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Information technology — Telecommunications and information exchange between systems — Private Integrated Services Networks — Addressing

*Technologies de l'information — Télécommunications et échange
d'information entre systèmes — Réseaux privés à intégration de
services — Adressage*



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Foreword

ISO (the International Organization for Standardization) and IEC (the International Electrotechnical Commission) form the specialized system for worldwide standardization. National bodies that are members of ISO or IEC participate in the development of International Standards through technical committees established by the respective organization to deal with particular fields of technical activity. ISO and IEC technical committees collaborate in fields of mutual interest. Other international organizations, governmental and non-governmental, in liaison with ISO and IEC, also take part in the work.

In the field of information technology, ISO and IEC have established a joint technical committee, ISO/IEC JTC 1. Draft International Standards adopted by the joint technical committee are circulated to national bodies for voting. Publication as an International Standard requires approval by at least 75 % of the national bodies casting a vote.

International Standard ISO/IEC 11571 was prepared by ECMA (as ECMA-155) and was adopted, under a special "fast-track procedure", by Joint Technical Committee ISO/IEC JTC 1, *Information technology*, in parallel with its approval by national bodies of ISO and IEC.

This second edition cancels and replaces the first edition (ISO/IEC 11571:1994), which has been technically revised.

Annexes C and F form an integral part of this International Standard. Annexes A, B, D and E are for information only.

Introduction

This International Standard is one of a series of International Standards which are applicable to Private Integrated Services Networks (PISNs). Its purpose is to serve as a general and common reference for all addressing-related statements in other standards on PISNs.

This International Standard is based on the ISDN concept as developed by ITU-T and refined by ETSI for European applications, but modified to cover the particularities of PISNs. It conforms to the framework of International Standards for Open Systems Interconnection as defined by ISO/IEC.

This International Standard enables the Administrator of a PISN to choose whether

- the ISDN Numbering Plan according to ITU-T Rec. E.164, or
- a Private Numbering Plan, or
- an Implicit Numbering Plan, or
- an OSI NSAP addressing plan, or
- any combination of these numbering plans

shall be employed as native numbering plan(s) in its PISN (PISN NP).

In addition, the Administrator can employ PISN subaddressing in order to expand the addressing capacity beyond the capacity of the PISN NP.

The impact of this on terminal interchangeability between accesses of public and private ISDNs is indicated in annex D.

This International Standard is based upon the practical experience of ECMA member companies and the results of their active and continuous participation in the work of ISO/IEC JTC1, ITU-T, ETSI and other international and national standardization bodies. It represents a pragmatic and widely based consensus.

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1 Scope

This International Standard defines the requirements for the handling of network addresses for the identification of entities which use or provide telecommunication services offered by Private Integrated Services Networks (PISNs). This International Standard covers numbering, including the requirements for the support of a Private Numbering Plan, the addressing of network service access points for open systems interconnection (OSI NSAP addressing), and the support of subaddressing.

This International Standard is applicable to Private Integrated Services Network Exchanges with broad-band and narrow-band capabilities (PINX) and to terminals to be attached to the access of PINXs. Any use by a PINX of the Support of Private Numbering Plans supplementary service provided by a public ISDN is outside the scope of this International Standard.

Although this International Standard does not explicitly describe its application to location-independent (mobile) addressable entities, this application is not precluded.

2 Conformance

In order to conform to this International Standard, a PINX shall meet the mandatory requirements of clauses 6 to 8 and 10.

In order to conform to this International Standard, a terminal for attachment to an access of a PINX shall meet the mandatory requirements of clauses 9 and 11.

3 Normative references

The following standards contain provisions which, through reference in this text, constitute provisions of this International Standard. At the time of publication, the editions indicated were valid. All standards are subject to revision, and parties to agreements based on this International Standard are encouraged to investigate the possibility of applying the most recent editions of the standards indicated below. Members of IEC and ISO maintain registers of currently valid International Standards.

ISO/IEC 8348:1996,	<i>Information technology - Open Systems Interconnection - Network Service Definition.</i>
ISO/IEC 11579-1:1994,	<i>Information technology - Telecommunications and information exchange between systems - Private Integrated Services Network - Part 1: Reference configuration for PISN Exchanges (PINX).</i>
ITU-T Rec. E.160:1993,	<i>Definitions relating to national and international numbering plans.</i>
ITU-T Rec. E.164:1991,	<i>Numbering plan for the ISDN era.</i>
ITU-T Rec. I.334:1988,	<i>Principles relating ISDN numbers/sub-addresses to the OSI reference model network layer addresses (Blue Book).</i>
ETS 300 059:1991,	<i>Integrated Services Digital Network (ISDN); Subaddressing (SUB) supplementary service; Service description.</i>
ETS 300 062:1991,	<i>Integrated Services Digital Network (ISDN); Direct Dialling In (DDI) supplementary service; Service description.</i>
ETS 300 089:1992,	<i>Integrated Services Digital Network (ISDN); Calling Line Identification Presentation (CLIP) supplementary service; Service description.</i>
ETS 300 094:1992,	<i>Integrated Services Digital Network (ISDN); Connected Line Identification Presentation (COLP) supplementary service; Service description.</i>
ETS 300 102-1:1990,	<i>Integrated Services Digital Network (ISDN); User-network interface layer 3 specifications for basic call control.</i>

In addition to these normative references, informative references are listed in annex A.