3GPP TSG-RAN WG2 #110-e R2-20xxxxx

Electronic Meeting, 1st – 12th June 2020

Agenda Item: 5.4.1

Source: Ericsson

Title: [AT110e][003][NR15] Misc RRC Corrections

Document for: Discussion, Decision

# 1 Introduction

This document is to kick off the following email discussion:

* [AT110e][003][NR15] Misc RRC Corrections (Ericsson)

Scope: Treat R2-2005000 (IPA), R2-2005001 (IPA), R2-2005641 (IPA), R2-2005642 (IPA), R2-2005643 (IPA), R2-2005644 (IPA), R2-2004853 (IPA), R2-2004854 (IPA), R2-2005233 (IPA), R2-2005234 (IPA), R2-2005322, R2-2004912, R2-2004913, R2-2005165, R2-2005166 (proponents are responsible to explain and drive)

 Part 1: Agree In-principe agreed (IPA) CRs. Others: Decision whether to make corrections or not, identify agreeable corrections. Deadline: June 4, 0700 UTC.

 Part 2: Others: For agreeable parts, continuation to agree CRs. Deadline: June 10, 0700 UTC

# 2 Discussion

## 2.1 In-principle agreed CRs

In this email discussion, the following in-principles agreed CRs need to be checked by companies. The general understanding is that these CRs can be agreed unless there are changes with respect to the CRs submitted in the last RAN2#109bis-e meeting or if there is some main concern.

[R2-2005000](file:///D%3A%5CDocuments%5C3GPP%5Ctsg_ran%5CWG2%5CTSGR2_110-e%5CDocs%5CR2-2005000.zip) Correction on PUCCH configuration Huawei, HiSilicon CR Rel-15 38.331 15.9.0 1567 2 F NR\_newRAT-Core R2-2004135

[R2-2005001](file:///D%3A%5CDocuments%5C3GPP%5Ctsg_ran%5CWG2%5CTSGR2_110-e%5CDocs%5CR2-2005001.zip) Correction on PUCCH configuration Huawei, HiSilicon CR Rel-16 38.331 16.0.0 1568 2 A NR\_newRAT-Core R2-2004136

[R2-2005641](file:///D%3A%5CDocuments%5C3GPP%5Ctsg_ran%5CWG2%5CTSGR2_110-e%5CDocs%5CR2-2005641.zip) Clarification on pdcp-Duplication at RRC Reconfiguration Samsung CR Rel-15 38.331 15.9.0 1534 2 F NR\_newRAT-Core R2-2004119

[R2-2005642](file:///D%3A%5CDocuments%5C3GPP%5Ctsg_ran%5CWG2%5CTSGR2_110-e%5CDocs%5CR2-2005642.zip) Clarification on pdcp-Duplication at RRC Reconfiguration Samsung CR Rel-16 38.331 16.0.0 1587 1 A NR\_newRAT-Core R2-2004140

[R2-2005643](file:///D%3A%5CDocuments%5C3GPP%5Ctsg_ran%5CWG2%5CTSGR2_110-e%5CDocs%5CR2-2005643.zip) Clarification on pdcp-Duplication at RRC Reconfiguration Samsung CR Rel-15 38.300 15.9.0 0221 1 F NR\_newRAT-Core R2-2004138

[R2-2005644](file:///D%3A%5CDocuments%5C3GPP%5Ctsg_ran%5CWG2%5CTSGR2_110-e%5CDocs%5CR2-2005644.zip) Clarification on pdcp-Duplication at RRC Reconfiguration Samsung CR Rel-16 38.300 16.1.0 0222 1 A NR\_newRAT-Core R2-2004139

[R2-2004853](file:///D%3A%5CDocuments%5C3GPP%5Ctsg_ran%5CWG2%5CTSGR2_110-e%5CDocs%5CR2-2004853.zip) Clarification for SIB6, SIB7 and SIB6 acquisition during a measurement gap Ericsson, NTT DOCOMO INC, Nokia, InterDigital CR Rel-15 38.331 15.9.0 1630 - F NR\_newRAT-Core

[R2-2004854](file:///D%3A%5CDocuments%5C3GPP%5Ctsg_ran%5CWG2%5CTSGR2_110-e%5CDocs%5CR2-2004854.zip) Clarification for SIB6, SIB7 and SIB6 acquisition during a measurement gap Ericsson, NTT DOCOMO INC, Nokia, InterDigital CR Rel-16 38.331 16.0.0 1631 - A NR\_newRAT-Core

[R2-2005233](file:///D%3A%5CDocuments%5C3GPP%5Ctsg_ran%5CWG2%5CTSGR2_110-e%5CDocs%5CR2-2005233.zip) Correction on the need for reconfiguration with sync in (NG)EN-DC, NR-DC and NE-DC Huawei, HiSilicon, Ericsson CR Rel-15 38.331 15.9.0 1571 2 F NR\_newRAT-Core R2-2004269

[R2-2005234](file:///D%3A%5CDocuments%5C3GPP%5Ctsg_ran%5CWG2%5CTSGR2_110-e%5CDocs%5CR2-2005234.zip) Correction on the need for reconfiguration with sync in (NG)EN-DC, NR-DC and NE-DC Huawei, HiSilicon, Ericsson CR Rel-16 38.331 16.0.0 1572 2 A NR\_newRAT-Core R2-2004270

**Question 1: Is companies understanding that the CRs above can be formally agreed?**

|  |  |
| --- | --- |
| Company | Comments |
| Qualcomm | We’re fine with the changes |
| Nokia | Okay |
| NTT DOCOMO | Yes, these can be agreed formally. |
| Ericsson | yes |
| MediaTek | Yes, but would like proponent companies to confirm whether there is additional change compare to the IPA CRs in last meeting. |
| Huawei, Hisilicon | yes |
| vivo | Yes |
| Intel | Yes |
| ZTE | Yes |

## 2.2 General RRC

Companies are requested to add their comments for each of the treated CRs of this email discussion in the boxes below (one for each CR to be treated).

### 2.2.1 Rapporteur CR

[R2-2005321](file:///D%3A%5CDocuments%5C3GPP%5Ctsg_ran%5CWG2%5CTSGR2_110-e%5CDocs%5CR2-2005321.zip) Miscellaneous non-controversial corrections Set VI Ericsson CR Rel-15 38.331 15.9.0 1667 - F NR\_newRAT-Core

[R2-2005322](file:///D%3A%5CDocuments%5C3GPP%5Ctsg_ran%5CWG2%5CTSGR2_110-e%5CDocs%5CR2-2005322.zip) Miscellaneous non-controversial corrections Set VI Ericsson CR Rel-16 38.331 16.0.0 1668 - A NR\_newRAT-Core

|  |  |
| --- | --- |
| Company | Comments |
| Qualcomm | We’re fine with the changes |
| Nokia | Okay |
| NTT DOCOMO | Agree |
| MediaTek | Agree the changes |
| Huawei, Hisilicon | ok |
| vivo | Agree |
| Intel | OK |
| ZTE | Agree |

### 2.2.2 Correction on SpCell

[R2-2004912](file:///D%3A%5CDocuments%5C3GPP%5Ctsg_ran%5CWG2%5CTSGR2_110-e%5CDocs%5CR2-2004912.zip) Correction on SpCell OPPO CR Rel-15 38.331 15.9.0 1635 - F NR\_newRAT-Core

[R2-2004913](file:///D%3A%5CDocuments%5C3GPP%5Ctsg_ran%5CWG2%5CTSGR2_110-e%5CDocs%5CR2-2004913.zip) Correction on SpCell OPPO CR Rel-16 38.331 16.0.0 1636 - A NR\_newRAT-Core

|  |  |
| --- | --- |
| Company | Comments |
| Qualcomm | The suggested changes are targeting 3 different IEs. We’re fine with the last change, however we carry a different opinion on the first 2 changes: * The "DownlinkConfigCommonSIB" and "UplinkConfigCommonSIB" fields are only relevant for the PCell and not the PSCell, as UE is not required to read the SIBs from the PSCell (if transmitted), therefore from UE perspective, the addition of “PSCell” is not relevant.

**We suggest replacing "SpCell (PCell of MCG or SCG)" by "PCell", in both locations.** |
| Nokia | Okay with Qualcomm suggestion. Also suggest to merge this to rapporteur CR |
| NTT DOCOMO | Agree with Qualcomm and Nokia that it should be merged into Rapporteur CR. |
| Ericsson | Agree with Qualcomm suggestion and to merge this in the rapporteur CR. |
| MediaTek | Same view as Qualcomm and also agreed merge this to rapporteur CR. |
| Huawei, Hisilicon | Fine with Qualcomm’s suggestions. |
| vivo | Agree with Qualcomm |
| Intel | Agree with Qualcomm technical comments. Also agree it can be part of rapporteur CR. |
| ZTE | Agree with Qualcomm, and also prefer to merge into Rapporteur CR. |

### 2.2.3 Handover terminology

[R2-2005165](file:///D%3A/Documents/3GPP/tsg_ran/WG2/RAN2/2005_R2_110-e/Docs/R2-2005165.zip) Correction to inter-system (intra-system) handover terminology Ericsson CR Rel-15 38.331 15.9.0 1653 - F NR\_newRAT-Core

[R2-2005166](file:///D%3A/Documents/3GPP/tsg_ran/WG2/RAN2/2005_R2_110-e/Docs/R2-2005166.zip) Correction to inter-system (intra-system) handover terminology Ericsson CR Rel-16 38.331 16.0.0 1654 - A NR\_newRAT-Core

|  |  |
| --- | --- |
| Company | Comments |
| Qualcomm | We agree with the intention, but some changes are causing more confusion as it’s not specified whether is handover is within 5GC or EPC handover. Proposed changes:Change-1: to include “within 5GC”Change-2 to include “within the same system”Change-4 to include “within the same system” |
| Nokia  | Disagree. It seems not needed to remove term of inter-system or intra-system handover, as 38.300 defines intra-system and inter-system handover clearly. It is not clear if this really makes the spec cleaner.Intra-system Handover: Handover that does not involve a CN change (EPC or 5GC).Inter-system Handover: Handover that involves a CN change (EPC or 5GC) |
| NTT DOCOMO | Agree on the intention, but share the same view as Qualcomm mentioned. Especially, the 1st and 2nd changes and the change to the field description of fullConfig are losing the original intention.  |
| Ericsson | Just for clarification, the intention of this CR is to have an alignement in the specification as the term inter-system and intra-system handover have not been used when needed. Therefore, would be good to be consistant all over the spec.Having said this, we understood Qualcomm intention and we are fine with the changes proposed. |
| MediaTek | Disagree. The CR seems not essential and we tend to agree with Nokia that it is fine to use the term “inter-system handover” and “intra-system handover” as there is clear definition in the stage 2 38.300.Change in chapter 5.4.3.4 is incorrect and removes important limitation. The current spec text limits that PDCP/SDAP can be reused only in NR -> LTE/5GC handover, because there is "intra-system" mentioned. If that text is removed, then it becomes unclear if such reuse is possible also in NR -> LTE/EPC handover. Then with the Qualcomm suggestion, the wording is change from “inter-RAT intra-system handover” to “inter-RAT handover within the same system”. It is lengthy and more difficult to read.We prefer to keep the term intra-system and inter-system as in current SPEC. |
| Huawei, Hisilicon | Tend to agree with Nokia and disagree with the changes. If there is some case which may have ambiguity, we should focus on the specific case and see if there is a problem. If there is no ambiguity and the motivation is only to align the terminologies, rapporteur should provide a rapporteur CR.  |
| vivo | Disagree. For better understanding it is useful to keep the description of inter-system and intra-system in current spec. |
| Intel | Disagree. These terms have been used for a while in spec and there is no real inter-operability issue. We prefer not to attempt this change now. |
| ZTE | Same view as Nokia. Prefer to keep the spec as it is.  |

# Conclusion

Based on the discussion in the previous sections we propose the following:

1. The IPA CR in R2-2005000, R2-2005001, R2-2005641, R2-2005642, R2-2005643, R2-2005644, R2-2004853, R2-2004854, R2-2005233, R2-2005234 are agreed.
2. The CRs in R2-2005321 and R2-2005322 are agreed (we can include further editorial changes from other CRs).
3. The CRs in R2-2004912 and R2-2004913 are agreed to be included in the Rapporteur’s CR with the following changes
	1. In the first two changes, replace “SpCell (PCell of MCG or SCG)” with “PCell”
	2. The third change is agreed as it is.
4. The CRs in R2-2005165 and R2-2005166 are not pursued.

# References

[1]