**3GPP TSG-CT WG1 Meeting #132-eC1-215740v2**

**E-meeting, 11-15 October 2021**

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| *CR-Form-v12.0* | | | | | | | | |
| **CHANGE REQUEST** | | | | | | | | |
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|  | **24.501** | **CR** | **3620** | **rev** | **1** | **Current version:** | **17.4.1** |  |
|  | | | | | | | | |
| *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:*** | Support of NSAC and interworking with EPC | | | | | | | | | |
|  |  | | | | | | | | | |
| ***Source to WG:*** | ZTE, OPPO | | | | | | | | | |
| ***Source to TSG:*** | C1 | | | | | | | | | |
|  |  | | | | | | | | | |
| ***Work item code:*** | eNS\_Ph2 | | | | |  | ***Date:*** | | | 2021-9-30 |
|  |  | | | |  | |  | | |  |
| ***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 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)* | |
|  |  | | | | | | | | | |
| ***Reason for change:*** | | In TS 23.501 v17.2.0 subclause 5.15.11.5, it specifies that if EPS counting is required for a network slice, the SMF+PGW-C performs network slice admission control for the S-NSSAI(s) subject to NSAC to monitor and control the number of UEs per network slice and number of PDU sessions per network slice during the PDN connection establishment procedure.  Besides, there is one note as follows  “NOTE 1: As an implementation option, if the APN is mapped to more than one S-NSSAI and the first selected S-NSSAI is not available (e.g. either current number of UE registration reached maximum or current number of PDU sessions reached maximum), then based on the operator policy the PGW-C+SMF can try another mapped S-NSSAI for the PDN connection establishment procedure.” | | | | | | | | |
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| ***Summary of change:*** | | Add a new subclause to clarify support of NSAC and interworking with EPC as described above. | | | | | | | | |
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| ***Consequences if not approved:*** | | NSAC for interworking with EPC scenario is not supported. | | | | | | | | |
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| ***Clauses affected:*** | | 4.6.x(new), 4.6.x.1(new) | | | | | | | | |
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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:*** | |  | | | | | | | | |
|  | |  | | | | | | | | |
| ***This CR's revision history:*** | |  | | | | | | | | |

\* \* \* First Change \* \* \* \*

### 4.6.x Interworking with EPC

#### 4.6.x.1 Support of network slice admission control and interworking with EPC

If EPS counting is required for a network slice, the network performs network slice admission control for the S-NSSAI(s) subject to NSAC to monitor and control the number of UEs per network slice and number of PDU sessions per network slice during the PDN connection establishment procedure. If the maximum number of UEs on a network slice associated with an S-NSSAI or the maximum number of PDU sessions on a network slice associated with an S-NSSAI have already been reached, the network rejects the PDN connectivity request using ESM cause #26 "insufficient resources" as specifed in 3GPP TS 24.301 [15].

NOTE: If there are more than one S-NSSAI associated with the APN used in the PDN connectivity request and some of but not all associated S-NSSAIs are not available due to either maximum number of UEs reached or maximum number of PDU sessions reached, the network can use the associated S-NSSAI for which maximum number of UEs and maximum number of PDU sessions have not reached to avoid PDN connectivity request rejection.

\* \* \* End of Change \* \* \* \*