

Source: T3

Title: CRs to TS 31.103: Characteristics of the ISIM Application

Document for: Approval

This document contains the following change requests:

Doc-2nd-Level	Spec	CR	Rev	Cat	Phase	Subject	Version-Current	Version-New	WI
T3-030167	31.103	005	-	F	Rel-5	Alignment with the Stage 2 terminology.	5.2.0	5.3.0	TEI
T3-030194	31.103	006	-	F	Rel-6	Alignment with the Stage 2 terminology.	6.0.0	6.1.0	TEI

CR-Form-v7

CHANGE REQUEST

⌘ **31.103 CR 005** ⌘ rev **-** ⌘ Current version: **5.2.0** ⌘

For **HELP** on using this form, see bottom of this page or look at the pop-up text over the ⌘ symbols.

Proposed change affects: UICC apps ME Radio Access Network Core Network

Title:	⌘ Alignment with the Stage 2 terminology.		
Source:	⌘ T3		
Work item code:	⌘ TEI	Date:	⌘ 14/02/2003
Category:	⌘ F	Release:	⌘ Rel-5
	Use <u>one</u> of the following categories:		Use <u>one</u> of the following releases:
	F (correction)	R96 (GSM Phase 2)	
	A (corresponds to a correction in an earlier release)	R97 (Release 1996)	
	B (addition of feature),	R98 (Release 1997)	
	C (functional modification of feature)	R99 (Release 1998)	
	D (editorial modification)	Rel-4 (Release 1999)	
	Detailed explanations of the above categories can be found in 3GPP TR 21.900 .		Rel-5 (Release 4)
			Rel-6 (Release 5)
			Rel-6 (Release 6)

Reason for change:	⌘ For consistency with other specs (such as 23.228 and 23.003) names and descriptions for EFs IMPI, Domain and IMPU need to be changed.
Summary of change:	⌘ Correction of names and descriptions of certain EFs
Consequences if not approved:	⌘ Inconsistency and confusion with other specs.

Clauses affected:	⌘ § 2, 3.3, 4.2.2, 4.2.3, 4.2.4 and Annexes A, C and D										
Other specs affected:	<table border="1" style="display: inline-table; vertical-align: middle;"> <tr> <td style="width: 20px; text-align: center;">Y</td> <td style="width: 20px; text-align: center;">N</td> </tr> <tr> <td style="text-align: center;"><input type="checkbox"/></td> <td style="text-align: center;"><input checked="" type="checkbox"/></td> </tr> <tr> <td style="text-align: center;"><input type="checkbox"/></td> <td style="text-align: center;"><input checked="" type="checkbox"/></td> </tr> <tr> <td style="text-align: center;"><input type="checkbox"/></td> <td style="text-align: center;"><input checked="" type="checkbox"/></td> </tr> </table>	Y	N	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Other core specifications Test specifications O&M Specifications	⌘
Y	N										
<input type="checkbox"/>	<input checked="" type="checkbox"/>										
<input type="checkbox"/>	<input checked="" type="checkbox"/>										
<input type="checkbox"/>	<input checked="" type="checkbox"/>										
Other comments:	⌘										

How to create CRs using this form:

Comprehensive information and tips about how to create CRs can be found at <http://www.3gpp.org/specs/CR.htm>. Below is a brief summary:

- 1) Fill out the above form. The symbols above marked ⌘ contain pop-up help information about the field that they are closest to.
- 2) Obtain the latest version for the release of the specification to which the change is proposed. Use the MS Word "revision marks" feature (also known as "track changes") when making the changes. All 3GPP specifications can be

downloaded from the 3GPP server under <ftp://ftp.3gpp.org/specs/> For the latest version, look for the directory name with the latest date e.g. 2001-03 contains the specifications resulting from the March 2001 TSG meetings.

- 3) With "track changes" disabled, paste the entire CR form (use CTRL-A to select it) into the specification just in front of the clause containing the first piece of changed text. Delete those parts of the specification which are not relevant to the change request.

2 References

The following documents contain provisions that, through reference in this text, constitute provisions of the present document.

- References are either specific (identified by date of publication and/or edition number or version number) or non-specific.
- For a specific reference, subsequent revisions do not apply.
- For a non-specific reference, the latest version applies. In the case of a reference to a 3GPP document (including a GSM document), a non-specific reference implicitly refers to the latest version of that document *in the same Release as the present document*.

- [1] 3GPP TS 21.111: "USIM and IC Card Requirements".
- [2] 3GPP TS 31.102: "Characteristics of the USIM Application".
- [3] 3GPP TS 31.101: "UICC-Terminal Interface, Physical and Logical Characteristics".
- [4] 3GPP TS 33.102: "3G Security; Security Architecture".
- [5] 3GPP TS 33.103: "3G Security; Integration Guidelines".
- [6] ISO/IEC 7816-4 (1995): "Information technology - Identification cards - Integrated circuit(s) cards with contacts - Part 4: Interindustry commands for interchange".
- [7] ISO/IEC 7816-5 (1994): "Identification cards - Integrated circuit(s) cards with contacts - Part 5: Numbering system and registration procedure for application identifiers".
- [8] ITU-T Recommendation T.50: "International Reference Alphabet (IRA) (Formerly International Alphabet No. 5 or IA5) - Information technology - 7-bit coded character set for information interchange
- [8a] ISO 646 (1983): "Information processing - ISO 7-bits coded characters set for information interchange".
- [9] 3GPP TS 23.003: "Numbering, Addressing and Identification".
- [10] ISO/IEC 7816-9 (2000): "Identification cards - Integrated circuit(s) cards with contacts - Part 9: Additional interindustry commands and security attributes".
- [11] ISO/IEC 7816-6 (1996): "Identification cards - Integrated circuit(s) cards with contacts - Part 6: Interindustry data elements".
- [12] 3GPP TS 25.101: "UE Radio Transmission and Reception (FDD)".
- [13] 3GPP TS 23.228: "IP Multimedia Subsystem (IMS); Stage 2".
- [14] 3GPP TS 33.203: "3G security; Access security for IP-based services".
- [15] 3GPP TS 24.228: "Signalling flows for the IP multimedia call control based on SIP and SDP; Stage 3".
- [16] IETF RFC 3261: "SIP: Session Initiation Protocol".
- [17] 3GPP TS 23.038: "Alphabets and language-specific information".
- [18] ISO 639 (1988): "Code for the representation of names of languages".
- [19] 3GPP TS 51.011: "Specification of the Subscriber Identity Module - Mobile Equipment (SIM-ME) interface".
- [20] ISO/IEC 8825(1990): "Information technology - Open Systems Interconnection - Specification of Basic Encoding Rules for Abstract Syntax Notation One (ASN.1)" Second Edition.

- [21] 3GPP TS 22.101: "Service aspects; Service principles".
- [22] ETSI TS 102 223: "Smart cards; Card Application Toolkit (CAT)".
- [23] ETSI TS 101 220: "Smart cards; ETSI numbering system for telecommunication application providers".
- [\[XX\] IETF RFC 2486: "The Network Access Identifier"](#)

3.3 Abbreviations

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

3GPP	3 rd Generation Partnership Project
AC	Access Condition
ADF	Application Dedicated File
AID	Application IDentifier
AK	Anonymity Key
AKA	Authentication and Key Agreement
ALW	ALWays
AMF	Authentication Management Field
ASN.1	Abstract Syntax Notation One
AuC	Authentication Centre
AUTN	AUthentication TokeN
BER-TLV	Basic Encoding Rule - TLV
CK	Cipher Key
DF	Dedicated File
EF	Elementary File
FFS	For Further Study
HE	Home Environment
HN	Home Network
ICC	Integrated Circuit Card
ID	IDentifier
IK	Integrity Key
IM	IP Multimedia
IMPI	IM Private Identity
IMPU	IM Public identity
IMS	IP Multimedia Subsystem
ISIM	IM Services Identity Module
K	long-term secret Key shared between the ISIM and the AuC
KSI	Key Set Identifier
LI	Language Indication
LSB	Least Significant Bit
MAC	Message Authentication Code
MF	Master File
MSB	Most Significant Bit
NAI	Network Access Identifier
NEV	NEVer
PIN	Personal Identification Number
PL	Preferred Languages
PS_DO	PIN Status Data Object
RAND	RANdOm challenge
RES	user RESponse
RFU	Reserved for Future Use
RST	ReSeT
SDP	Session Description Protocol
SFI	Short EF Identifier
SIP	Session Initiation Protocol
SQN	SeQuence Number
SW	Status Word
TLV	Tag Length Value
UE	User Equipment

XRES eXpected user RESponse

4.2.2 EF_{IMPI} (IMS private user identity~~identifier~~)

This EF contains the private user identity~~SIP Identity (SIP URI)~~ of the user.

Identifier: '6F02'		Structure: transparent		Mandatory
SFI: '02'				
File size: X bytes		Update activity: low		
Access Conditions:				
READ		PIN		
UPDATE		ADM		
DEACTIVATE		ADM		
ACTIVATE		ADM		
Bytes	Description	M/O	Length	
1 to X	<u>URI</u> NAI TLV data object	M	X bytes	

- NAI~~URI~~

Contents:

- Private user identity~~SIP URI~~ of the-user.

Coding:

- For contents and coding of URI~~NAI~~ TLV data object values see IETF RFC ~~3261~~-2486 [XX+6]. The tag value of the NAI~~URI~~ TLV data object shall be '80'.

4.2.3 EF_{DOMAIN} (Home Network Domain Name~~SIP domain URI~~)

This EF contains the ~~SIP entry point in the~~ home operator's network domain name, ~~if different from the host part of the private SIP URI of the user from file EF_{IMPI}.~~

Identifier: '6F03'		Structure: transparent		Mandatory
SFI: '05'				
File size: X bytes		Update activity: low		
Access Conditions:				
READ		PIN		
UPDATE		ADM		
DEACTIVATE		ADM		
ACTIVATE		ADM		
Bytes	Description	M/O	Length	
1 to X	URI TLV data object	M	X bytes	

- URI

Contents:

- Home Network Domain Name~~Request URI~~.

Coding:

- For contents and coding of URI TLV data object values see IETF RFC 3261 [16]. The tag value of the URI TLV data object shall be '80'.

File Identification	Description	Value
'6F08'	Ciphering and Integrity Keys for IMS	'07FF...FF'
'6F02'	IMS private user identity identifier	'8000FF...FF'
'6F03'	SIP domain URI Home Network Domain Name	'8000FF...FF'
'6F04'	IMS public Identifier of user identity	'8000FF...FF'
'6FAD'	Administrative Data	Operator dependant
'6F06'	Access Rule Reference	Card issuer/operator dependant

Annex D (informative): List of SFI Values

This annex lists SFI values assigned in the present document.

D.1 List of SFI Values at the ISIM ADF Level

File Identification	SFI	Description
'6F08'	'01'	Ciphering and Integrity Keys for IMS
'6F02'	'02'	IMS private user identity identifier
'6F03'	'05'	Home Network Domain Name SIP domain URI
'6F04'	'04'	IMS public identifier of user identity
'6FAD'	'03'	Administrative Data
'6F06'	'06'	Access Rule Reference

All other SFI values are reserved for future use.

CR-Form-v7

CHANGE REQUEST

⌘ **31.103 CR 006** ⌘ rev **-** ⌘ Current version: **6.0.0** ⌘

For **HELP** on using this form, see bottom of this page or look at the pop-up text over the ⌘ symbols.

Proposed change affects: UICC apps ME Radio Access Network Core Network

Title:	⌘ Alignment with the Stage 2 terminology.		
Source:	⌘ T3		
Work item code:	⌘ TEI	Date:	⌘ 14/02/2003
Category:	⌘ F	Release:	⌘ Rel-6
	<i>Use one of the following categories:</i> F (correction) A (corresponds to a correction in an earlier release) B (addition of feature), C (functional modification of feature) D (editorial modification) Detailed explanations of the above categories can be found in 3GPP TR 21.900 .		<i>Use one of the following releases:</i> 2 (GSM Phase 2) R96 (Release 1996) R97 (Release 1997) R98 (Release 1998) R99 (Release 1999) Rel-4 (Release 4) Rel-5 (Release 5) Rel-6 (Release 6)

Reason for change:	⌘ For consistency with other specs (such as 23.228 and 23.003) names and descriptions for EFs IMPI, Domain and IMPU need to be changed.
Summary of change:	⌘ Correction of names and descriptions of certain EFs
Consequences if not approved:	⌘ Inconsistency and confusion with other specs.

Clauses affected:	⌘ § 2, 3.3, 4.2.2, 4.2.3, 4.2.4 and Annexes A, C and D						
Other specs affected:	<table border="1" style="display: inline-table; border-collapse: collapse;"> <tr> <td style="padding: 2px;">Y</td> <td style="padding: 2px;">N</td> </tr> <tr> <td style="text-align: center; padding: 2px;"><input type="checkbox"/></td> <td style="text-align: center; padding: 2px;"><input checked="" type="checkbox"/></td> </tr> </table>	Y	N	<input type="checkbox"/>	<input checked="" type="checkbox"/>	Other core specifications	⌘
	Y	N					
	<input type="checkbox"/>	<input checked="" type="checkbox"/>					
<input type="checkbox"/>	<input checked="" type="checkbox"/>	Test specifications	⌘				
<input type="checkbox"/>	<input checked="" type="checkbox"/>	O&M Specifications	⌘				
Other comments:	⌘						

How to create CRs using this form:

Comprehensive information and tips about how to create CRs can be found at <http://www.3gpp.org/specs/CR.htm>. Below is a brief summary:

- 1) Fill out the above form. The symbols above marked ⌘ contain pop-up help information about the field that they are closest to.
- 2) Obtain the latest version for the release of the specification to which the change is proposed. Use the MS Word "revision marks" feature (also known as "track changes") when making the changes. All 3GPP specifications can be

downloaded from the 3GPP server under <ftp://ftp.3gpp.org/specs/> For the latest version, look for the directory name with the latest date e.g. 2001-03 contains the specifications resulting from the March 2001 TSG meetings.

- 3) With "track changes" disabled, paste the entire CR form (use CTRL-A to select it) into the specification just in front of the clause containing the first piece of changed text. Delete those parts of the specification which are not relevant to the change request.

2 References

The following documents contain provisions that, through reference in this text, constitute provisions of the present document.

- References are either specific (identified by date of publication and/or edition number or version number) or non-specific.
- For a specific reference, subsequent revisions do not apply.
- For a non-specific reference, the latest version applies. In the case of a reference to a 3GPP document (including a GSM document), a non-specific reference implicitly refers to the latest version of that document *in the same Release as the present document*.

- [1] 3GPP TS 21.111: "USIM and IC Card Requirements".
- [2] 3GPP TS 31.102: "Characteristics of the USIM Application".
- [3] 3GPP TS 31.101: "UICC-Terminal Interface, Physical and Logical Characteristics".
- [4] 3GPP TS 33.102: "3G Security; Security Architecture".
- [5] 3GPP TS 33.103: "3G Security; Integration Guidelines".
- [6] ISO/IEC 7816-4 (1995): "Information technology - Identification cards - Integrated circuit(s) cards with contacts - Part 4: Interindustry commands for interchange".
- [7] ISO/IEC 7816-5 (1994): "Identification cards - Integrated circuit(s) cards with contacts - Part 5: Numbering system and registration procedure for application identifiers".
- [8] void
- [9] 3GPP TS 23.003: "Numbering, Addressing and Identification".
- [10] ISO/IEC 7816-9 (2000): "Identification cards - Integrated circuit(s) cards with contacts - Part 9: Additional interindustry commands and security attributes".
- [11] ISO/IEC 7816-6 (1996): "Identification cards - Integrated circuit(s) cards with contacts - Part 6: Interindustry data elements".
- [12] 3GPP TS 25.101: "UE Radio Transmission and Reception (FDD)".
- [13] 3GPP TS 23.228: "IP Multimedia Subsystem (IMS); Stage 2".
- [14] 3GPP TS 33.203: "3G security; Access security for IP-based services".
- [15] 3GPP TS 24.228: "Signalling flows for the IP multimedia call control based on SIP and SDP; Stage 3".
- [16] IETF RFC 3261: "SIP: Session Initiation Protocol".
- [17] 3GPP TS 23.038: "Alphabets and language-specific information".
- [18] ISO 639 (1988): "Code for the representation of names of languages".
- [19] 3GPP TS 51.011: "Specification of the Subscriber Identity Module - Mobile Equipment (SIM-ME) interface".
- [20] ISO/IEC 8825(1990): "Information technology - Open Systems Interconnection - Specification of Basic Encoding Rules for Abstract Syntax Notation One (ASN.1)" Second Edition.
- [21] 3GPP TS 22.101: "Service aspects; Service principles".
- [22] ETSI TS 102 223: "Smart cards; Card Application Toolkit (CAT)".

[23] ETSI TS 101 220: "Smart cards; ETSI numbering system for telecommunication application providers".

[\[XX\] IETF RFC 2486: "The Network Access Identifier"](#)

3.3 Abbreviations

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

3GPP	3 rd Generation Partnership Project
AC	Access Condition
ADF	Application Dedicated File
AID	Application IDentifier
AK	Anonymity Key
AKA	Authentication and Key Agreement
ALW	ALWays
AMF	Authentication Management Field
ASN.1	Abstract Syntax Notation One
AuC	Authentication Centre
AUTN	AUthentication TokeN
BER-TLV	Basic Encoding Rule - TLV
CK	Cipher Key
DF	Dedicated File
EF	Elementary File
FFS	For Further Study
HE	Home Environment
HN	Home Network
ICC	Integrated Circuit Card
ID	IDentifier
IK	Integrity Key
IM	IP Multimedia
IMPI	IM Private Identity
IMPU	IM Public identity
IMS	IP Multimedia Subsystem
ISIM	IM Services Identity Module
K	long-term secret Key shared between the ISIM and the AuC
KSI	Key Set Identifier
LI	Language Indication
LSB	Least Significant Bit
MAC	Message Authentication Code
MF	Master File
MSB	Most Significant Bit
NAI	Network Access Identifier
NEV	NEVer
PIN	Personal Identification Number
PL	Preferred Languages
PS_DO	PIN Status Data Object
RAND	RANdOm challenge
RES	user RESponse
RFU	Reserved for Future Use
RST	ReSeT
SDP	Session Description Protocol
SFI	Short EF Identifier
SIP	Session Initiation Protocol
SQN	SeQuence Number
SW	Status Word
TLV	Tag Length Value
UE	User Equipment
XRES	eXpected user RESponse

4.2.2 EF_{IMPI} (IMS private user identity~~identifier~~)

This EF contains the private user identity~~SIP Identity (SIP URI)~~ of the user.

Identifier: '6F02'		Structure: transparent		Mandatory
SFI: '02'				
File size: X bytes		Update activity: low		
Access Conditions:				
READ		PIN		
UPDATE		ADM		
DEACTIVATE		ADM		
ACTIVATE		ADM		
Bytes	Description	M/O	Length	
1 to X	<u>URNAI</u> TLV data object	M	X bytes	

- NAIURI

Contents:

- Private user identity ~~SIP URI~~ of the-user.

Coding:

- For contents and coding of URI-NAI TLV data object values see IETF RFC ~~3261-2486~~ [XX+6]. The tag value of the NAIURI TLV data object shall be '80'.

4.2.3 EF_{DOMAIN} (Home Network Domain Name~~SIP domain URI~~)

This EF contains the ~~SIP entry point in the~~ home operator's network domain name, ~~if different from the host part of the private SIP URI of the user from file EF_{IMPI}.~~

Identifier: '6F03'		Structure: transparent		Mandatory
SFI: '05'				
File size: X bytes		Update activity: low		
Access Conditions:				
READ		PIN		
UPDATE		ADM		
DEACTIVATE		ADM		
ACTIVATE		ADM		
Bytes	Description	M/O	Length	
1 to X	URI TLV data object	M	X bytes	

- URI

Contents:

- Home Network Domain Name~~Request URI~~.

Coding:

- For contents and coding of URI TLV data object values see IETF RFC 3261 [16]. The tag value of the URI TLV data object shall be '80'.

File Identification	Description	Value
'6F08'	Ciphering and Integrity Keys for IMS	'07FF...FF'
'6F02'	IMS private user identity identifier	'8000FF...FF'
'6F03'	SIP domain URI Home Network Domain Name	'8000FF...FF'
'6F04'	IMS public Identifier of user identity	'8000FF...FF'
'6FAD'	Administrative Data	Operator dependant
'6F06'	Access Rule Reference	Card issuer/operator dependant

Annex D (informative): List of SFI Values

This annex lists SFI values assigned in the present document.

D.1 List of SFI Values at the ISIM ADF Level

File Identification	SFI	Description
'6F08'	'01'	Ciphering and Integrity Keys for IMS
'6F02'	'02'	IMS private user identity identifier
'6F03'	'05'	Home Network Domain Name SIP domain URI
'6F04'	'04'	IMS public identifier of user identity
'6FAD'	'03'	Administrative Data
'6F06'	'06'	Access Rule Reference

All other SFI values are reserved for future use.