*CR-Form-v7.1*

# CHANGE REQUEST

⌘ **33.234 CR 052** ⌘ **rev 1** ⌘ Current version: **6.3.0** ⌘

*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:*** ⌘ | Replacing PDGW with PDG |
| ***Source:*** ⌘ | SA WG3 |

| | | | |
|---|---|---|---|
| ***Work item code:***⌘ | WLAN | ***Date:*** ⌘ | 24/02/2005 |

| | | | |
|---|---|---|---|
| ***Category:*** ⌘ | **D** | ***Release:*** ⌘ | Rel-6 |

*Use one 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.

*Use one of the following releases:*
*Ph2    (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)*
*Rel-7   (Release 7)*

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|---|---|
| ***Reason for change:*** ⌘ | The term Packet Date Gateway is sometimes abbreviated to PDGW in TS 33.234. However, the abbreviation is PDG in definitions and abbreviations clause. |
| ***Summary of change:***⌘ | Replace all PDGW with PDG to keep term conformance. |
| ***Consequences if not approved:*** ⌘ | Term abbreviations are not aligned in TS 33.234 |

| | |
|---|---|
| ***Clauses affected:*** ⌘ | 4.1.3, 4.1.4 and 4.2.6 |

| | Y | N | | |
|---|---|---|---|---|
| ***Other specs affected:*** ⌘ | | X | Other core specifications ⌘ | |
| | | X | Test specifications | |
| | | X | O&M Specifications | |

| | |
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| ***Other comments:*** ⌘ | |

## \*\*\* BEGIN OF FIRST CHANGE \*\*\*

### 4.1.3      Roaming WLAN Interworking Reference Model, access to VPLMN services

The home network is responsible for access control, but the authorization decision of tunnel establishment will be taken by the 3GPP proxy AAA based on own information plus information received from the home network. The VPLMN will take part in tunnel establishment (either the WAG or the ~~PDGW~~PDG).

## \*\*\* END OF FIRST CHANGE \*\*\*

## \*\*\* BEGIN OF SECOND CHANGE \*\*\*

### 4.1.4      Network elements

The list below describes the access control related functionality in the network elements of the 3GPP-WLAN interworking Reference Model:

-   The **WLAN-UE**, equipped with a UICC (or SIM card), for accessing the WLAN interworking service):

    -   May be capable of WLAN access only;

    -   May be capable of both WLAN and 3GPP System access;

    -   May be capable of simultaneous access to both WLAN and 3GPP systems;

    NOTE:     Definition of simultaneous access  is specified in TS 23.234 [13].

    -   May be a laptop computer or PDA with a WLAN card, UICC (or SIM card) card reader, and suitable software applications;

    -   May be functionally split over several physical devices, that communicate over local interfaces e.g. Bluetooth, Infrared or serial cable interface;

-   The **AAA proxy** represents a logical proxying functionality that may reside in any network between the WLAN and the 3GPP AAA Server. These AAA proxies are able to relay the AAA information between WLAN and the 3GPP AAA Server.
    The number of intermediate AAA proxies is not restricted by 3GPP specifications. The AAA proxy functionality can reside in a separate physical network node; it may reside in the 3GPP AAA server or any other physical network node;

-   The **3GPP AAA server** is located within the 3GPP network. The 3GPP AAA server:

    -   Retrieves authentication information from the HLR/HSS of the 3GPP subscriber's home 3GPP network;

    -   Authenticates the 3GPP subscriber based on the authentication information retrieved from HLR/HSS. The authentication signalling may pass through AAA proxies;

    -   Communicates authorisation information to the WLAN potentially via AAA proxies.

-   The **Packet Data Gateway (~~PDGW~~PDG)** enforces tunnel authorization and establishment with the information received from the 3GPP AAA via the Wm interface.

NOTE:    The **WLAN Access Gateway (WAG)** responsibilities for security issues are related to tunnel establishment but this decision is pending to be taken.

## *** END OF SECOND CHANGE ***

## *** BEGIN OF FINAL CHANGE ***

### 4.2.6    UE-initiated tunnelling

The security features that are expected in a tunnel from the UE to the VPLMN or HPLMN will be:
-   Data origin authentication and integrity must be supported.

-   Confidentiality must be supported.

-   The 3GPP network has the ultimate decision to allow tunnel establishment, based on:

    -   The level of trust in the WLAN AN and/or VPLMN

    -   The capabilities supported in the WLAN UE

    -   Whether the user is authorized or not to access the services (in the VPLMN or HPLMN) the tunnel will give access to.

-   The 3GPP network, in the setup process, decides the characteristics (encryption algorithms, protocols) under which the tunnel will be established.

NOTE:    Authorization for the tunnel establishment is decided by the 3GPP AAA and enforced by the ~~PDGW~~ PDG or WAG. Whether this authorization information is protected or not is FFS.

Working assumptions:
1.  The security mechanisms used in context with the IP tunnel in WLAN 3GPP IP Access are to be independent of the link layer security in WLAN Direct IP Access.

## *** END OF FINAL CHANGE ***