

CHANGE REQUEST

⌘ **33.234 CR CRNum** ⌘ 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

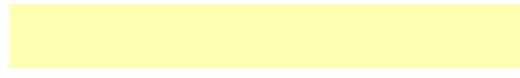
Title:	⌘ Requirement on keeping WLAN accessing keys independent from 3G accessing keys stored in USIM		
Source:	⌘ Nokia		
Work item code:	⌘ WLAN-3G interworking security Date: ⌘ 14/04/2004		
Category:	<table style="width: 100%; border: none;"> <tr> <td style="width: 50%; vertical-align: top;"> ⌘ F Use <u>one</u> of the following categories: 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. </td> <td style="width: 50%; vertical-align: top;"> Release: ⌘ Rel-6 Use <u>one</u> of the following releases: 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) </td> </tr> </table>	⌘ F Use <u>one</u> of the following categories: 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 .	Release: ⌘ Rel-6 Use <u>one</u> of the following releases: 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)
⌘ F Use <u>one</u> of the following categories: 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 .	Release: ⌘ Rel-6 Use <u>one</u> of the following releases: 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:	⌘ In SA1's stage-1 specification 22.234, section 5.1.2 USIM and UICC, "Access via an I-WLAN shall be possible using earlier releases (than the current release) of the UICC or using a SIM. Access to services via an I-WLAN with a single UICC shall be possible." In SA2's architecture specification 23.234, section 5.1 Access Control, it states the requirement to the smart card as: " - Existing SIM and USIM shall be supported. - Authentication shall rely on (U)SIM based authentication mechanisms. - R6 USIM may include new functionality if necessary e.g. in order to improve privacy." With such requirements, the WLAN specific parameters such as CK and IK are not possible to be stored in UICC (clearly they should not overwrite the corresponding parameters for 2G/3G RAN accessing).
Summary of change:	⌘ A general description is added to cover all cases specified in section 61.
Consequences if not approved:	⌘ WLAN accessing would cause UE losing keys for 3G RAN accessing and always initiate a full authentication because the key set reads out from smart card doesn't work.

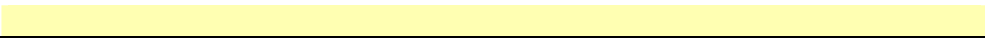
Clauses affected:	⌘ 6.1				
Other specs	<table style="display: inline-table; border: none;"> <tr> <td style="border: 1px solid black; padding: 2px;">Y</td> <td style="border: 1px solid black; padding: 2px;">N</td> </tr> <tr> <td style="border: 1px solid black; padding: 2px;"><input type="checkbox"/></td> <td style="border: 1px solid black; 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: ☼



*** START CHANGE***

6 Security mechanisms

6.1 Authentication and key agreement

The authentication and key agreement shall be dedicated for WLAN accessing only, thus the keys generated during authentication shall be stored in ME's volatile memory.

The WLAN UE and AAA server shall support both EAP AKA and EAP SIM methods. The procedure to select the method is:

- 1) The WLAN UE shall send an identity (whatever it is: permanent, pseudonym, etc.) to the AAA server. If this identity is an IMSI, it shall contain an indication of the EAP method to be used.
- 2) If the AAA server recognizes the EAP method but not the user identity (for example an obsolete pseudonym), it shall request a new identity using the EAP method indicated by the WLAN UE.
- 3) If the AAA server recognizes the user identity (and hence the EAP method), it shall fetch AVs from HSS. If they don't match the EAP method received (e.g. the EAP method received is EAP AKA and triplets are received from HSS), the user's subscription shall prevail (in the previous example EAP SIM shall be used).
- 4) If the user identity is not recognized, the AAA server shall decide which method to use (there may exist a default method ONLY in this situation). If this default method does not match user's subscription (e.g. EAP AKA for a SIM user), the WLAN UE shall respond a NACK to the AAA server and then the AAA shall try with the other EAP method until a recognised identity is received.

*** END OF CHANGE***