

ETSI TS 131 110 V3.0.0 (2000-01)

Technical Specification

Universal Mobile Telecommunications System (UMTS); Numbering system for telecommunication IC card applications (3G TS 31.110 version 3.0.0 Release 1999)



Reference

DTS/TSGT-0331110U

Keywords

UMTS

ETSI

Postal address

F-06921 Sophia Antipolis Cedex - FRANCE

Office address

650 Route des Lucioles - Sophia Antipolis
Valbonne - FRANCE
Tel.: +33 4 92 94 42 00 Fax: +33 4 93 65 47 16
Siret N° 348 623 562 00017 - NAF 742 C
Association à but non lucratif enregistrée à la
Sous-Préfecture de Grasse (06) N° 7803/88

Internet

secretariat@etsi.fr
Individual copies of this ETSI deliverable
can be downloaded from
<http://www.etsi.org>
If you find errors in the present document, send your
comment to: editor@etsi.fr

Important notice

This ETSI deliverable may be made available in more than one electronic version or in print. In any case of existing or perceived difference in contents between such versions, the reference version is the Portable Document Format (PDF). In case of dispute, the reference shall be the printing on ETSI printers of the PDF version kept on a specific network drive within ETSI Secretariat.

Copyright Notification

No part may be reproduced except as authorized by written permission.
The copyright and the foregoing restriction extend to reproduction in all media.

© European Telecommunications Standards Institute 2000.
All rights reserved.

Intellectual Property Rights

IPRs essential or potentially essential to the present document may have been declared to ETSI. The information pertaining to these essential IPRs, if any, is publicly available for **ETSI members and non-members**, and can be found in SR 000 314: "*Intellectual Property Rights (IPRs); Essential, or potentially Essential, IPRs notified to ETSI in respect of ETSI standards*", which is available from the ETSI Secretariat. Latest updates are available on the ETSI Web server (<http://www.etsi.org/ipr>).

Pursuant to the ETSI IPR Policy, no investigation, including IPR searches, has been carried out by ETSI. No guarantee can be given as to the existence of other IPRs not referenced in SR 000 314 (or the updates on the ETSI Web server) which are, or may be, or may become, essential to the present document.

Foreword

This Technical Specification (TS) has been produced by the ETSI 3rd Generation Partnership Project (3GPP).

The present document may refer to technical specifications or reports using their 3GPP identities or GSM identities. These should be interpreted as being references to the corresponding ETSI deliverables. The mapping of document identities is as follows:

For 3GPP documents:

3G TS | TR nn.nnn "<title>" (with or without the prefix 3G)

is equivalent to

ETSI TS | TR 1nn nnn "[Digital cellular telecommunications system (Phase 2+) (GSM);] Universal Mobile Telecommunications System; <title>

For GSM document identities of type "GSM xx.yy", e.g. GSM 01.04, the corresponding ETSI document identity may be found in the Cross Reference List on www.etsi.org/key

Contents

Foreword	4
1 Scope.....	4
2 References.....	4
3 Definitions and abbreviations	5
3.1 Definitions	5
3.2 Abbreviations.....	5
4 Structure of the Application Identifier (AID)	6
4.1 Registered application provider Identifier (RID).....	6
4.2 Proprietary application Identifier eXtension (PIX).....	6
5 Use of the Application Identifier (AID).....	7
Annex A: (Informative) Allocated PIX numbers	8
Annex B: (Normative) Coding of the PIX for 3G Applications	9
Annex C (Informative): Change history	10

Foreword

This Technical Specification has been produced by the 3GPP.

The contents of the present document are subject to continuing work within the TSG and may change following formal TSG approval. Should the TSG modify the contents of this TS, it will be re-released by the TSG with an identifying change of release date and an increase in version number as follows:

Version x.y.z

where:

- x the first digit:
 - 1 presented to TSG for information;
 - 2 presented to TSG for approval;
 - 3 Indicates TSG approved document under change control.
- y the second digit is incremented for all changes of substance, i.e. technical enhancements, corrections, updates, etc.
- z the third digit is incremented when editorial only changes have been incorporated in the document.

1 Scope

The present document describes the numbering system for Application IDentifiers (AID) for 3G telecommunication Integrated Circuits (IC) card applications.

The numbering system described in the present document provides a means for an application and related services offered by a provider to identify if a given card contains the elements required by its application and related services.

An AID is used to address an application in the card. It consists of a Registered application provider IDentifier (RID) and a Proprietary application Identifier eXtension (PIX).

The present document describes the coding of the PIX.

2 References

References may be made to:

- a) specific versions of publications (identified by date of publication, edition number, version number, etc.), in which case, subsequent revisions to the referenced document do not apply; or
- b) all versions up to and including the identified version (identified by "up to and including" before the version identity); or
- c) all versions subsequent to and including the identified version (identified by "onwards" following the version identity); or
- d) publications without mention of a specific version, in which case the latest version applies.

- [1] ISO/IEC 7816-4 (1995): "Information technology - Identification cards - Integrated circuit(s) cards with contacts - Part 4: Inter-industry commands for interchange".
- [2] ISO/IEC 7816-5 (1994): "Identification cards - Integrated circuit(s) cards with contacts - Part 5: Numbering system and registration procedure for application identifiers".
- [3] ITU-T Recommendation E.118: "The international telecommunication charge card".

- [4] ITU-T Recommendation E.164: "Numbering plan for the ISDN era".
- [5] GSM 11.11: "Specification of the Subscriber Identity Module - Mobile Equipment (SIM - ME) interface".
- [6] GSM 11.14: "Specification of the SIM Application Toolkit for the Subscriber Identity Module - Mobile Equipment (SIM - ME) interface".
- [7] GSM 03.19: "Subscriber Identify Module Application Programming Interface (SIM API); SIM API for Java Card; Stage 2".
- [8] 3G TS 31.101: "UICC - Terminal interface; Physical and logical characteristics".
- [9] 3G TS 31.102: "Characteristics of the USIM Application".
- [10] 3G TS 31.111: "USIM Application Toolkit".
- [11] GSM 03.48 "Security Mechanisms for the SIM application toolkit"
- [12] EG 201 220: "Integrated Circuit Cards (ICC); ETSI numbering system for telecommunication Application providers (AID)".

3 Definitions and abbreviations

3.1 Definitions

For the purposes of the present document, the following definitions apply:

Application Identifier (AID): A data element which identifies an application in a card. An AID may contain a Registered application provider Identifier (RID). If it contains either a RID or an issuer identification number, then this identification is unambiguous (see ISO/IEC 7816-5 [2]).

Application Provider : An entity which provides those components of an application on a card required to perform the respective application (see ISO/IEC 7816-5 [2]).

Telecommunication IC card application: An application described by a 3G document.

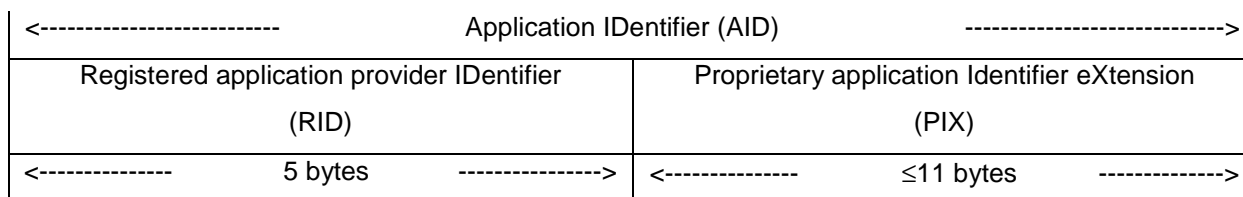
3.2 Abbreviations

For the purposes of the present document, the following abbreviations apply:

AID	Application Identifier
GSM	Global System for Mobile communications
IC	Integrated Circuit(s)
ICC	IC Card
ID	Identifier
PIX	Proprietary application Identifier eXtension
RID	Registered application provider Identifier

4 Structure of the Application Identifier (AID)

In accordance with ISO/IEC 7816-5 [2], the AID has the following structure:



The AID consists of a Registered application provider Identifier (RID) of 5 bytes and a Proprietary application Identifier eXtension (PIX) of up to 11 bytes.

4.1 Registered application provider Identifier (RID)

The 3G RID, as registered by ISO/IEC according to ISO/IEC 7816-5 [2], is 'A000000087'.

4.2 Proprietary application Identifier eXtension (PIX)

The PIX is used at the discretion of 3G and can contain between 7 and 11 bytes of information. The PIX is coded in hexadecimal. Hexadecimal digit 1 is the most significant digit.

Digit 1-4	3G application code
Purpose:	To be used for identification of the standardized 3G card application. Different versions of an application may have individual codings.
Management:	Assigned by ETSI Secretariat on request from the 3G technical body responsible for the document in question.
Coding:	Hexadecimal. The coding indicates the 3G document that specifies the standardized 3G card application and the 3G PIX number. The correspondence between digits 1-4 and the 3G document in question can be seen in a list maintained by the ETSI Secretariat (see Annex A). Escape value '0000' is reserved for use by the ETSI Secretariat for proprietary 3G applications.
Digits 5-8	Country code
Purpose:	To indicate the country of the application provider of the 3G standardized application.
Management:	Assigned by ETSI Secretariat.
Coding:	According to ITU Recommendation E.164 [4]. The coding is right justified and padded with 'F' on the left.
	NOTE: List of actual country codes is published by ITU.
Digits 9-14	Application provider code
Purpose:	Individual code for the application provider of the 3G standardized application.
Management:	Assigned by ETSI Secretariat.
Coding:	Hexadecimal. The coding is right justified and padded with 'F' on the left.
Digits 15 up to 22	Application provider field. Optional. Up to 8 digits
Purpose:	The use of this field is entirely up to the application provider. It may, for instance, be used to indicate "local" versions, revisions, etc. of the 3G

standardized application. According to ISO/IEC 7816-5 [2], if the AID is 16 bytes long, then the value 'FF' for the least significant byte (digits 21 and 22) is reserved for future use.

Management: Application provider.
Coding: Hexadecimal.

Digits 1 to 14 are assigned and registered by the ETSI Secretariat upon request by the responsible 3GPP Working Group.

5 Use of the Application Identifier (AID)

The use of the AID is specified in ISO/IEC 7816-4 [1] and ISO/IEC 7816-5 [2].

Annex A: (Informative) Allocated PIX numbers

Table A.1: Allocated ETSI PIX numbers

Table A.1 below is shown for information. The original table can be found in EG 201 220 [12].

ETSI Application Identifiers				
Application	AID			ETSI document
	RID (note 1)	ETSI App Code	PIX	
Reserved	'A000000009'	'0000'	Reserved for ETSI	
GSM	'A000000009'	'0001'	See EG 201 220 [12] for further coding details	GSM 11.11 [5]
GSM SIM toolkit	'A000000009'	'0002'	See EG 201 220 [12] for further coding details	GSM 11.14 [6]
GSM SIM API for Java™ Card	'A000000009'	'0003'	See EG 201 220 [12] for further coding details	GSM 03.19 [7]
NOTE 1: The ETSI RID, as registered by ISO/IEC according to ISO/IEC 7816-5 [2], is 'A000000009'.				

Table A.2: Allocated 3G PIX numbers

3G Application Identifiers				
Application	AID			3G document (note 2)
	RID (note 1)	3G App Code	PIX	
3G UICC	'A000000087'	'1001'	See annex B for further coding details	3G TS 31.101 [8]
3G USIM	'A000000087'	'1002'	See annex B for further coding details	3G TS 31.102 [9]
3G USIM toolkit	'A000000087'	'1003'	See annex B for further coding details	3G TS 31.111 [10]
NOTE 1: The 3GPP RID, as registered by ISO/IEC according to ISO/IEC 7816-5 [2], is 'A000000087'.				
NOTE 2: It is the responsibility of the 3GPP technical body, in charge of the application standardization, to inform the ETSI Secretariat when the respective 3G document is withdrawn or renumbered.				

Annex B: (Normative)

Coding of the PIX for 3G Applications

The following codings apply for the structure of the PIX when the application is a 3G telecommunication Integrated Circuits (IC) card application.

Digit 1-4 3G application code

Coding: As specified in clause 4.2 of this document, and as shown in table A.2.

Digits 5-8 Country code

Coding: As specified in clause 4.2 of this document

Digits 9-14 Application provider code

Coding: As defined below.

9	10	11	12	13	14	
						Industry Code '89' for Telecom Card issuer Code. Coded in BCD and right justified. Unused digits to be padded with 'F' on the left.

Card issuer code and Industry code are coded in line with ITU-T recommendation E.118 [3].

Digits 15 up to 22 Application provider field. 8 digits

Digits 15 to 22 are used only if the 3G application code is '1003' (i.e. UICC Toolkit application)

Coding: Hexadecimal. If the application is a UICC Toolkit application (as defined in 3G TS 31.111 [10]), the coding is as defined below.

15	16	17	18	19	20	21	22	
								Application Provider specific data Toolkit Application Reference (TAR)

Toolkit Application Reference as specified in GSM 03.48 [11], is managed by the application provider

Application Provider specific data: For application administration purposes.

Annex C (Informative): Change history

This annex lists all change requests approved for this document since the specification was first approved by 3GPP TSG-T.

Meet	TSG-T document	TSG-T3 document	CR	Rev	Rel	Cat	Subject	Resulting Version
TP-06	TP-99579	T3-99419	-		R99		Draft specification approved at TSG-T #-6, December 1999	3.0.0

History

Document history		
V3.0.0	January 2000	Publication