**3GPP TSG-SA5 Meeting #154 *S5-241731rev1***

Changsha, China, 15 - 19 April 2024

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| *CR-Form-v12.1* | | | | | | | | |
| **CHANGE REQUEST** | | | | | | | | |
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|  | **79** | **CR** | **0003** | **rev** |  | **Current version:** |  |  |
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| *For* [***HE******LP***](http://www.3gpp.org/3G_Specs/CRs.htm#_blank)*on using this form: comprehensive instructions can be found at* [*http://www.3gpp.org/Change-Requests*](http://www.3gpp.org/Change-Requests)*.* | | | | | | | | |
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| ***Proposed change affects:*** | UICC apps |  | ME |  | Radio Access Network |  | Core Network | **x** |

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| ***Title:*** | Correction on MBS session release, activation and deactivation | | | | | | | | | |
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| ***Source to WG:*** | Huawei | | | | | | | | | |
| ***Source to TSG:*** | S5 | | | | | | | | | |
|  |  | | | | | | | | | |
| ***Work item code:*** |  | | | | |  | ***Date:*** | | | 2024-04-18 |
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| ***Category:*** |  |  | | | | | ***Release:*** | | | Rel-18 |
|  | *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 can be 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-15 (Release 15) Rel-16 (Release 16) Rel-17 (Release 17) Rel-18 (Release 18)* | |
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| ***Reason for change:*** | | 1. Figure 7.2.2.4-1 of TS 23.247 is for release of shared delivery towards RAN, and the description “MB-SMF decides to release an MBS Session which can happen on a request from the AF (directly or via the NEF/MBSF).” applies to clause 5.2.2.2.3 MBS session deletion. 2. MBS session activation and deactivation procedures are for multicast only based on TS 23.247 clause 7.2.5.1. | | | | | | | | |
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| ***Summary of change:*** | | 1. Modify the title and description of clause 5.2.2.2.7, to follow the figure. 2. Add “multicast only” to clause 5.2.2.2.8-5.2.2.2.9. 3. Solve some initial case issues. | | | | | | | | |
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| ***Consequences if not approved:*** | | Some misunderstandings and mistakes exist in the description of charging procedures. | | | | | | | | |
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| ***Clauses affected:*** | | 5.2.2.2.3, 5.2.2.2.7, 5.2.2.2.8, 5.2.2.2.9 | | | | | | | | |
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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 ... | | |
|  | |  | | | | | | | | |
| ***Other comments:*** | |  | | | | | | | | |
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| ***This CR's revision history:*** | |  | | | | | | | | |

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| **First change** |

##### 5.2.2.2.3 MBS session deletion

The following figure 5.2.2.2.3-1 describes charging procedures for MBS session deletion, based on TS 23.247 [9] figures 7.1.1.4-1 and 7.1.1.5-1.



Figure 5.2.2.2.3-1: MBS session deletion

Steps 1 to 7 per 3GPP TS 23.247 [9] Figure 7.1.1.4-1: MBS Session Deletion without PCC.

7ch-a. The MB-SMF sends Charging Data Request [Termination] to the CHF, for terminating the charging associated with MBS session, with the trigger "End of MBS session".

7ch-b. The CHF closes the CDR for MBS session.

7ch-c. The CHF acknowledges by sending Charging Data Response [Termination] to the MB-SMF

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| **Next change** |

##### 5.2.2.2.7 MBS session release for multicast

The following figure 5.2.2.2.7-1 describes the procedure when the shared delivery is released between NG-RAN and MB-UPF when the last UE leaves the multicast MBS session in the NG-RAN node. This figure is based on TS 23.247 [9] figure 7.2.2.4-1.



Figure 5.2.2.2.7-1: MBS session release for multicast

Steps 1 to 4 per 3GPP TS 23.247 [9] Figure 7.2.2.4-1: Release of shared delivery toward RAN node.

4ch-a. The MB-SMF sends Charging Data Request [Update] to the CHF, when the corresponding trigger is activated.

4ch-b. The CHF updates the CDR.

4ch-c. The CHF acknowledges by sending Charging Data Response [Update] to the MB-SMF.

Steps 5 to 7 per 3GPP TS 23.247 [9] Figure 7.2.2.4-1: Release of shared delivery toward RAN node.

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| **Next change** |

##### 5.2.2.2.8 MBS session activation for multicast

The following figure 5.2.2.2.8-1 describes the charging procedure when there is an MBS Session activation procedure. The MBS Session Activation procedure is for multicast only and is used for activating the resource for MBS data at NG-RAN. The focus is to provide such information to CHF once the MBS Session state changes. This figure is based on TS 23.247 [9] figure 7.2.5.2-1.



Figure 5.2.2.2.8-1: MBS session activation

Steps 1 to 15 per 3GPP TS 23.247 [9] Figure 7.2.5.2-1: MBS Session Activation Procedure.

15ch-a. The MB-SMF sends Charging Data Request [Update] to the CHF when the corresponding trigger is armed.

15ch-b. The CHF updates the CDR.

15ch-c. The CHF acknowledges by sending Charging Data Response [Update] to the MB-SMF.

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| **Next change** |

##### 5.2.2.2.9 MBS session deactivation for multicast

The following figure 5.2.2.2.9-1 describes the charging procedure when there is an MBS Session Deactivation procedure. The MBS Session Deactivation procedure is for multicast only and is used for deactivating the resources for MBS data at NG-RAN. The focus is to provide such information to CHF once the MBS Session state changes. This figure is based on TS 23.247 [9] figure 7.2.5.3-1.



Figure 5.2.2.2.9-1: MBS session deactivation

Steps 1 to 9 per 3GPP TS 23.247 [9] Figure 7.2.5.3-1: MBS Session Deactivation Procedure.

9ch-a. The MB-SMF sends Charging Data Request [Update] to the CHF when the corresponding trigger is activated.

9ch-b. The CHF updates the CDR.

9ch-c. The CHF acknowledges by sending Charging Data Response [Update] to the MB-SMF.

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| **End of changes** |