**3GPP TSG-RAN WG2 Meeting #106 *R2-1907983***

**Reno, USA,13th - 17th May 2019**

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| *CR-Form-v12.0* | | | | | | | | |
| **CHANGE REQUEST** | | | | | | | | |
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|  | **38.331** | **CR** | **1108** | **rev** | **-** | **Current version:** | **15.5.1** |  |
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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 | **X** | Radio Access Network |  | Core Network |  |

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| ***Title:*** | [105bis#10] -RAT handover from E-UTRA to NR | | | | | | | | | |
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| ***Source to WG:*** | Sharp | | | | | | | | | |
| ***Source to TSG:*** | R2 | | | | | | | | | |
|  |  | | | | | | | | | |
| ***Work item code:*** | NR\_newRAT-Core | | | | |  | ***Date:*** | | | 2019-05-02 |
|  |  | | | |  | |  | | |  |
| ***Category:*** | **F** |  | | | | | ***Release:*** | | | Rel-15 |
|  | *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-12 (Release 12)* *Rel-13 (Release 13) Rel-14 (Release 14) Rel-15 (Release 15) Rel-16 (Release 16)* | |
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| ***Reason for change:*** | | 1) It is unclear how the UE should handle source configuration in case of inter-system handover from E-UTRA/EPC to NR.  2) If delta comfiguration is applied for inter-RAT handover from E-UTRA/5GC to NR, there is an ambiguity what to do with timer/L1/MAC CG configurations.  3) SRB is established (not reconfigured) in case of inter-system handover from E-UTRA/EPC to NR. | | | | | | | | |
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| ***Summary of change:*** | | 1) add clarification to NOTE in section 5.4.2.3 that source RAT configuration is not considered when the UE applies the reconfiguration message of target RAT.  2) add a text to section 5.4.2.3 that apply default configurations for timer values, L1 parameter values and MAC CG configuration if *fullConfig* is not included.  3) remove “(SRB reconfiguration)” from section 5.3.4.11  **Impact Analysis**  Impacted 5G architecture options:  Standalone  Impacted functionality:  Inter-RAT handover  Inter-operability:  If the CR is implemented by UE, but not implemented by gNB, there is no interoperability issue. Because this CR is only impacts on UE side and does not impact on Uu interface.  If the CR is implemented by gNB, but not implemented by UE, there is no interoperability issue. Because this CR is only impacts on UE side and does not impact on Uu interface. | | | | | | | | |
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| ***Consequences if not approved:*** | | UE’s behaviour is kept unclear for inter-RAT handover. | | | | | | | | |
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| ***Clauses affected:*** | | 5.4.2.3, 5.3.4.11 | | | | | | | | |
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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)*** | |  |  | O&M Specifications | | | | TS/TR ... CR ... | | |
|  | |  | | | | | | | | |
| ***Other comments:*** | |  | | | | | | | | |
|  | |  | | | | | | | | |
| ***This CR's revision history:*** | |  | | | | | | | | |

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| Start of 1st Change |

#### 5.4.2.3 Reception of the *RRCReconfiguration* by the UE

The UE shall:

1> perform RRC reconfiguration procedure as specified in 5.3.5;

NOTE: If the UE is connected to 5GC of the source E-UTRA cell, the delta configuration for PDCP and SDAP can be used for intra-system inter-RAT handover. For other cases (i.e. inter-system handover), source RAT configuration is not considered when the UE applies the reconfiguration message of target RAT.

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| Start of 2nd Change |

#### 5.3.5.11 Full configuration

The UE shall:

1> release/ clear all current dedicated radio configurations except the MCG C-RNTI and the AS security configurations associated with the master key;

NOTE 1: Radio configuration is not just the resource configuration but includes other configurations like *MeasConfig*. The radio configuration does not include SRB configurations and DRB configurations as configured by *radioBearerConfig*.

1> if the *spCellConfig* in the *masterCellGroup* includes the *reconfigurationWithSync* (handover):

2> release/ clear all current common radio configurations;

2> use the default values specified in 9.2.3 for timers T310, T311 and constants N310, N311;

1> else (full configuration after re-establishment or during RRC resume):

2> if *ue-TimersAndConstants* are included in the *SIB1*:

3> use values for timers T301, T310, T311 and constants N310, N311, as included in *ue-TimersAndConstants* received in *SIB1*;

2> else:

3> use the default values specified in 9.2.3 for timers T310, T311 and constants N310, N311;

1> apply the default L1 parameter values as specified in corresponding physical layer specifications except for the parameters for which values are provided in *SIB1*;

1> apply the default MAC Cell Group configuration as specified in 9.2.2;

1> for each *srb-Identity* value included in the *srb-ToAddModList*:

2> apply the default SRB configuration defined in 9.2.1 for the corresponding SRB;

NOTE 2: This is to get the SRBs (SRB1 and SRB2 for handover and SRB2 for reconfiguration after re-establishment) to a known state from which the reconfiguration message can do further configuration.

1> for each *pdu-Session* that is part of the current UE configuration:

2> release the SDAP entity (clause 5.1.2 in TS 37.324 [24]);

2> release each DRB associated to the *pdu-Session* as specified in 5.3.5.6.4;

NOTE 3: This will retain the *pdu-Session* but remove the DRBs including *drb-identity* of these bearers from the current UE configuration. Setup of the DRBs within the AS is described in clause 5.3.5.6.5 using the new configuration. The *pdu-Session* acts as the anchor for associating the released and re-setup DRB. In the AS the DRB re-setup is equivalent with a new DRB setup (including new PDCP and logical channel configurations.

1> for each *pdu-Session* that is part of the current UE configuration but not added with same *pdu-Session* in the *drb-ToAddModList*:

2> indicate the release of the user plane resources for the *pdu-Session* to upper layers;