**3GPP TSG-RAN WG3#119 *R3-230740***

**Athens, Greece, 27th Feb - 3rd Mar 2023**

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| *CR-Form-v12.2* |
| **CHANGE REQUEST** |
|  |
|  | **38.401** | **CR** | **0280** | **rev** | - | **Current version:** | **17.3.0** |  |
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| *For* ***[HELP](http://www.3gpp.org/3G_Specs/CRs.htm%22%20%5Cl%20%22_blank)*** *on using this form: comprehensive instructions can be found at <http://www.3gpp.org/Change-Requests>.* |
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| ***Proposed change affects:*** | UICC apps |  | ME |  | Radio Access Network | **X** | Core Network |  |

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| ***Title:***  | Correction to TS 38.401 on Broadcast session establishment |
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| ***Source to WG:*** | ZTE, Lenovo, CATT |
| ***Source to TSG:*** | R3 |
|  |  |
| ***Work item code:*** | NR\_MBS-Core |  | ***Date:*** | 2023-02-14 |
|  |  |  |  |  |
| ***Category:*** | F |  | ***Release:*** | Rel-17 |
|  | *Use one of the following categories:****F*** *(correction)****A*** *(mirror corresponding to a change in an earlier release)****B*** *(addition of feature),* ***C*** *(functional modification of feature)****D*** *(editorial modification)*Detailed explanations of the above categories canbe found in 3GPP [TR 21.900](http://www.3gpp.org/ftp/Specs/html-info/21900.htm). | *Use one of the following releases:Rel-8 (Release 8)Rel-9 (Release 9)Rel-10 (Release 10)Rel-11 (Release 11)…Rel-16 (Release 16)Rel-17 (Release 17)Rel-18 (Release 18)Rel-19 (Release 19)* |
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| ***Reason for change:*** | 1. Editorial change, a typo for "exemplified" is found.2. In the stage 3 NG-U tunnel setup for Broadcast session, no GTP-UL TEID info is provided from 5GC, and no alternative set of transportation info is optionally provided for Broadcast session. There is also no stage 2 agreements support.3. Wording in-consistency, e.g., gNB-DU instead of DU. |
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| ***Summary of change:*** | 1. Change "examplified" to "exemplified". Typo corrected.2. Remove the wording of "for NG-U unicast transport it provides an GTP UL TEID" and "and optionally an alternative set of transport information"3. Change "DU" to "gNB-DU".Impact assessment towards the previous version of the specification (same release):This CR has an isolated impact towards the previous version of the specification (same release).This CR only has an impact on the Broadcast MBS Session Setup function. |
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| ***Consequences if not approved:*** | 1. typo exists.2. In-consistency between specification, a feature that is not supported is written into the stage 2 specification.3. wording in-consistency. |
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| ***Clauses affected:*** | 8.15.1.1 |
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|  | **Y** | **N** |  |  |
| ***Other specs*** |  | **X** |  Other core specifications  | TS/TR ... CR ...  |
| ***affected:*** |  | **X** |  Test specifications | TS/TR ... CR ...  |
| ***(show related CRs)*** |  | **X** |  O&M Specifications | TS/TR ... CR ...  |
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| ***Other comments:*** |  |
|  |  |
| ***This CR's revision history:*** |  |

8.15.1.1 Broadcast MBS Session Setup

Figure 8.15.1.1-1 illustrates an exemplified interaction of NGAP, E1AP, F1AP and RRC protocol functions at Broadcast MBS Session Setup.

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**Figure 8.15.1.1-1: Broadcast MBS Session Setup**

1. The 5GC starts the broadcast session by sending the NGAP Broadcast Session Setup Request message to the gNB containing the TMGI, S-NSSAI, 5G QoS Profile, area information and transport information (for NG-U multicast transport it provides the IP multicast address and the IP source specific multicast address).

2/3. The gNB-CU-CP sets up the broadcast bearer context, providing NG-U transport information from the 5GC to the gNB-CU-UP and receiving from the gNB-CU-UP the NG-U GTP DL TEID in case NG-U unicast transport was selected and an F1-U GTP UL TEID per MRB.

4. In case of NG-U multicast transport, the gNB-CU-UP joins the NG-U multicast group.

5/6. The gNB-CU-CP establishes the Broadcast MBS Session Context at the gNB-DU, providing MRB configuration, other relevant session parameters and F1-U GTP UL TEID information, and receiving F1-U GTP DL TEID information.

7/8. The gNB-CU-CP triggers BC Bearer Context Modification Request towards the gNB-CU-UP to provide the F1-U GTP DL TEID information.

9. The gNB-DU configures broadcast resources and provides broadcast configuration information to the UEs by means of MCCH.

10. The gNB-CU CP successfully terminates the NGAP broadcast Session Setup procedure. In case the gNB has chosen NG-U unicast transport, NG-U GTP DL TEID information is provided to the 5GC.

11. The broadcast MBS media stream is provided to the UEs.

On NG-U, in case of location dependent broadcast MBS Sessions, multiple shared NG-U transport tunnels may need to be setup, one per Area Session ID served by the gNB.

In case of shared NG-U termination,

- the gNB-CU-UP may provide the gNB-CU-CP at E1 setup or configuration update about established shared NG-U terminations, indicated by one or several MBS Session IDs.

- at establishment of the BC bearer context in the gNB-CU-UP, the gNB-CU-CP may request the gNB-CU-UP to either apply the available MRB configuration of the shared NG-U termination, or to apply the MRB configuration requested by the gNB-CU-CP. The gNB-CU-UP provides the MRB configuration to the gNB-CU-CP if the MRB configuration requested by the gNB-CU-CP and the available MRB configuration of the shared NG-U termination are different.