**3GPP TSG-RAN WG1 Meeting #104-e *R1-210zzzz***

**e-Meeting, January 25th – February 5th, 2021**

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| *CR-Form-v12.1* | | | | | | | | |
| **[DRAFT] CHANGE REQUEST** | | | | | | | | |
|  | | | | | | | | |
|  | **36.214** | **CR** | **NNNN** | **rev** | **N** | **Current version:** | **16.1.0** |  |
|  | | | | | | | | |
| *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 | **X** | Core Network |  |

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| ***Title:*** | Corrections to 36.214 for Reference Point for eNB Rx – Tx time difference | | | | | | | | | |
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| ***Source to WG:*** | CATT | | | | | | | | | |
| ***Source to TSG:*** |  | | | | | | | | | |
|  |  | | | | | | | | | |
| ***Work item code:*** | TEI16 | | | | |  | ***Date:*** | | | 2021-01-29 |
|  |  | | | |  | |  | | |  |
| ***Category:*** | **F** |  | | | | | ***Release:*** | | | Rel-16 |
|  | *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:*** | | RAN4 had discussed the reference point for timing related measurements triggered by RAN1 LS R4-1907905 (R1-1907869) and sent Response LS to RAN1(R4-1915801). However, the description of the reference point for eNB Rx – Tx time difference in secion 5.2.5 in 36.214 is not matched with the Response LS from RAN4(R4-1915801). | | | | | | | | |
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| ***Summary of change:*** | | Corrections to the reference point for eNB Rx – Tx time difference in section 5.2.5. And add one new reference in section 2. | | | | | | | | |
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| ***Consequences if not approved:*** | | The reference point for eNB Rx – Tx time difference described in 36.214 does’t match the Response LS from RAN4(R4-1915801). | | | | | | | | |
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| ***Clauses affected:*** | | 2, 5.2.5 | | | | | | | | |
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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 ... | | |
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| ***Other comments:*** | |  | | | | | | | | |
|  | |  | | | | | | | | |
| ***This CR's revision history:*** | |  | | | | | | | | |

# 2 References

================ Unchanged parts================

[18] 3GPP TS 38.133: "NR; Requirements for support of radio resource management".

[xx] 3GPP TS 37.105: "Active Antenna System (AAS) Base Station (BS) transmission and reception".

================ Unchanged parts================

### 5.2.5 eNB Rx – Tx time difference

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| **Definition** | The eNB Rx – Tx time difference is defined as T eNB-RX –TeNB-TX  Where:  T eNB-RX is the eNB received timing of uplink radio frame #i, defined by the first detected path in time.  The reference point for TeNB-RX shall be:  for non-AAS base station [10,TS 36.104]: the Rx antenna connector,  for OTA AAS base station [xx,TS 37.105]: the Rx antenna,  for Hybrid AAS base station [xx,TS 37.105]: the Rx Transceiver Array Boundary connector.  T eNB-TX is the eNB transmit timing of downlink radio frame #i.  The reference point for TeNB-TX shall be:  for non-AAS base station [10,TS 36.104]: the Tx antenna connector,  for OTA AAS base station [xx,TS 37.105]: the Tx antenna,  for Hybrid AAS base station [xx,TS 37.105]: the Tx Transceiver Array Boundary connector. |