to allow information to be obtained on entries in the Register. A publication request and response shall include the following information:

- 1) Requesting organization name.
- 2) Requesting organization address.
- 3) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the requesting organization.

- 4) The selection criteria to be used to select entries from which information will be extracted.

For entries matching the selection criteria, the publication response shall include the following information:

- 1) Name value.
- 2) Registrant information (if authorized): Organization name and address, point of contact, and intended usage (ADMD name or PRMD name).

A.6.10 Register entry

A Register entry shall include the following information:

- 1) Name of the ITO or sponsoring authority submitting the application – *Will not change*.
- 2) Name of the initial registered organization (null in the case of an ITO) – *Will not change*.
- 3) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the initial registered organization – *Will not change*.
- 4) Name and title of the initial requestor – *Will not change*.
- 5) Date of initial registration – *Will not change*.
- 6) Name of current ITO or Sponsoring Authority.
- 7) Name of current registered organization.
- 8) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the current registered organization.
- 9) Name and title of the current requestor.
- 10) Date of last update to the entry.
- 11) Information publishable (yes or no).
- 12) Assigned name value.
- 13) Approved use of the name value (ADMD name or PRMD name).

A.6.11 Request for update

A request for update to the Register shall include the following information:

- 1) Name of current ITO or sponsoring authority.
- 2) Name of current registered organization.
- 3) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the current registered organization.
- 4) Name and title of the current requestor.
- 5) Requested changes to the Register entry.
- 6) Date on which the changes will be effective.

Annex B

The assignment of international organization names for use in Directory services

(This annex forms an integral part of this Recommendation | International Standard)

B.1 Purpose

The purpose of this annex is to define procedures for the assignment of international organization names for use in directory names as defined in ITU-T Rec. X.520 | ISO/IEC 9594-6.

B.2 Requirements from ITU-T Rec. X.520 | ISO/IEC 9594-6

B.2.1 Organization Names are used in several elements of Directory protocols specified in the ITU-T Rec. X.500 | ISO/IEC 9594 series. Several syntaxes are specified for Organization Name value in ITU-T Rec. X.520 | ISO/IEC 9594-6.

B.2.2 The procedures defined in this annex provide for the assignment, as international organization names, of alphanumeric name values comprising characters from the **PrintableString** character set. In accordance with the requirements of ITU-T Rec. X.520 | ISO/IEC 9594-6, these names are limited in length to 64 characters.

B.2.3 In the handling of name values for registration purposes:

- a) comparison is case insensitive;
- b) multiple consecutive spaces are treated as a single space;
- c) leading and trailing spaces are not treated as part of the name value;
- d) name values of a single space or single zero are not registered.

B.3 Use of international organization names

B.3.1 An Organization Name value assigned by the procedures defined in this annex can be used in an RDN that, without qualification by a Country Name RDN, forms the directory name for the organization concerned.

NOTE – If the Organization Name is used directly under the root of the DIT, then the DSA holding the corresponding Directory entry must itself be a first-level DSA that maintains knowledge of how to reach every other first-level DSA in global Directory.

B.3.2 The assignment of an Organization Name to an organization also delegates to that organization the authority to assign RDN values within the context of that name subject to the constraints defined in ITU-T Rec. X.520 | ISO/IEC 9594-6.

B.4 Registration procedures

This subclause specifies the procedures to be followed in the assignment of international organization names to organizations. The procedures are designed to assure openness and due process in the registration process.

B.4.1 Application for registration

B.4.1.1 An ITO submits an application directly to the Registration Authority. Other applications are submitted through a Sponsoring Authority. The content of the application is defined in B.6.1.

B.4.1.2 Upon successful completion of the procedures specified in this annex, the alphanumeric value supplied by the applicant as constrained by the rules in B.2 is registered as assigned.

B.4.1.3 When applicants require multiple names, they must submit a separate application for each name.

B.4.2 Review of applications

B.4.2.1 Procedure

B.4.2.1.1 Since an alphanumeric name may have meaning outside the registration process, in order for an application to be processed, it shall contain a signed statement asserting the applicant's right to the name. If the statement is missing, the application is rejected by sending a notice of rejection as specified in B.6.6, citing this subclause as the reason for the rejection.

NOTE – In the context of registration, the signed statement is collected for recording purposes only. The statement may be useful, for example, in the Sponsoring Authority challenge process; however, such use is outside the scope of this Recommendation | International Standard.

B.4.2.1.2 If the application does not contain the information specified in B.6.1, the application is rejected by sending a notice of rejection as specified in B.6.6, citing this subclause as the reason for rejection.

B.4.2.1.3 If a new application arrives for an alphanumeric name that has already been requested, but the previous request has not yet been confirmed, the following process is followed:

- a) If the new application arrives before the confirmation process for the previous application has started, then both applications are rejected by sending a notice of rejection as specified in B.6.6, citing this subclause as the reason for rejection.
- b) If the new application arrives after the confirmation process for the previous application has started, then the new application is put on hold until the confirmation process for the previous application is completed. If the confirmation is successful, then the new application is rejected by sending a notice of rejection as specified in B.6.6, citing this subclause as the reason for rejection. If the confirmation is not successful, then the new application continues with the confirmation process.

B.4.2.1.4 If the application is accepted, it is put into the confirmation process specified in B.4.3.

B.4.2.2 Response time

B.4.2.2.1 To the extent practicable, review of an application under the procedures specified in B.4.2.1 is completed within ten working days of the receipt of the application.

B.4.2.2.2 The Registration Authority may batch together several applications for registration when communicating the confirmation requests to Sponsoring Authorities. Nevertheless, the beginning of the confirmation process for any application is not delayed by more than two months from the date at which the application was submitted.

B.4.2.3 Unprocessable applications

An application is unprocessable if the requested name value does not comply with the requirements specified in B.2. The application is rejected by sending a notice of rejection as specified in B.6.6, citing this subclause as the reason for the rejection.

B.4.3 Confirmation process

B.4.3.1 The requested name value is compared with all other name values in the Register. If the name value is a duplicate, the request is rejected by sending a notice of rejection as specified in B.6.6, citing this subclause as the reason for the rejection. If the supplied value is not a duplicate, it is entered into the Review List. The Review List is published and a request for confirmation as specified in B.6.2 is sent to each sponsoring authority.

B.4.3.2 The review period is at least six months. The start and end dates of the review period are published. To the extent practicable, notice of the publication of the supplied name value and of the start of the review period are sent to the applicant within 20 working days.

B.4.3.3 Sponsoring organizations respond to the request for confirmation in the form specified in B.6.3. Abstention, or the absence of a reply from a sponsoring organization within the specified review period, is considered as a confirmation by that Sponsoring Authority that the name value can be used within the context for which it is responsible.

B.4.3.4 If there is unanimous confirmation of the assignment of the requested name value at the end of the review period, then the name value is removed from the Review List and entered in the Register and a registration announcement, as specified in B.6.5, is sent to the applicant. The announcement of registration is sent within ten working days of the close of the review period.

B.4.3.5 If there is no unanimous confirmation of the assignment of the requested name value, then the name value is removed from the Review List and a notice of rejection, as specified in B.6.6, is sent to the applicant, citing this subclause as the reason for the rejection. The notice of rejection is sent within ten working days of the close of the review period.

B.4.3.6 Neither the Registration Authority nor ITU-T | ISO/IEC plays any role in the resolution of disputes over the use of names. Such disputes are assumed to be resolved by action outside the provisions of this Recommendation | International Standard followed by new applications to the Registration Authority.

B.5 Register

B.5.1 Maintenance

B.5.1.1 The Registration Authority maintains a Register of assigned name values, together with the information specified in B.6.10. The Registration Authority is responsible for defining the internal procedures necessary for the maintenance of the Register.

B.5.1.2 Of the information elements specified in B.6.10, the assigned name value, the initial submitting organization, the initial requesting organization name and address, the initial requestor name and title, and the initial date of registration are not updated. All other information elements can be updated by the Registration Authority when requested to do so in the form specified in B.6.11 by an official of the organization to which the name has been assigned or, if an official of the organization does not exist, by the Sponsoring Authority for the assignment of the name value.

B.5.1.3 A Sponsoring Authority can request that an entry in the Register be marked as *invalid* for the context for use of the name value with which it is concerned. Such a request could result, for example, from a challenge process operated by the Sponsoring Authority or from the determination that intellectual property rights are being violated. Since the request is based on information not available at the time of the confirmation process, in general it is granted. However, the *invalid* mark will not be posted in the entry until at least one year after the request is accepted in order to allow sufficient time for users of the name value to accommodate the change.

B.5.1.4 When an *invalid* mark is put on a Register entry, then the name value for the entry cannot be used in the context for use of the name that has been specified by the corresponding Sponsoring Authority. As soon as the request to post an *invalid* mark is granted, the Registration Authority promulgates the information to all sponsoring authorities.

B.5.1.5 A Sponsoring Authority or an ITO can request the deletion of a Register entry for which it is responsible. When a Register entry is deleted, the name value in the entry is no longer usable. The Registration Authority promulgates the information to all Sponsoring Authorities and ITOs. The name from the deleted entry is not made eligible for reuse until at least one year after the request is accepted in order to allow sufficient time for there to be no confusion with the previous use of the name.

B.5.1.6 At specified intervals, the Registration Authority requests validation of entries in the Register from the organizations concerned. If validation is not received, and there is confirmation either from the organization itself or from the Sponsoring Authority that the name is no longer in use, the entry is deleted.

NOTE – There may be cases in which reuse is not advisable (e.g., because of the use of security mechanisms). The decision is made on a case-by-case basis by the Registration Authority in consultation with the Sponsoring Authority or ITO.

B.5.2 Inquiry

B.5.2.1 An inquiry service is available from the Registration Authority. The service allows potential applicants for the assignment of international organization names to determine if a name value has already been assigned.

B.5.2.2 To make an inquiry, an organization submits an Inquiry request as specified in B.6.7.

B.5.2.3 The Registration Authority responds to an inquiry request in an inquiry response as specified in B.6.8. To the extent practicable, the response is returned within ten working days of the request.

B.5.3 Publication

B.5.3.1 A publication service is available from the Registration Authority. The service provides copies of subsets of the Register entries. The Register entry information is not made available for those organizations that have not authorized the release of information.

B.5.3.2 A request for information is made in the form of a publication request as specified in B.6.9.

B.5.3.3 The Registration Authority returns the requested information in a publication response as specified in B.6.9 in an appropriate form (i.e., hard copy or electronic). The time required for the response will vary depending upon the complexity of the selection criteria and the amount of data to be extracted.

B.6 Content of forms

This subclause specifies the information required in the forms used by the Registration Authority to conduct the registration process.

B.6.1 Registration application

The application shall include the following information:

- 1) Name of Sponsoring Authority or ITO submitting the application.

- 2) Name of requesting organization (null in the case of an ITO).
- 3) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the requesting organization.
- 4) Name and title of the requestor.
- 5) Proposed alphanumeric name value.
- 6) Statement of the right to the name value.
- 7) Statement of whether or not the information can be published.

B.6.2 Request for confirmation

The request for confirmation sent by the Registration Authority to all Sponsoring Authorities shall include the following information:

- 1) Start date of the review period.
- 2) End date of the review period (response due date).
- 3) The requested Organization Name value.
- 4) The identity of the ITO, or of the Sponsoring Authority and requesting organization.
- 5) A copy of this Recommendation | International Standard.

B.6.3 Response to a request for confirmation

The response to a request for confirmation sent by the Sponsoring Authority shall include the following information:

- 1) Confirmation or denial that the requested name value can be used in the context for use of the name value of concern to the Sponsoring Authority.
- 2) Optionally, comments and supporting information (e.g., explaining a denial).

B.6.4 Notification

The Registration Authority sends a notification to an applicant when the requested name value is entered into the confirmation process. The notification shall include the following information:

- 1) Start date of the review period.
- 2) End date of the review period (Sponsoring Authority due response date).
- 3) The requested Organization Name value.

B.6.5 Registration announcement

The Registration Authority sends a registration announcement to an applicant when the assignment of a name value has been confirmed and entered in the Register. The registration announcement shall include the following information:

- 1) Name of the ITO or Sponsoring Authority submitting the application.
- 2) Name of the requesting organization (null in the case of an ITO).
- 3) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the requesting organization.
- 4) Name and title of the requestor.
- 5) Confirmed alphanumeric name value.

B.6.6 Notice of rejection

The Registration Authority sends a notice of rejection to an applicant when the assignment of a name value has been rejected. The notice of rejection shall include the following information:

- 1) Name of the ITO or Sponsoring Authority submitting the application.
- 2) Name of the requesting organization (null in the case of an ITO).
- 3) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the requesting organization.
- 4) Name and title of the requestor.
- 5) Requested alphanumeric name value.
- 6) Reason for rejection – identified by citing the relevant subclause of this annex.

B.6.7 Inquiry request

The inquiry request service is provided to allow potential applicants to determine if a name value has already been assigned. An inquiry request shall include the following information:

- 1) Requesting organization name.
- 2) Requesting organization address.
- 3) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the requesting organization.
- 4) Queried name value.

B.6.8 Inquiry response

An inquiry response shall include the following information:

- 1) Requesting organization name.
- 2) Requesting organization address.
- 3) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the requesting organization.
- 4) Queried name value.
- 5) Status of queried name value:
 - a) not assigned;
 - b) assigned and, if any, marked as *invalid* or *inactive*;
 - c) under review.

B.6.9 Publication request and response

A publication request service is provided to allow information to be obtained on entries in the Register. A publication request and response shall include the following information:

- 1) Requesting organization name.
- 2) Requesting organization address.
- 3) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the requesting organization.
- 4) The selection criteria to be used to select entries from which information will be extracted.

For entries matching the selection criteria, the publication response shall include the following information:

- 1) Name value.
- 2) Registrant information (if authorized): Organization name and address and point of contact.

B.6.10 Register entry

A Register entry shall include the following information:

- 1) Name of the ITO or sponsoring authority submitting the application – *Will not change*.
- 2) Name of the initial registered organization (null in the case of an ITO) – *Will not change*.
- 3) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the initial registered organization – *Will not change*.
- 4) Name and title of the initial requestor – *Will not change*.
- 5) Date of initial registration – *Will not change*.
- 6) Name of current ITO or sponsoring authority.
- 7) Name of current registered organization.
- 8) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the current registered organization.
- 9) Name and title of the current requestor.
- 10) Date of last update to the entry.
- 11) Information publishable (yes or no).
- 12) Assigned name value.

B.6.11 Request for update

A request for update to the Register shall include the following information:

- 1) Name of current ITO or sponsoring authority.
- 2) Name of current registered organization.
- 3) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the current registered organization.
- 4) Name and title of the current requestor.
- 5) Requested changes to the Register entry.
- 6) Date on which the changes will be effective.

Annex C

The assignment of joint international organization arcs

(This annex forms an integral part of this Recommendation | International Standard)

C.1 Purpose

The purpose of this annex is to define the procedures for the assignment of joint international organization arcs (and their arc properties) to international organizations, with joint agreement of ITU-T and ISO.

C.2 Requirements for arc properties

C.2.1 The primary integer value is allocated by this registration authority (normally sequentially) and defines the integer-valued Unicode label. Non-integer Unicode labels and secondary identifiers are proposed by the applicant, but are required to conform to the syntactic requirements specified in ITU-T Rec. X.660 | ISO/IEC 9834-1, 7.2.5 and 7.2.7.

NOTE – Applicants are encouraged to propose multiple different non-integer Unicode labels, suited to each language version of their preferred name.

C.3 Use of arc properties for object identifier values

C.3.1 The following object identifier value can be used to identify the international organization:

`{joint-iso-itu-t(2) international-organizations(23) org-x(n)}`

where *n* is the primary integer value assigned by the Registration Authority and *org-x* is an assigned secondary identifier.

C.3.2 The assignment of an arc to an organization also delegates to that organization the authority to assign subsequent arcs (or to delegate authority for such assignment, subject to constraint on the uniqueness and syntax of arc properties).

C.4 Use of arc properties for OID international resource identifier values

C.4.1 The following OID resource identifier value can be used to identify the international organization:

`"Joint-ISO-ITU-T/International-Organizations/屎屍市弑"`

Where 屎屍市弑 has been assigned as one of the Unicode labels in the arc properties for the arc identifying the international organization.

C.4.2 The assignment of an arc to an organization also delegates to that organization the authority to assign subsequent arcs (or to delegate authority for such assignment, subject to the constraints on the uniqueness and syntax of arc properties).

C.5 Registration procedures

This subclause specifies the procedures to be followed in the assignment of arcs and arc properties to international organizations. The procedures are designed to assure openness and due process in the registration.

C.5.1 Application for registration

C.5.1.1 An ITO submits an application directly to the Registration Authority. Other applications are submitted through a Sponsoring Authority. The content of the application is defined in C.7.1.

NOTE – Registrations can only be requested by a Responsible Officer of an ITO or part of an ITO.

C.5.1.2 Upon successful completion of the procedures specified in this annex, the non-integer Unicode labels and secondary identifier values supplied by the applicant (as constrained by the rules in C.2) are registered as assigned, together with the primary integer value (defining the integer-valued Unicode label) assigned by the Registration Authority.

C.5.1.3 When applicants require multiple arcs, they must submit a separate application for each.

C.5.2 Review of applications

C.5.2.1 Procedure

C.5.2.1.1 Since non-integer Unicode labels and secondary identifiers may have a meaning outside the registration process, in order for an application to be processed it shall contain a signed statement asserting the applicant's right to the non-integer Unicode labels and secondary identifiers. If the statement is missing, the application shall be rejected by sending a notice of rejection as specified in C.7.6, citing this subclause as the reason for the rejection.

NOTE – In the context of registration, the signed statement is collected for recording purposes only. The statement may be useful, for example, in the Sponsoring Authority challenge process; however, such use is outside the scope of this Recommendation | International Standard.

C.5.2.1.2 If the application does not contain the information specified in C.7.1, the application shall be rejected by sending a notice of rejection as specified in C.7.6, citing this subclause as the reason for rejection.

C.5.2.1.3 If a new application arrives for a non-integer Unicode label or a secondary identifier that has already been requested, but the previous request has not yet been confirmed, the following process is followed:

- a) If the new application arrives before the confirmation process for the previous application has started, then both applications are rejected by sending a notice of rejection as specified in C.7.6, citing this subclause as the reason for rejection.
- b) If the new application arrives after the confirmation process for the previous application has started, then the new application is put on hold until the confirmation process for the previous application is completed. If the confirmation is successful, then the new application is rejected by sending a notice of rejection as specified in C.7.6, citing this subclause as the reason for rejection. If the confirmation is not successful, then the new application continues with the confirmation process.

C.5.2.1.4 If the application is accepted, it is put into the confirmation process specified in C.5.3.

C.5.2.2 Response time

C.5.2.2.1 To the extent practicable, review of an application under the procedures specified in C.5.2.1 is completed within ten working days of the receipt of the application.

C.5.2.2.2 The Registration Authority may batch together several applications for registration when communicating the confirmation requests to Sponsoring Authorities. Nevertheless, the beginning of the confirmation process for any application should not be delayed by more than two months from the date at which the application was submitted.

C.5.2.3 Unprocessable applications

An application is unprocessable if one of the requested non-integer Unicode labels or secondary identifiers does not comply with the requirements specified in C.2. The application is rejected by sending a notice of rejection as specified in C.7.6, citing this subclause as the reason for the rejection.

C.5.3 Confirmation process

C.5.3.1 The requested non-integer Unicode labels and secondary identifiers are compared with all other non-integer Unicode labels and secondary identifiers in the register. If one of the Unicode labels or secondary identifiers is a duplicate, the request is rejected by sending a notice of rejection as specified in C.7.6, citing this subclause as the reason for the rejection. If none of the requested non-integer Unicode labels and secondary identifiers is a duplicate, they are entered into the Review List. The Review List is published and a request for confirmation as specified in C.7.2, is sent to each Sponsoring Authority.

C.5.3.2 The review period is at least six months. The start and end dates of the review period are published. To the extent practicable, notice of the publication of the supplied non-integer Unicode labels and secondary identifiers and of the start of the review period, are sent to the applicant within 20 working days.

C.5.3.3 Sponsoring organizations respond to the request for confirmation in the form specified in C.7.3. Abstention, or the absence of a reply from a sponsoring organization within the specified review period, is considered as a confirmation by that Sponsoring Authority that the non-integer Unicode labels and secondary identifiers can be used within the context for which it is responsible.

C.5.3.4 If there is unanimous confirmation of the assignment of the requested non-integer Unicode labels and secondary identifiers at the end of the review period, then the non-integer Unicode labels and secondary identifiers are removed from the Review List and entered in the Register together with the primary integer value (defining the integer-valued Unicode label) assigned by the Registration Authority. An announcement of registration as specified in C.7.5, is sent to the applicant. The announcement of registration shall be sent within ten working days of the close of the review period.

C.5.3.5 The primary integer value (defining the integer-valued Unicode label) assigned shall be the next integer in the sequence for the Register. The starting point for the sequence is not specified by this annex.

C.5.3.6 If there is no unanimous confirmation of the assignment of the requested non-integer Unicode labels and secondary identifiers, then the non-integer Unicode labels and secondary identifiers are removed from the Review List and a notice of rejection as specified in C.7.6, is sent to the applicant, citing this subclause as the reason for the rejection. The notice of rejection shall be sent within ten working days of the close of the review period.

C.5.3.7 Neither the Registration Authority nor ITU-T | ISO/IEC plays any role in the resolution of disputes over the use of non-integer Unicode labels and secondary identifiers. Such disputes are assumed to be resolved by action outside the provisions of this Recommendation | International Standard followed by new applications to the Registration Authority.

C.6 Register

C.6.1 Maintenance

C.6.1.1 The Registration Authority maintains a Register of assigned arc identifications, together with the information specified in C.7.10. The Registration Authority is responsible for defining the internal procedures necessary for the maintenance of the Register.

C.6.1.2 Of the information elements specified in C.7.10, the assigned arc identifications, the initial submitting organization, the initial requesting organization name and address, the initial requester name and title, and the initial date of registration are not updated. All other information elements can be updated by the Registration Authority when requested to do so, in the form specified in C.7.11 by an official of the organization to which the arc has been assigned or, if an official of the organization does not exist, by the Sponsoring Authority for the assignment of the arc.

C.6.1.3 A Sponsoring Authority can request that a non-integer Unicode label or a secondary identifier that is one of the arc identifications be marked as *invalid* for the context for use of those arc identifications with which it is concerned. Such a request could result, for example, from a challenge process operated by the Sponsoring Authority or from the determination that intellectual property rights are being violated. Since the request is based on information not available at the time of the confirmation process, in general it is granted. However, the *invalid* mark will not be posted in the entry until at least one year after the request is accepted in order to allow sufficient time for users of arc identifications to accommodate the change.

C.6.1.4 When an *invalid* mark is put on a name in one of the arc identifications, then the *invalid* part of the arc identifications cannot be used in the context for use of those arc identifications that have been specified by the corresponding Sponsoring Authority. As soon as the request to post an *invalid* mark is granted, the Registration Authority promulgates the information to all Sponsoring Authorities.

C.6.1.5 A Sponsoring Authority or an ITO can request the deletion of a Register entry for which it is responsible. When a Register entry is deleted, all parts of the arc identifications in the entry are no longer usable. The Registration Authority promulgates the information to all Sponsoring Authorities and ITOs. The primary integer value (defining the integer-valued Unicode label) from the deleted entry is not reassigned. The non-integer Unicode labels and secondary identifiers from the deleted entry are not made eligible for reuse until at least one year after the request is accepted, in order to allow sufficient time for there to be no confusion with the previous use of the names.

C.6.1.6 At specified intervals, the Registration Authority requests validation of entries in the Register from the organizations concerned. If validation is not received, and there is confirmation either from the organization itself or from the Sponsoring Authority that assigned the entry, then the arc identifications are no longer in use, and the entry is deleted.

NOTE – There may be cases in which reuse is not advisable (e.g., because of the use of security mechanisms). The decision is made on a case-by-case basis by the Registration Authority in consultation with the Sponsoring Authority or ITO.

C.6.2 Inquiry

C.6.2.1 An inquiry service is available from the Registration Authority. The service allows potential applicants for the assignment of arcs to determine if a non-integer Unicode label or a secondary identifier has already been assigned.

C.6.2.2 To make an inquiry, an organization submits an Inquiry request as specified in C.7.7.

C.6.2.3 The Registration Authority responds to an inquiry request in an inquiry response as specified in C.7.8. To the extent practicable, the response is returned within ten working days of the request.

C.6.3 Publication

C.6.3.1 A publication service is available from the Registration Authority. The service provides copies of subsets of the Register entries. The Register entry information is not made available for those organizations that have not authorized the release of information.

C.6.3.2 A request for information is made in the form of a publication request as specified in C.7.9.

C.6.3.3 The Registration Authority returns the requested information in a publication response as specified in C.7.9 in an appropriate form (i.e., hard copy or electronic). The time required for the response will vary depending upon the complexity of the selection criteria and the amount of data to be extracted.

C.7 Content of forms

This subclause specifies the information required in the forms used by the Registration Authority to conduct the registration process.

C.7.1 Registration application

The application shall include the following information:

- 1) Name of Sponsoring Authority or ITO submitting the application, using English spelling where possible.
- 2) Name of requesting organization (null in the case of an ITO), using English spelling where possible.
- 3) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the requesting organization.
- 4) Name and title of the requestor.
- 5) Proposed non-integer Unicode labels and secondary identifiers.
- 6) Statement of the right to the non-integer Unicode labels and secondary identifiers.
- 7) Statement of whether or not the information can be published.

C.7.2 Request for confirmation

The request for confirmation sent by the Registration Authority to all Sponsoring Authorities shall include the following information:

- 1) Start date of the review period.
- 2) End date of the review period (response due date).
- 3) The requested non-integer Unicode labels and secondary identifiers.
- 4) The identity of the ITO, or of the Sponsoring Authority and requesting organization.
- 5) A copy of this Recommendation | International Standard.

C.7.3 Response to a request for confirmation

The response to a request for confirmation sent by a Sponsoring Authority shall include the following information:

- 1) Confirmation (or denial) that one or more of the requested non-integer Unicode labels and secondary identifiers can be used in the context for use that is of concern to the Sponsoring Authority.
- 2) Optionally, comments and supporting information (e.g., explaining a denial).

C.7.4 Notification

The Registration Authority sends a notification to an applicant when the requested arc identifications are entered into the confirmation process. The notification shall include the following information:

- 1) Start date of the review period.
- 2) End date of the review period (Sponsoring Authority due response date).
- 3) The arc identifications proposed for allocation.

C.7.5 Registration announcement

The Registration Authority sends a registration announcement to an applicant when arc identifications have been confirmed and entered in the Register. The registration announcement shall include the following information:

- 1) Name of the ITO or Sponsoring Authority submitting the application.
- 2) Name of the requesting organization (null in the case of an ITO).

- 3) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the requesting organization.
- 4) Name and title of the requestor.
- 5) Confirmed arc identifications.

C.7.6 Notice of rejection

The Registration Authority sends a notice of rejection to an applicant when the assignment of a non-integer Unicode label or a secondary identifier has been rejected. The notice of rejection shall include the following information:

- 1) Name of the ITO or Sponsoring Authority submitting the application.
- 2) Name of the requesting organization (null in the case of an ITO).
- 3) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the requesting organization.
- 4) Name and title of the requestor.
- 5) Requested non-integer Unicode label or secondary identifier.
- 6) Reason for rejection – identified by citing the relevant subclause of this annex.

C.7.7 Inquiry request

The inquiry request service is provided to allow potential applicants to determine if a non-integer Unicode label or a secondary identifier has already been assigned. An inquiry request shall include the following information:

- 1) Requesting organization name.
- 2) Requesting organization address.
- 3) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the requesting organization.
- 4) Queried non-integer Unicode label or secondary identifier.

C.7.8 Inquiry response

An inquiry response shall include the following information:

- 1) Requesting organization name.
- 2) Requesting organization address.
- 3) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the requesting organization.
- 4) Queried non-integer Unicode label or secondary identifier.
- 5) Status of queried non-integer Unicode label or secondary identifier:
 - a) not assigned;
 - b) assigned and, if any, marked as *invalid* or *inactive*;
 - c) under review.

C.7.9 Publication request and response

A publication request service is provided to allow information to be obtained on entries in the Register. A publication request and response shall include the following information:

- 1) Requesting organization name.
- 2) Requesting organization address.
- 3) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the requesting organization.
- 4) The selection criteria to be used to select entries from which information will be extracted.

For entries matching the selection criteria, the publication response shall include the following information:

- 1) Arc identifications.
- 2) Registrant information (if authorized): Organization name and address and point of contact.

C.7.10 Register entry

A Register entry shall include the following information:

- 1) Name of the ITO or Sponsoring Authority submitting the application – *Will not change*.
- 2) Name of the initial registered organization (null in the case of an ITO) – *Will not change*.
- 3) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the initial registered organization – *Will not change*.
- 4) Name and title of the initial requestor – *Will not change*.
- 5) Date of initial registration – *Will not change*.
- 6) Name of current ITO or Sponsoring Authority.
- 7) Name of current registered organization.
- 8) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the current registered organization.
- 9) Name and title of the current requestor.
- 10) Date of last update to the entry.
- 11) Information publishable (yes or no).
- 12) Arc identifications.

C.7.11 Request for update

A request for update to the Register shall include the following information:

- 1) Name of current ITO or Sponsoring Authority.
- 2) Name of current registered organization.
- 3) Name, postal/electronic mail address and telephone/facsimile number for the contact point within the current registered organization.
- 4) Name and title of the current requestor.
- 5) Requested changes to the Register entry.
- 6) Date on which the changes will be effective.

SERIES OF ITU-T RECOMMENDATIONS

Series A	Organization of the work of ITU-T
Series D	General tariff principles
Series E	Overall network operation, telephone service, service operation and human factors
Series F	Non-telephone telecommunication services
Series G	Transmission systems and media, digital systems and networks
Series H	Audiovisual and multimedia systems
Series I	Integrated services digital network
Series J	Cable networks and transmission of television, sound programme and other multimedia signals
Series K	Protection against interference
Series L	Construction, installation and protection of cables and other elements of outside plant
Series M	Telecommunication management, including TMN and network maintenance
Series N	Maintenance: international sound programme and television transmission circuits
Series O	Specifications of measuring equipment
Series P	Telephone transmission quality, telephone installations, local line networks
Series Q	Switching and signalling
Series R	Telegraph transmission
Series S	Telegraph services terminal equipment
Series T	Terminals for telematic services
Series U	Telegraph switching
Series V	Data communication over the telephone network
Series X	Data networks, open system communications and security
Series Y	Global information infrastructure, Internet protocol aspects and next-generation networks
Series Z	Languages and general software aspects for telecommunication systems