

Source: SA WG3 (Security)

Title: CR to 33.108: CR offering alignment to ETSI TS 101 671 (Rel-6)

Document for: Approval

Agenda Item: 7.3.3

SA Doc number	Spec	CR	Rev	Phase	Subject	Cat	Version-Current	SA WG3 Doc number	Workitem
SP-040407	33.108	048	-	Rel-6	CR offering alignment to ETSI TS 101 671	F	6.5.0	S3-040311	SEC1-LI

CR-Form-v7
CHANGE REQUEST
33.108 CR 048 # rev - # Current version: 6.5.0

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

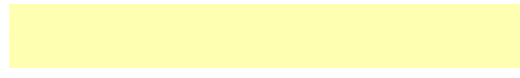
Title:	# CR offering alignment to ETSI TS 101 671				
Source:	# SA WG3 (LI Group)				
Work item code:	# SEC1-LI	Date:	# 15-04-2004		
Category:	# F	Release:	# Rel-6		
	Use <u>one</u> of the following categories:		Use <u>one</u> of the following releases:		
	F (correction)		2 (GSM Phase 2)		
	A (corresponds to a correction in an earlier release)		R96 (Release 1996)		
	B (addition of feature),		R97 (Release 1997)		
	C (functional modification of feature)		R98 (Release 1998)		
	D (editorial modification)		R99 (Release 1999)		
	Detailed explanations of the above categories can be found in 3GPP TR 21.900 .		Rel-4 (Release 4)		
			Rel-5 (Release 5)		
			Rel-6 (Release 6)		

Reason for change:	# This CR mirrors latest CR to ETSI TS 101 671v2.8.1: <ul style="list-style-type: none"> CR064r2 (05ltd038r2) on Editorial corrections to CS domain (annex A.3.2.1). Respective corrections should be made to subclause 5.2.2.1 of 33.108. CR066r2 (05ltd040r2) on Field separator in subaddress. Respective corrections should be made to annex J.2.3.2 of 33.108. Note that certain misalignment between annex J.2.3.2 in 33.108 and annex E.3.2 in 101 671 still remains. However, that is a topic for yet another CR. Besides, currently 3GPP ASN.1 module imports parameters from ETSI module version3. However, recently ETSI module version was raised to version5. That change should be reflected in annex B.3 and B.3a.
Summary of change:	# Aligning 3GPP TS 33.108v6.6.0 with ETSI TS 101 671v2.9.1
Consequences if not approved:	# Misalignment between harmonized 3GPP and ETSI LI specs.

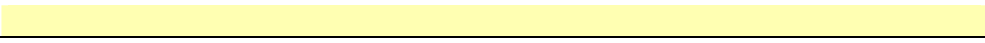
Clauses affected:	# 5.2.2.1; B.3; B.3a; J.2.3.2.				
Other specs	# <table border="1" style="display: inline-table; vertical-align: middle;"> <tr> <td style="padding: 2px;">Y</td> <td style="padding: 2px;">N</td> </tr> <tr> <td style="padding: 2px;"><input type="checkbox"/></td> <td style="padding: 2px;"><input checked="" type="checkbox"/></td> </tr> </table> Other core specifications #	Y	N	<input type="checkbox"/>	<input checked="" type="checkbox"/>
Y	N				
<input type="checkbox"/>	<input checked="" type="checkbox"/>				

affected:

<input checked="" type="checkbox"/>	Test specifications
<input checked="" type="checkbox"/>	O&M Specifications



Other comments: ☼



5.2.2.1 Control Information for HI2

The main purpose of this information is the unique identification of records related to a target identity, including their unique mapping to the links carrying the Content of Communication. In general, parameters of this category are mandatory, i.e. they have to be provided in any record.

The following items are identified (in brackets: ASN.1 name and reference to the ASN.1 definition or clause B.3a):

- 1) Record type (*IRIContent*, see clause B.3a)
IRI-BEGIN, IRI-CONTINUE, IRI-END, IRI-REPORT-record types.
- 2) Version indication (*iRIversion*, see clause B.3a)
Identification of the particular version of the HI2 interface specification.
- 3) Communication Identifier (*CommunicationIdentifier*, see clauses 5.1.2 and B.3a).
- 4) Lawful Interception Identifier (*LawfulInterceptionIdentifier*, see clauses 5.1.1 and B.3a).
- 5) Date & time (*TimeStamp*, see clause B.3a)
Date & time of record trigger condition.
The parameter shall have the capability to indicate whether the time information is given as Local time without time zone, ~~GMT with time zone~~, or as UTC. Normally, the operator (NO/AN/SP) shall define these options.
- 6) CC Link Identifier (*CC-Link-Identifier*, see clause 5.1.3 for definition and clause B.3a for ASN.1 definition).

Table 5.3 summarizes the items of HI2 control information. It is mandatory information, except the CID - it may be omitted for non-call related IRI records - and the CCLID. Their format and coding definition is LI specific, i.e. not based on other signalling standards.

Table 5.3: Parameters for LI control information in IRI records (HI2 interface port)

IRI parameters: LI control information	
IRI parameter name	ASN.1 name (used in annex B)
Type of record	IRIContent
Version indication	iRIversion
Lawful Interception Identifier (LIID)	LawfulInterceptionIdentifier
Communication Identifier (CID) - Communication Identity Number (CIN) - Network Identifier (NID)	CommunicationIdentifier
Date & time	TimeStamp
CC Link Identifier (CCLID) (only used in case of option B)	CC-Link-Identifier

*** Next Modification ***

B.3 Intercept related information (HI2)

Declaration of ROSE operation umts-sending-of-IRI is ROSE delivery mechanism specific. When using FTP delivery mechanism, data UmtsIRIsContent must be considered.

ASN1 description of IRI (HI2 interface)

```
UmtsHI2Operations {itu-t(0) identified-organization(4) etsi(0) securityDomain(2) lawfulIntercept(2)
threeGPP(4) hi2(1) r6(6) version-3(3)}
```

```
DEFINITIONS IMPLICIT TAGS ::=
```

```
BEGIN
```

```
IMPORTS
```

```
OPERATION,
ERROR
```

```
FROM Remote-Operations-Information-Objects
{joint-iso-itu-t(2) remote-operations(4) informationObjects(5) version1(0)}
```

```
LawfulInterceptionIdentifier,
TimeStamp,
Network-Identifier,
National-Parameters,
DataNodeAddress,
IPAddress,
IP-value,
X25Address
```

```
FROM HI2Operations
{itu-t(0) identified-organization(4) etsi(0) securityDomain(2)
lawfulIntercept(2) hi2(1) version53(53)}; -- Imported from TS 101 671 Edition 3
```

***** Next Modification *****

B.3a Interception related information (HI2 CS)

For North America the use of J-STD-25 A[23] is recommended.

Declaration of ROSE operation sending-of-IRI is ROSE delivery mechanism specific. When using FTP delivery mechanism, data IRI-Content must be considered.

ASN1 description of IRI (HI2 CS interface)

```
UmtsCS-HI2Operations
{ itu-t (0) identified-organization (4) etsi (0) securityDomain (2) lawfulIntercept (2) threeGPP(4)
hi2CS (3) version-1 (1)}
```

DEFINITIONS IMPLICIT TAGS ::=

BEGIN

```
IMPORTS OPERATION,
  ERROR
  FROM Remote-Operations-Information-Objects
  {joint-iso-itu-t (2) remote-operations(4) informationObjects(5) version1(0)}

  LawfulInterceptionIdentifier,
  TimeStamp,
  Intercepted-Call-State,
  PartyInformation,
  CallContentLinkCharacteristics,
  CommunicationIdentifier,
  CC-Link-Identifier,
  National-Parameters

  FROM HI2Operations
  {itu-t(0) identified-organization(4) etsi(0) securityDomain(2)
  lawfulIntercept(2) hi2(1) version53(53)} -- Imported from Version 3 of TS 101 671 ASN.1

  Location,
  SMS-report

  FROM UmtsHI2Operations
  {itu-t(0) identified-organization(4) etsi(0) securityDomain(2)
  lawfulIntercept(2) threeGPP(4) hi2(1) r6(6) version-3(3)};

-- Object Identifier Definitions

-- Security DomainId
lawfulInterceptDomainId OBJECT IDENTIFIER ::= {itu-t(0) identified-organization(4) etsi(0)
securityDomain(2) lawfulIntercept(2)}

-- Security Subdomains
threeGPPSUBDomainId OBJECT IDENTIFIER ::= {lawfulInterceptDomainId threeGPP(4)}
hi2CSDomainId OBJECT IDENTIFIER ::= {threeGPPSUBDomainId hi2CS(3) version-1(1)}
```

*** Next Modification ***

J.2.3.2 Field order and layout

Fields shall be presented into the subaddress in the following order:

Table J.2.3: Fields in the Called Party Subaddress

Order	Field
1	Operator-ID
2	CIN
3	CCLID
4	National Parameters

Table J.2.4: Fields in the Calling Party Subaddress

Order	Field
1	Lawful Interception Identifier (LIID)
2	Direction
3	Service Octets

Apart from National Parameters, inclusion and format of which is determined by national regulations, Each field noted above shall be included, whether empty or not, and a field separator shall separate each field. Each of the Operator-ID, CIN, CCLID, LIID and Direction fields shall end by a field separator.

When sending entity does not have a valid value for either of Operator-ID, CIN, CCLID, LIID or Direction fields, then the field is considered empty and it shall be represented only by its field separator~~a field is empty, that shall be indicated by two consecutive field separators (including field separator from the previous field). There shall be a field separator after the final field, too.~~

Table J.2.4A: Example of how field separator should be used when field is empty

Bits								Octets
8	7	6	5	4	3	2	1	
Called party subaddress identifier								1
Length of called party subaddress contents								2
Type of subaddress = user specified, odd/even indicator								3
Operator-ID ②				Operator-ID ①				4
Operator-ID ④				Operator-ID ③				5
Field separator				Operator-ID ⑤				6
CCLID ①				Field separator				7
CCLID ③				CCLID ②				8
CCLID ⑤				CCLID ④				9
CCLID ⑦				CCLID ⑥				10
Field separator				CCLID ⑧				11
								12
								13
								14
								15
(see note)								16
								17
								18
								19
								20
								21
								22
								23
NOTE: The Octets after the final field (CCLID) of the Called Party Subaddress are reserved for national use, e.g. for authentication purposes.								

The Service Octets as available shall always be mapped into octets 19 to 23 of the Calling Party Subaddress, as appropriate. If one of the parameters TMR, BC or HLC is not available, the octet shall be filled with "FF" hex. If Mobile Teleservice Code is not available, octet 23 shall not be transmitted. If Mobile Teleservice Code and Mobile Bearer Service Code are not available, octets 22 and 23 shall not be transmitted.

Table J.2.5 represent called party subaddress and table J.2.6 calling party subaddress with the maximum length of the identifiers.

Table J.2.5: Called Party Subaddress

Bits							Octets
8	7	6	5	4	3	2	
Called party subaddress identifier							1
Length of called party subaddress contents							2
Type of subaddress = user specified, odd/even indicator							3
Operator-ID ②			Operator-ID ①				4
Operator-ID ④			Operator-ID ③				5
Field separator			Operator-ID ⑤				6
CIN ②			CIN ①				7
CIN ④			CIN ③				8
CIN ⑥			CIN ⑤				9
CIN ⑧			CIN ⑦				10
CCLID ①			Field separator				11
CCLID ③			CCLID ②				12
CCLID ⑤			CCLID ④				13
CCLID ⑦			CCLID ⑥				14
Field separator			CCLID ⑧				15
see note							16
							17
							18
							19
							20
							21
							22
							23
NOTE: The Octets after the final field (CCLID) of the Called Party Subaddress are reserved for national use, e.g. for authentication purposes.							

Table J.2.6: Calling Party Subaddress

Bits							Octets
8	7	6	5	4	3	2	
Calling party subaddress identifier							1
Length of calling party subaddress contents							2
Type of subaddress = user specified, odd/even indicator according to the amount of BCD-digits							3
LIID ②			LIID ①			4	
LIID ④			LIID ③			5	
LIID ⑥			LIID ⑤			6	
LIID ⑧			LIID ⑦			7	
LIID ①⑩			LIID ⑨			8	
LIID ①②			LIID ①①			9	
LIID ①④			LIID ①③			10	
LIID ①⑥			LIID ①⑤			11	
LIID ①⑧			LIID ①⑦			12	
LIID ②⑩			LIID ②⑨			13	
LIID ②②			LIID ②①			14	
LIID ②④			LIID ②③			15	
Field separator			LIID ②⑤			16	
Field separator			Direction			17	
spare			spare			18	
ITU-T Recommendation Q.763 [32] TMR (see note 1)							19
ITU-T Recommendation Q.931 BC [33] octet 3 (see note 2)							20
ITU-T Recommendation Q.931 HLC [33] octet 4 (see note 3)							21
Mobile Bearer Service Code (see note 4)							22
Mobile Teleservice Code (see note 5)							23
NOTE 1: If available, the Transmission Medium Requirement according to EN 300 356 [29]. If not available, the value is "FF" hex.							
NOTE 2: If available, only octet 3 of the Bearer Capability I.E. according to EN 300 403 [30] If not available, the value is "FF" hex.							
NOTE 3: If available, only octet 4 of the High Layer Compatibility I.E. according to EN 300 403 [30]. If not available, the value is "FF" hex.							
NOTE 4: If available, the Mobile Bearer Service Code according to ETS 300 974 [34], clause 14.7.10. If not available, the octets 22 and 23 shall not be transmitted.							
NOTE 5: If available, the Mobile Teleservice Code according to ETS 300 974 [34], clause 14.7.9. If not available, the octet 23 shall not be transmitted.							