**3GPP TSG-SA WG6 Meeting #60 S6-241104**

**Changsha, China 15th – 19th April 2024 (revision of S6-24xxxx)**

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| *CR-Form-v12.1* | | | | | | | | |
| **CHANGE REQUEST** | | | | | | | | |
|  | | | | | | | | |
|  |  | **CR** |  | **rev** | **-** | **Current version:** |  |  |
|  | | | | | | | | |
| *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)*.* | | | | | | | | |
|  | | | | | | | | |

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| ***Proposed change affects:*** | UICC apps |  | ME | **x** | Radio Access Network |  | Core Network | **x** |

|  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  | | | | | | | | | | |
| ***Title:*** | Including NID in the MBS session announcement | | | | | | | | | |
|  |  | | | | | | | | | |
| ***Source to WG:*** | Ericsson | | | | | | | | | |
| ***Source to TSG:*** | S6 | | | | | | | | | |
|  |  | | | | | | | | | |
| ***Work item code:*** | MCOver5MBS | | | | |  | ***Date:*** | | | 2024-04-08 |
|  |  | | | |  | |  | | |  |
| ***Category:*** | **F** |  | | | | | ***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-16 (Release 16) Rel-17 (Release 17) Rel-18 (Release 18) Rel-19 (Release 19)* | |
|  |  | | | | | | | | | |
| ***Reason for change:*** | | Clause 4.6.3 has introduced the use of non-public networks. However, the Network Identifier (NID) parameter is still missing from 3GPP TS 23.289. NID is introduced to identify and control the access to SNPN, together with the PLMN ID.  According to 3GPP TS 23.247, clause 6.11: “*When the MBS Session ID is Source Specific IP Multicast Address, the Service Announcement may include the PLMN ID of the PLMN and NID for an SNPN in which the service is delivered.*” | | | | | | | | |
|  | |  | | | | | | | | |
| ***Summary of change:*** | | Adding NID in the MBS session announcement in clause 7.3.2.1-1. | | | | | | | | |
|  | |  | | | | | | | | |
| ***Consequences if not approved:*** | | Supporting of NPN is not completed due to missing information | | | | | | | | |
|  | |  | | | | | | | | |
| ***Clauses affected:*** | | 7.3.2.1, 3.3 | | | | | | | | |
|  | |  | | | | | | | | |
|  | | **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:*** | |  | | | | | | | | |
|  | |  | | | | | | | | |
| ***This CR's revision history:*** | |  | | | | | | | | |

\* \* \* \* First change \* \* \* \*

#### 7.3.2.1 MBS session announcement

Table 7.3.2.1-1 provides the information elements during MBS session announcement, which are sent by the MC service server to the clients. The MBS session announcement includes information elements related to the announced MBS session. Optionally, it includes eMBMS related information elements, if eMBMS and 5G MBS co-exist.

Table 7.3.2.1-1: MBS session announcement

|  |  |  |
| --- | --- | --- |
| Information element | Status | Description |
| 5G MBS session information | M | Providing the MBS session related information if MC service server decides to use 5G MBS session to deliver MC service group communication data |
| **>**MBS session ID | M | The identity of the MBS session used to deliver MC service group communication data. It is either TMGI for broadcast MBS and multicast MBS sessions, or source specific IP multicast address for multicast MBS session |
| **>**MBS session mode | M | Indicate the service type of the MBS session, either a multicast MBS session or a broadcast MBS session |
| **>**MC service group ID | O | Indicate the MC service group ID associated to the MBS session |
| **>**MBS related SDP information | M | SDP related to application-level control signalling or media to be transmitted over the MBS session (e.g., codec, protocol ID, FEC information, IP address and ports) |
| **>**List of MBS Service Area information (see NOTE 5) | O | For the case of local MBS services, it indicates either multicast service area identifier(s) for multicast MBS session, or broadcast service area identifier(s) for broadcast MBS session |
| **>**MBS session announcement acknowledgement | O | Indicate if the MC service server requires an acknowledgement to the MBS session announcement |
| **>**Multicast MBS session related information (see NOTE 1) | O | Additional information to be used by the MC service client to join the multicast MBS session such as PLMN ID of the default PLMN service provider, NID in case of source specific IP multicast address, DNN, and SNSSAI of the PDU session associated with the multicast MBS session |
| **>** UE session join notification (see NOTE 2) | O | Indicate if the MC service server requires a notification from the MC service client once it has joined the multicast MBS session |
| **>**Monitoring state | O | Indicate if the MC service client is required to actively monitor the MBS session quality and report it to the MC service server. This is applicable for both multicast and broadcast eMBMS session. |
| **>**Frequency (see NOTE 3) | O | Identification of frequency associated with a broadcast MBS session, if multi carrier support is provided |
| **>**MBS Frequency Selection Area ID (MBS FSA ID) (see NOTE 3) | O | The frequency associated to a certain broadcast area, if multi carrier support is provided |
| eMBMS bearer information | O | Providing the 4G eMBMS bearer related information if MC service server decides to use 4G eMBMS additionally with 5G MBS session to deliver MC service group communication data |
| **>**TMGI (see NOTE 4) | M | TMGI information |
| **>**Alternative TMGI | O | A list of additional alternative TMGI may be included and used in roaming scenarios |
| **>**QCI | O | QCI information used by the ProSe UE-Network Relay to determine the ProSe Per-Packet Priority value to be applied for the multicast packets relayed to Remote UE over PC5 |
| **>**List of service area identifier | M | A list of service area identifier for the applicable eMBMS broadcast area |
| **>**Frequency | O | Identification of frequency if multi carrier support is provided |
| **>**eMBMS related SDP information | M | SDP with media and floor control information applicable to groups that can use this eMBMS bearer (e.g., codec, protocol id, FEC information) |
| **>**Monitoring state | O | Indicate if the MC service client is required to actively monitor the eMBMS bearer quality and report it to the MC service server |
| **>**ROHC information | O | Indicate the usage of ROHC over the eMBMS bearer and provide the parameters of the ROHC channel to signal to the ROHC decoder |
| NOTE 1: Such information may be pre-configured in the MC service UE, or provided in any other implementation specific way  NOTE 2: It is applicable for multicast MBS session  NOTE 3: It is applicable for broadcast MBS session  NOTE 4: TMGI for 4G eMBMS bearer can be the same or different with 5G MBS session ID.  NOTE 5: Details of MBS service area information is defined in 3GPP TS 23.247 [15]. | | |

\* \* \* \* Second change \* \* \* \*

## 3.3 Abbreviations

For the purposes of the present document, the abbreviations given in 3GPP TR 21.905 [1] and the following apply. An abbreviation defined in the present document takes precedence over the definition of the same abbreviation, if any, in 3GPP TR 21.905 [1].

NPN Non-Public Network

PNI-NPN Public Network Integrated Non-Public Network

SNPN Stand-alone Non-Public Network

NID Network Identifier

\* \* \* \* End of changes \* \* \* \*