**3GPP TSG-RAN WG2 Meeting #125 *R2-230xxxx***

**Athens, Greece, February 26th – March 1st, 2024**

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| *CR-Form-v12.2* | | | | | | | | |
| **CHANGE REQUEST** | | | | | | | | |
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|  | **38.306** | **CR** | **-** | **rev** | **-** | **Current version:** | **18.0.0** |  |
|  | | | | | | | | |
| *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 | **x** | Radio Access Network | **x** | Core Network |  |

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| ***Title:*** | Update to UE’s capabilities for Rel-18 XR | | | | | | | | | |
|  |  | | | | | | | | | |
| ***Source to WG:*** | Intel Corporation | | | | | | | | | |
| ***Source to TSG:*** | R2 | | | | | | | | | |
|  |  | | | | | | | | | |
| ***Work item code:*** | NR\_XR\_enh-Core | | | | |  | ***Date:*** | | | 2024-03-07 |
|  |  | | | |  | |  | | |  |
| ***Category:*** | **B** |  | | | | | ***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-15 (Release 15) Rel-16 (Release 16) Rel-17 (Release 17) Rel-18 (Release 18) Rel-19 (Release 19)* | |
|  |  | | | | | | | | | |
| ***Reason for change:*** | | Update to UE’s capabilities for Rel-18 XR | | | | | | | | |
|  | |  | | | | | | | | |
| ***Summary of change:*** | | 1. Update the field description of *disableCG-RetransmissionMonitoring-r18* UE capability to indicate that it requires the support of at least one of *configuredUL-GrantType1*, *configuredUL-GrantType2*, *configuredUL-GrantType1-v1650*, *configuredUL-GrantType2-v1650*, *configuredUL-GrantType1-r16*, *configuredUL-GrantType2-r16.* 2. Update the field name and description for *non-IntegerDRX-r18* UE Capability. 3. Update the field name and description for *additionalBS-Table-r18* UE Capability. 4. Update the field description for *ul-TrafficInfo-r18* to add the PSI identification. 5. Move to different sections the following UE capabilities:    1. To “MAC parameters” section: *enhancedDRX-r18, additionalBS-Table-r18, delayStatusReport-r18* and *disableCG-RetransmissionMonitoring-r18*.    2. To “PDCP Parameters” section: *pdu-SetDiscard-r18* and *psi-BasedDiscard-r18*. 6. Added DSR abbreviation in the list. | | | | | | | | |
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| ***Consequences if not approved:*** | | UE’s capabilities for Rel-18 XR features are not complete | | | | | | | | |
|  | |  | | | | | | | | |
| ***Clauses affected:*** | | 3.3, 4.2.2, 4.2.4, 4.2.6 | | | | | | | | |
|  | |  | | | | | | | | |
|  | | **Y** | **N** |  | | | |  | | |
| ***Other specs*** | | **x** |  | Other core specifications | | | | TS/TR 38.331 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:*** | |  | | | | | | | | |

1. ***Modified section***

## 3.3 Abbreviations

For the purposes of the present document, the abbreviations given in 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 TR 21.905 [1].

A-CSI Aperiodic-CSI

ATG Air To Ground

BAP Backhaul Adaptation Protocol

BC Band Combination

BPS Body Proximity Sensing

BT Bluetooth

CCS Cross Carrier Scheduling

CMR Channel Measurement Resource

CPAC Conditional PSCell Addition/Change

DAPS Dual Active Protocol Stack

DL Downlink

DSR Delay Status Report

EHC Ethernet Header Compression

FS Feature Set

FSPC Feature Set Per Component-carrier

GSO Geosynchronous Orbit

HSDN High Speed Dedicated Network

IAB-MT Integrated Access Backhaul Mobile Termination

IDC In-Device Coexistence

MAC Medium Access Control

MHI Mobility History Information

MBS Multicast/Broadcast Service

MCG Master Cell Group

MN Master Node

MO-SDT Mobile Originated Small Data Transmission

MRB MBS Radio Bearer

MR-DC Multi-Radio Dual Connectivity

MSD Maximum Sensitivity Degradation

MT-SDT Mobile Terminated Small Data Transmission

mTRP Multiple TRP

MUSIM Multi-Universal Subscriber Identity Module

NCJT Non-Coherent Joint Transmission

NCR Network Controlled Repeater

NCR-MT NCR Mobile Termination

NCSG Network Controlled Small Gap

NES Network Energy Savings

NGSO Non-Geosynchronous Orbit

NTN Non-Terrestrial Network

P-CSI Periodic CSI

PDCP Packet Data Convergence Protocol

PSI PDU Set Importance

QoE Quality of Experience

RLC Radio Link Control

RTT Round Trip Time

SCG Secondary Cell Group

SDAP Service Data Adaptation Protocol

SN Secondary Node

sTRP Serving TRP

TN Terrestrial Network

TRP Transmit/Receive Point

UDC Uplink Data Compression

UL Uplink

WLAN Wireless Local Area Network

XR eXtended Reality

1. ***Modified section***

### 4.2.2 General parameters

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Definitions for parameters | Per | M | FDD-TDD DIFF | **FR1-FR2**  DIFF |
| ***accessStratumRelease***  Indicates the access stratum release the UE supports as specified in TS 38.331 [9]. | UE | Yes | No | No |
| ***airToGroundNetwork-r18***  Indicates whether the UE supports air to ground network access. If the UE indicates this capability the UE shall support the following ATG essential features, e.g., acquiring ATG cell specific SIBxx and ATG cell specific P-Max. | UE | No | No | FR1 only |
| ***crossCarrierSchedulingConfigurationRelease-r17***  Indicates whether the UE supports using *crossCarrierSchedulingConfigRelease* to release the configurations configured by *crossCarrierSchedulingConfig*. | UE | No | No | No |
| ***delayBudgetReporting***  Indicates whether the UE supports delay budget reporting as specified in TS 38.331 [9]. | UE | No | No | No |
| ***dl-DedicatedMessageSegmentation-r16***  Indicates whether the UE supports reception of segmented DL RRC messages. | UE | No | No | No |
| ***drx-Preference-r16***  Indicates whether the UE supports providing its preference of a cell group on DRX parameters for power saving in RRC\_CONNECTED, as specified in TS 38.331 [9]. | UE | No | No | No |
| ***gNB-SideRTT-BasedPDC-r17***  Indicates whether the UE supports gNB-side RTT-based PDC, as specified in TS 38.300 [28]. A UE supporting this feature shall also support *rtt-BasedPDC-CSI-RS-ForTracking-r17* and/or *rtt-BasedPDC-PRS-r17*. | UE | No | No | No |
| ***hardSatelliteSwitchResyncNTN-r18***  Indicates whether UE supports hard satellite switch with re-sync, as specified in TS 38.331 [9].  A UE supporting this feature shall also indicate the support of *nonTerrestrialNetwork-r17*.  When UE supports this feature and does not support *softSatelliteSwitchResyncNTN-r18*, this UE is able to perform hard satellite switch with re-sync in a network supporting soft satellite switch with re-sync, as specified in TS 38.331 [9]. | UE | No | No | No |
| ***inactiveState***  Indicates whether the UE supports RRC\_INACTIVE as specified in TS 38.331 [9]. This capability is not applicable to NCR-MT. | UE | Yes | No | No |
| ***inactiveStateNTN-r17***  Indicates whether the UE supports RRC\_INACTIVE in NTN as specified in TS 38.331 [9]. It is mandated if the UE indicates the support of *nonTerrestrialNetwork-r17*. | UE | CY | No | No | |
| ***inactiveStatePO-Determination-r17***  Indicates whether the UE supports to use the same i\_s to determine PO in RRC\_INACTIVE state as in RRC\_IDLE state. | UE | No | No | No |
| ***inDeviceCoexInd-r16***  Indicates whether the UE supports reporting of affected NR carrier frequencies in IDC assistance information as specified in TS 38.331 [9]. | UE | No | No | No |
| ***inDeviceCoexIndAutonomousDenial-r18***  Indicates whether the UE supports IDC autonomous denial as specified in TS 38.331 [9]. A UE supporting this feature shall also support *inDeviceCoexInd-r16*. | UE | No | No | No |
| ***inDeviceCoexIndFDM-r18***  Indicates whether the UE supports reporting of affected NR carrier frequency ranges in IDC assistance information as specified in TS 38.331 [9]. A UE supporting this feature shall also support *inDeviceCoexInd-r16*. | UE | No | No | No |
| ***inDeviceCoexIndTDM-r18***  Indicates whether the UE supports reporting of IDC TDM assistance information as specified in TS 38.331 [9]. A UE supporting this feature shall also support *inDeviceCoexInd-r16*. | UE | No | No | No |
| ***maxBW-Preference-r16, maxBW-Preference-r17***  Indicates whether the UE supports providing its preference of a cell group on the maximum aggregated bandwidth for power saving in RRC\_CONNECTED, as specified in TS 38.331 [9]. | UE | No | No | Yes  (Incl FR2-2 DIFF) |
| ***maxCC-Preference-r16***  Indicates whether the UE supports providing its preference of a cell group on the maximum number of secondary component carriers for power saving in RRC\_CONNECTED, as specified in TS 38.331 [9]. | UE | No | No | No |
| ***maxMIMO-LayerPreference-r16, maxMIMO-LayerPreference-r17***  Indicates whether the UE supports providing its preference of a cell group on the maximum number of MIMO layers for power saving in RRC\_CONNECTED, as specified in TS 38.331 [9]. | UE | No | No | Yes  (Incl FR2-2 DIFF) |
| ***maxMRB-Add-r17***  Indicates the additional maximum number of MRBs that the UE supports for MBS multicast reception in RRC\_CONNECTED as specified in TS 38.331 [9].  For the UE indicating support of *multicastInactive-r18*, this capability is also applicable to multicast reception in RRC\_INACTIVE, as specified in TS 38.331 [9]. | UE | No | No | No |
| ***mcgRLF-RecoveryViaSCG-r16***  Indicates whether the UE supports recovery from MCG RLF via split SRB1 (if supported) and via SRB3 (if supported) as specified in TS 38.331[9]. | UE | No | No | No |
| ***minSchedulingOffsetPreference-r16***  Indicates whether the UE supports providing its preference on the minimum scheduling offset for cross-slot scheduling of the cell group for power saving in RRC\_CONNECTED, as specified in TS 38.331 [9]. | UE | No | No | No |
| ***mpsPriorityIndication-r16***  Indicates whether the UE supports *mpsPriorityIndication* on RRC release with redirect as defined in TS 38.331 [9]. | UE | No | No | No |
| ***mt-SDT-r18***  Indicates whether the UE supports initiating MT-SDT procedure via random access procedure with 4-step RA type and if UE supports *twoStepRACH-r16*, with 2-step RA type, in response to the reception of MT-SDT indication in paging message, as specified in TS 38.331 [9]. | UE | No | No | No |
| ***mt-SDT-NTN-r18***  Indicates whether the UE supports initiating MT-SDT procedure in NTN via random access procedure with 4-step RA type and if UE supports *twoStepRACH-r16* for NTN, with 2-step RA type, in response to the reception of MT-SDT indication in paging message, as specified in TS 38.331 [9]. | UE | No | No | No |
| ***multiRx-FR2-Preference-r18***  Indicates whether the UE supports providing multi-Rx operation preference (i.e. not supporting simultaneous reception with different QCL-typeD) for FR2, as defined in TS 38.331 [9]. | UE | No | No | FR2 only |
| ***musim-CapabilityRestriction-r18***  Indicates whether the UE supports providing MUSIM assistance information with temporary capability restriction and capability restriction indication (i.e., *musim-CapabilityRestrictionIndication*), as defined in TS 38.331 [9]. | UE | No | No | No |
| ***musim-GapPreference-r17***  Indicates whether the UE supports providing MUSIM assistance information with MUSIM gap preference and related MUSIM gap configuration, as defined in TS 38.331 [9]. UE supporting this feature supports 3 periodic gaps and 1 aperiodic gap. | UE | No | No | No |
| ***musim-GapPriorityPreference-r18***  Indicates whether the UE supports providing MUSIM assistance information with periodic MUSIM gap priority preference and related periodic MUSIM gap priority configuration, and its preference of keeping all collided MUSIM gaps, as defined in TS 38.331 [9]. A UE supporting this feature shall support *musim-GapPreference-r17.* | UE | No | No | No |
| ***musimLeaveConnected-r17***  Indicates whether the UE supports providing MUSIM assistance information with indication of leaving RRC\_CONNECTED state as defined in TS 38.331 [9]. | UE | No | No | No |
| ***nonTerrestrialNetwork-r17***  Indicates whether the UE supports NR NTN access. If the UE indicates this capability the UE shall support the following NTN essential features, e.g., timer extension in MAC/RLC/PDCP layers and RACH adaptation to handle long RTT, acquiring NTN specific SIB and more than one TAC per PLMN broadcast in one cell. | UE | No | No | No |
| ***ntn-ScenarioSupport-r17***  Indicates whether the UE supports the NTN features in GSO scenario or NGSO scenario. If a UE does not include this field but includes *nonTerrestrialNetwork-r17*, the UE supports the NTN features for both GSO and NGSO scenarios, and also supports mobility between GSO and NGSO scenarios. | UE | No | No | No |
| ***onDemandSIB-Connected-r16***  Indicates whether the UE supports the on-demand request procedure of SIB(s) or posSIB(s) while in RRC\_CONNECTED, as specified in TS 38.331 [9]. | UE | No | No | No |
| ***overheatingInd***  Indicates whether the UE supports overheating assistance information. | UE | No | No | No |
| ***pei-SubgroupingSupportBandList-r17***  Indicates whether the UE supports receiving paging early indication in DCI format 2\_7 as specified in TS 38.304 [21] for a list of frequency band. The UE shall support UEID based subgrouping for a frequency band if it indicates supporting of paging early indication reception for the frequency band. The set of OFDM symbols within a slot where UE can monitor the PEI PDCCH in Type 2A CSS is the same as the requirement for paging PDCCH in Type 2 CSS for IDLE and INACTIVE mode UEs. | UE | No | No | No |
| ***partialFR2-FallbackRX-Req***  Indicates whether the UE meets only a partial set of the UE minimum receiver requirements for the eligible FR2 fallback band combinations as defined in Clause 4.2 of TS 38.101-2 [3] and Clause 4.2 of TS 38.101-3 [4]. If not indicated, the UE shall meet all the UE minimum receiver requirements for all the FR2 fallback combinations in TS 38.101-2 [3] and TS 38.101-3 [4]. The UE shall support configuration of any of the FR2 fallback band combinations regardless of the presence or the absence of this field. | UE | No | No | No |
| ***ra-InsteadCG-SDT-r18***  Indicates whether the UE supports the selection of RACH resources instead of configured grant type 1 resource when triggering resume for MO-SDT or MT-SDT and next configured grant type 1 resource is too far, as specified in TS 38.331 [9].  A UE supporting this feature shall also indicate the support of *cg-SDT-r17,* or *mt-CG-SDT-r18.* | UE | No | No | No |
| ***ra-SDT-r17***  Indicates whether the UE supports initiating MO-SDT procedure (i.e. transmission of data and/or signalling over allowed radio bearers in RRC\_INACTIVE state) via Random Access procedure (i.e., RA-SDT) with 4-step RA type and if UE supports *twoStepRACH-r16,* with 2-step RA type, as specified in TS 38.331 [9]. | UE | No | No | No |
| ***ra-SDT-NTN-r17***  Indicates whether the UE supports initiating MO-SDT procedure (i.e. transmission of data and/or signalling over allowed radio bearers in RRC\_INACTIVE state) in NTN via Random Access procedure (i.e., RA-SDT) with 4-step RA type and if UE supports *twoStepRACH-r16* for NTN*,* with 2-step RA type, as specified in TS 38.331 [9]. A UE supporting this feature shall also indicate the support of *nonTerrestrialNetwork-r17*. | UE | No | No | No | |
| ***redirectAtResumeByNAS-r16***  Indicates whether the UE supports reception of *redirectedCarrierInfo* in an *RRCRelease* message in response to an *RRCResumeRequest* or *RRCResumeRequest1* which is triggered by the NAS layer, as specified in TS 38.331 [9]. | UE | No | No | No |
| ***reducedCP-Latency***  Indicates whether the UE supports reduced control plane latency as defined in TS 38.331 [9] | UE | No | No | No |
| ***referenceTimeProvision-r16***  Indicates whether the UE supports provision of referenceTimeInfo in *DLInformationTransfer* message and in SIB9 and reference time information preference indication via assistance information, as specified in TS 38.331 [9]. | UE | No | No | No |
| ***releasePreference-r16***  Indicates whether the UE supports providing its preference assistance information to transition out of RRC\_CONNECTED for power saving, as specified in TS 38.331 [9]. | UE | No | No | No |
| ***requirementTypeIndication-r18***  Indicates whether the UE supports network control of requirement applicability for UE supporting interBandMRDC-WithOverlapDL-Bands-r16. This field is only applicable to the UE indicating *interBandMRDC-WithOverlapDL-Bands-r16*.  The UE supports this feature shall also indicate support of *interBandMRDC-WithOverlapDL-Bands-r16*. | UE | No | No | FR1 only |
| ***resumeAfterSDT-Release-r18***  Indicates whether the UE supports immediate RRC connection resume procedure triggering after receiving *RRCRelease* message with a *resumeIndication* included during an ongoing SDT procedure, as specified in TS 38.331 [9].  The UE indicating support of this feature shall also support any of *ra-SDT-r17*, *ra-SDT-NTN-r17*, *cg-SDT-r17*, *mt-SDT-r18, mt-SDT-NTN-r18* or *mt-CG-SDT-r18*. | UE | No | No | No |
| ***resumeWithStoredMCG-SCells-r16***  Indicates whether the UE supports not deleting the stored MCG SCell configuration when initiating the resume procedure. | UE | No | No | No |
| ***resumeWithStoredSCG-r16***  Indicates whether the UE supports not deleting the stored SCG configuration when initiating resume. The UE which indicates support for *resumeWithStoredSCG-r16* shall also indicate support for *resumeWithSCG-Config-r16*. | UE | No | No | No |
| ***resumeWithSCG-Config-r16***  Indicates whether the UE supports (re-)configuration of an SCG during the resume procedure. | UE | No | No | No |
| ***sliceInfoforCellReselection-r17***  Indicates whether the UE supports slice-based cell reselection information in SIB and on RRC release for slice-based cell reselection in RRC \_IDLE and RRC INACTIVE as defined in TS 38.304 [21]. | UE | No | No | No |
| ***splitSRB-WithOneUL-Path***  Indicates whether the UE supports UL transmission via MCG path and DL reception via either MCG path or SCG path, as specified for the split SRB in TS 37.340 [7]. The UE shall not set the FDD/TDD specific fields for this capability (i.e. it shall not include this field in *UE-MRDC-CapabilityAddXDD-Mode*). | UE | No | No | No |
| ***softSatelliteSwitchResyncNTN-r18***  Indicates whether UE supports soft satellite switch with re-sync, as specified in TS 38.331 [9].  A UE supporting this feature shall also indicate support of *hardSatelliteSwitchResyncNTN-r18.* | UE | No | No | No |
| ***splitDRB-withUL-Both-MCG-SCG***  Indicates whether the UE supports UL transmission via both MCG path and SCG path for the split DRB as specified in TS 37.340 [7]. The UE shall not set the FDD/TDD specific fields for this capability (i.e. it shall not include this field in *UE-MRDC-CapabilityAddXDD-Mode*). | UE | Yes | No | No |
| ***srb3***  Indicates whether the UE supports SRB3 which is a direct SRB between the SN and the UE as specified in TS 37.340 [7]. The UE shall not set the FDD/TDD specific fields for this capability (i.e. it shall not include this field in *UE-MRDC-CapabilityAddXDD-Mode*). This field is not applied to NE-DC. | UE | Yes | No | No |
| ***srb-SDT-NTN-r17***  Indicates whether the UE supports the usage of signalling radio bearer SRB2 for MO-SDT (over RA-SDT or CG-SDT) or MT-SDT (over RA or CG-SDT) in NTN, as specified in TS 38.331 [9].  A UE supporting this feature shall also indicate support of *ra-SDT-NTN-r17*, *cg-SDT-r17*, *mt-SDT-NTN-r18* or *mt-CG-SDT-r18* in NTN bands. A UE supporting this feature shall also indicate the support of *nonTerrestrialNetwork-r17*. | UE | No | No | No | |
| ***srb-SDT-r17***  Indicates whether the UE supports the usage of signalling radio bearer SRB2 for MO-SDT (over RA-SDT or CG-SDT) or MT-SDT (over RA or CG-SDT), as specified in TS 38.331 [9].  A UE supporting this feature shall also indicate support of *ra-SDT-r17 cg-SDT-r17*, *mt-SDT-r18* or *mt-CG-SDT-r18*. | UE | No | No | No |
| ***ul-GapFR2-Pattern-r17***  Indicates FR2 UL gap pattern(s) supported by the UE for NR SA, for NR-DC without FR2-FR2 band combination, for NE-DC, and for (NG)EN-DC, if UE supports a band in FR2. The leading / leftmost bit (bit 0) corresponds to the FR2 UL gap pattern 0, the next bit corresponds to the FR2 UL gap pattern 1, as specified in TS 38.133 [5] and so on. The UE shall set at least one of the bits to 1 for FR2 UL gap pattern 1 and 3, if the UE indicates support for *ul-GapFR2-r17* in an FR2 band. | UE | CY | No | FR2 only |
| ***ul-RRC-Segmentation-r16***  Indicates whether the UE supports uplink RRC segmentation of *UECapabilityInformation* as specified in TS 38.331 [9]. | UE | No | No | No |
| ***ul-TrafficInfo-r18***  Indicates whether UE supports sending UE assistance information with UL traffic information such as jitter range, burst arrival time, data burst periodicity and, PDU Set and PSI identification as specified in TS 38.331 [9]. | UE | No | No | No |

1. ***Modified section***

### 4.2.4 PDCP Parameters

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| --- | --- | --- | --- |
| Definitions for parameters | Per | M | FDD-TDD DIFF |
| ***continueEHC-Context-r16***  Indicates that the UE supports EHC context continuation operation where the UE keeps the established EHC context(s) upon PDCP re-establishment, as specified in TS 38.323 [16]. | UE | No | No |
| ***continueROHC-Context***  Defines whether the UE supports ROHC context continuation operation where the UE does not reset the current ROHC context upon PDCP re-establishment, as specified in TS 38.323 [16]. | UE | No | No |
| ***ehc-r16***  Indicates that the UE supports Ethernet header compression and decompression using EHC protocol, as specified in TS 38.323 [16]. The UE indicating this capability and indicating support for at least one ROHC profile, shall support simultaneous configuration of EHC and ROHC on different DRBs/multicast MRBs. | UE | No | No |
| ***extendedDiscardTimer-r16***  Indicates whether the UE supports the additional values of PDCP discard timer. The supported additional values are 0.5ms, 1ms, 2ms, 4ms, 6ms and 8ms, as specified in TS 38.331 [9]. | UE | No | No |
| ***jointEHC-ROHC-Config-r16***  Indicates whether the UE supports simultaneous configuration of EHC and ROHC protocols for the same DRB/multicast MRB. | UE | No | No |
| ***maxNumberROHC-ContextSessions***  Defines the maximum number of ROHC header compression context sessions supported by the UE across all DRBs and multicast MRBs, excluding context sessions that leave all headers uncompressed. | UE | No | No |
| ***maxNumberEHC-Contexts-r16***  Defines the maximum number of Ethernet header compression contexts supported by the UE across all DRBs and multicast MRBs and across UE's EHC compressor and EHC decompressor. The indicated number defines the number of contexts in addition to CID = "all zeros" as specified in TS 38.323 [16]. | UE | No | No |
| ***outOfOrderDelivery***  Indicates whether UE supports out of order delivery of data to upper layers by PDCP. | UE | No | No |
| ***pdcp-DuplicationMCG-OrSCG-DRB***  Indicates whether the UE supports CA-based PDCP duplication over MCG or SCG DRB as specified in TS 38.323 [16]. | UE | No | No |
| ***pdcp-DuplicationMoreThanTwoRLC-r16***  Defines whether the UE supports PDCP duplication with more than two RLC entities as specified in TS 38.323 [16]. The UE supporting this feature supports secondary RLC entity(ies) activation and deactivation based on duplication RLC Activation/Deactivation MAC CE as specified in TS 38.321 [8]. A UE supporting this feature shall also support *pdcp-DuplicationMCG-OrSCG-DRB*, *pdcp-DuplicationSplitDRB*, *pdcp-DuplicationSplitSRB* and *pdcp-DuplicationSRB*. | UE | No | No |
| ***pdcp-DuplicationSplitDRB***  Indicates whether the UE supports PDCP duplication over split DRB as specified in TS 38.323 [16]. | UE | No | No |
| ***pdcp-DuplicationSplitSRB***  Indicates whether the UE supports PDCP duplication over split SRB1/2 as specified in TS 38.323 [16]. | UE | No | No |
| ***pdcp-DuplicationSRB***  Indicates whether the UE supports CA-based PDCP duplication over SRB1/2 and/or, if (NG)EN-DC is supported, SRB3 as specified in TS 38.323 [16]. | UE | No | No |
| ***pdu-SetDiscard-r18***  Indicates whether the UE supports PDU set based discard operation (i.e. *pdu-SetDiscard-r18* configuration, as specified in TS 38.331 [9]).  UE supporting *pdu-SetDiscard-r18* shall also support the ability to identify PDU sets for UL XR traffic. | UE | No | No |
| ***psi-BasedDiscard-r18***  Indicates whether the UEs supports PSI based discard (i.e. *discardTimerForLowImportance-r18* configuration, as specified in TS 38.331 [9]).  UE supporting *psi-BasedDiscard-r18* shall also support the ability to identify PDU sets and PSI for UL XR traffic. | UE | No | No |
| ***shortSN***  Indicates whether the UE supports 12 bit length of PDCP sequence number. | UE | Yes | No |
| ***supportedROHC-Profiles***  Defines which ROHC profiles from the list below are supported by the UE:  - 0x0000 ROHC No compression (RFC 5795)  - 0x0001 ROHC RTP/UDP/IP (RFC 3095, RFC 4815)  - 0x0002 ROHC UDP/IP (RFC 3095, RFC 4815)  - 0x0003 ROHC ESP/IP (RFC 3095, RFC 4815)  - 0x0004 ROHC IP (RFC 3843, RFC 4815)  - 0x0006 ROHC TCP/IP (RFC 6846)  - 0x0101 ROHC RTP/UDP/IP (RFC 5225)  - 0x0102 ROHC UDP/IP (RFC 5225)  - 0x0103 ROHC ESP/IP (RFC 5225)  - 0x0104 ROHC IP (RFC 5225)  A UE that supports one or more of the listed ROHC profiles shall support ROHC profile 0x0000 ROHC uncompressed (RFC 5795).  An IMS voice capable UE shall indicate support of ROHC profiles 0x0000, 0x0001, 0x0002 and be able to compress and decompress headers of PDCP SDUs at a PDCP SDU rate corresponding to supported IMS voice codecs. | UE | No | No |
| ***udc-r17***  Indicates whether the UE supports the uplink data compression operation as specified in TS 38.323 [16]. The capability signalling comprises of the following parameters:  - *standardDictionary-r17* indicates whether the UE supports UL data compression with SIP static dictionary as defined in TS 38.323 [16].  - *operatorDictionary-r17* indicates whether the UE supports UL data compression with operator defined dictionary. In this release, the UE can only support one operator defined dictionary. If the UE supports operator defined dictionary, the UE shall report *versionOfDictionary-r17* and *associatedPLMN-ID-r17* of the stored operator defined dictionary as defined in TS 38.331 [9]. This parameter is not required to be present if the UE is in VPLMN. The *associatedPLMN-ID-r17* is only associated to the operator defined dictionary which has no relationship with UE's HPLMN ID.  - *continueUDC-r17* indicates whether the UE supports continuation of uplink data compression protocol operation where the UE does not reset the buffer upon PDCP re-establishment, as specified in TS 38.323 [16].  - *supportOfBufferSize-r17* indicates which compression buffer size the UE supports as specified in TS 38.323 [16]. Value kbyte4 means the UE supports 4096 bytes for compression buffer per UDC DRB. Value kbyte8 means the UE supports 8192 bytes for compression buffer per UDC DRB.  A UE that supports the uplink data compression operation shall support 2048 bytes for compression buffer per UDC DRB and support up to 2 UDC DRBs. | UE | No | No |
| ***uplinkOnlyROHC-Profiles***  Indicates the ROHC profile(s) that are supported in uplink-only ROHC operation by the UE.  - 0x0006 ROHC TCP (RFC 6846)  A UE that supports uplink-only ROHC profile(s) shall support ROHC profile 0x0000 ROHC uncompressed (RFC 5795). | UE | No | No |

1. ***Modified section***

### 4.2.6 MAC parameters

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| Definitions for parameters | Per | M | FDD-TDD DIFF | FR1-FR2 DIFF |
| ***additionalBS-Table-r18***  Indicates whether the UE supports using the refined buffer size table for BSR and, if *delayStatusReport-r18* is supported, DSR, as specified in TS 38.321 [8] and TS 38.331 [9]. | UE | No | No | No |
| ***autonomousTransmission-r16***  Indicates whether the UE supports autonomous transmission of the MAC PDU generated for a deprioritized configured uplink grant as specified in TS 38.321 [8]. A UE supporting this feature shall also support *lch-priorityBasedPrioritization-r16*. | UE | No | No | No |
| ***directMCG-SCellActivation-r16, directMCG-SCellActivation-r17***  Indicates whether the UE supports direct NR MCG SCell activation, as specified in TS 38.321 [8], upon SCell addition, upon reconfiguration with sync of the MCG, as specified in TS 38.331 [9]. | UE | No | No | Yes (Incl FR2-2 DIFF) |
| ***delayStatusReport-r18***  Indicates whether the UE supports the delay status report of the buffered data as specified in TS 38.321 [8], TS 38.331 [9], TS 38.323 [16] and TS 38.322 [36]. | UE | No | No | No |
| ***directMCG-SCellActivationResume-r16, directMCG-SCellActivationResume-r17***  Indicates whether the UE supports direct NR MCG SCell activation, as specified in TS 38.321 [8], upon reception of an *RRCResume* message, as specified in TS 38.331 [9]. | UE | No | No | Yes (Incl FR2-2 DIFF) |
| ***directSCG-SCellActivation-r16, directSCG-SCellActivation-r17***  Indicates whether the UE supports direct NR SCG SCell activation, as specified in TS 38.321 [8], upon SCell addition and upon reconfiguration with sync of the SCG, both performed via an *RRCReconfiguration* message received via SRB3 or contained in an *RRC(Connection)Reconfiguration* message received via SRB1, as specified in TS 38.331 [9] and TS 36.331 [17].  A UE indicating support of *directSCG-SCellActivation-r16* shall indicate support of EN-DC or support of NGEN-DC as specified in TS 36.331 [17] or support of NR-DC as specified in TS 38.331 [9]. | UE | No | No | Yes (Incl FR2-2 DIFF) |
| ***directSCG-SCellActivationResume-r16, directSCG-SCellActivationResume-r17***  Indicates whether the UE supports direct NR SCG SCell activation, as specified in TS 38.321 [8]:  - upon reception of an *RRCReconfiguration* included in an *RRCConnectionResume* message, as specified in TS 38.331 [9] and TS 36.331 [17], if the UE indicates support of EN-DC or NGEN-DC, and support of *resumeWithSCG-Config-r16* as specified in TS 36.331 [17],  - upon reception of an *RRCReconfiguration* included in an *RRCResume* message, as specified in TS 38.331 [9], if the UE indicates support of NR-DC and of *resumeWithSCG-Config-r16* as specified in TS 38.331 [9].  A UE indicating support of *directSCG-SCellActivationResume-r16* shall indicate support of EN-DC or NGEN-DC and support of *resumeWithSCG-Config-r16* as specified in TS 36.331 [17] or indicate support of NR-DC and of *resumeWithSCG-Config-r16* as specified in TS 38.331 [9]. | UE | No | No | Yes (Incl FR2-2 DIFF) |
| ***disableCG-RetransmissionMonitoring-r18***  Indicates whether the UE supports disabling of waking-up to monitor possible grants for UL retransmissions of configured grants corresponding to a *ConfiguredGrantConfig* as specified in TS 38.321 [8] and TS 38.331 [9].  A UE supporting this feature shall also indicate support of at least one of *configuredUL-GrantType1*, *configuredUL-GrantType2*, *configuredUL-GrantType1-v1650*, *configuredUL-GrantType2-v1650*, *configuredUL-GrantType1-r16*, *configuredUL-GrantType2-r16*. | UE | No | No | No |
| ***drx-Adaptation-r16, drx-Adaptation-r17***  Indicates whether the UE supports DRX adaptation comprised of the following functional components:  - Configured *ps-Offset* for the detection of DCI format 2\_6 with CRC scrambling by *ps*-RNTI and reported *MinTimeGap* or *MinTimeGapFR2-2* before the start of *drx-onDurationTimer* of Long DRX  - Indication of UE whether or not to start *drx-onDurationTimer* for the next Long DRX cycle by detection of DCI format 2\_6  - Configured UE wakeup or not when DCI format 2\_6 is not detected at all monitoring occasions outside Active Time  - Configured periodic CSI report apart from L1-RSRP (*ps-TransmitOtherPeriodicCSI*) when impacted by DCI format 2\_6 that *drx-onDurationTimer* does not start for the next Long DRX cycle  - Configured periodic L1-RSRP report (*ps-TransmitPeriodicL1-RSRP*) when impacted by DCI format 2\_6 that *drx-onDurationTimer* does not start for the next Long DRX cycle  The capability signalling includes the minimum time gap between the end of the slot of last DCI format 2\_6 monitoring occasion and the beginning of the slot where the UE would start the *drx-onDurationTimer* of Long DRX for each SCS. The value *sl1* indicates 1 slot. The value *sl2* indicates 2 slots, and so on. Support of this feature is reported for licensed and unlicensed bands, respectively. When *drx-Adaptation-r16* is reported, either of *sharedSpectrumChAccess-r16* or *non-SharedSpectrumChAccess-r16* shall be reported, at least. When *drx-Adaptation-r17* is reported, either of *sharedSpectrumChAccess-r17* or *non-SharedSpectrumChAccess-r17* shall be reported, at least. | UE | No | No | Yes  (Incl FR2-2 DIFF) |
| ***enhancedSkipUplinkTxConfigured-r16***  Indicates whether the UE supports skipping UL transmission for a configured uplink grant only if no data is available for transmission and no UCI is multiplexed on the corresponding PUSCH of the uplink grant as specified in TS 38.321 [8]. | UE | No | Yes | No |
| ***enhancedSkipUplinkTxDynamic-r16***  Indicates whether the UE supports skipping UL transmission for an uplink grant addressed to a C-RNTI only if no data is available for transmission and no UCI is multiplexed on the corresponding PUSCH of the uplink grant as specified in TS 38.321 [8]. | UE | No | Yes | No |
| ***enhancedUuDRX-forSidelink-r17***  Indicates whether UE supports sidelink related Uu-DRX mechanisms for PDCCH monitoring. This field is only applicable if the UE supports *sl-TransmissionMode1-r16*. | UE | No | No | No |
| ***extendedDRX-CycleInactive-r17***  Indicates whether UE supports the extended DRX in RRC\_INACTIVE with values of 256, 512 and 1024 radio frames as specified in TS 38.331 [9]. The UE may indicate support for extended DRX in RRC\_INACTIVE only if it supports extended DRX in RRC\_IDLE. | UE | No | No | No |
| ***extendedDRX-CycleInactive-r18***  Indicates whether UE supports the extended DRX in RRC\_INACTIVE with values above 1024 radio frames as specified in TS 38.331 [9] and TS 38.304 [21]. The UE may indicate support of this capability only if it supports extended DRX in RRC\_IDLE. | UE | No | No | No |
| ***harq-FeedbackDisabled-r17***  Indicates whether the UE supports disabled HARQ feedback for downlink transmission. A UE supporting this feature shall also indicate the support of *nonTerrestrialNetwork-r17*. | UE | No | No | No |
| ***intraCG-Prioritization-r17***  Indicates whether the UE supports the HARQ process ID selection based on LCH priority as specified in TS 38.321 [8]. A UE supporting this feature shall also support *jointPrioritizationCG-Retx-Timer-r17*. | UE | No | No | No |
| ***jointPrioritizationCG-Retx-Timer-r17***  Indicates whether the UE supports simultaneous configuration of LCH based prioritization and *cg-RetransmissionTimer-r16* as specified in TS 38.321 [8]. A UE supporting this feature shall also support *lch-priorityBasedPrioritization-r16* and *configuredGrantWithReTx-r16*. | UE | No | No | No |
| ***lastTransmissionUL-r17***  Indicates whether the UE supports starting the *drx-HARQ-RTT-TimerUL* after the end of the last transmission within a bundle as specified in TS 38.321 [8]. | UE | No | No | No |
| ***lch-PriorityBasedPrioritization-r16***  Indicates whether the UE supports prioritization between overlapping grants and between scheduling request and overlapping grants based on LCH priority as specified in TS 38.321 [8]. | UE | No | No | No |
| ***lch-ToConfiguredGrantMapping-r16***  Indicates whether the UE supports restricting data transmission from a given LCH to a configured (sub-) set of configured grant configurations (see *allowedCG-List-r16* in *LogicalChannelConfig* in TS 38.331 [9]) as specified in TS 38.321 [8]. | UE | No | No | No |
| ***lch-ToGrantPriorityRestriction-r16***  Indicates whether the UE supports restricting data transmission from a given LCH to a configured (sub-) set of dynamic grant priority levels (see *allowedPHY-PriorityIndex-r16* in *LogicalChannelConfig* in TS 38.331 [9]) as specified in TS 38.321 [8]. | UE | No | No | No |
| ***lch-ToSCellRestriction***  Indicates whether the UE supports restricting data transmission from a given LCH to a configured (sub-) set of serving cells (see *allowedServingCells* in *LogicalChannelConfig*). A UE supporting *pdcp-DuplicationMCG-OrSCG-DRB* or *pdcp-DuplicationSRB* (see *PDCP-Config*) shall also support *lch-ToSCellRestriction*. | UE | No | No | No |
| ***lcp-Restriction***  Indicates whether UE supports the selection of logical channels for each UL grant based on RRC configured restriction using RRC parameters *allowedSCS-List*, *maxPUSCH-Duration*, and *configuredGrantType1Allowed* as specified in TS 38.321 [8]. | UE | No | No | No |
| ***logicalChannelSR-DelayTimer***  Indicates whether the UE supports the *logicalChannelSR-DelayTimer* as specified in TS 38.321 [8]. | UE | No | Yes | No |
| ***longDRX-Cycle***  Indicates whether UE supports long DRX cycle as specified in TS 38.321 [8]. | UE | Yes | Yes | No |
| ***mg-ActivationCommPRS-Meas-r17***  Indicates whether UE supports preconfiguration of MGs in RRC signalling for PRS measurements and the use of DL MAC CE from the gNB, as specified in TS 38.321 [8], to activate/deactivate the preconfigured MG for PRS measurements. | UE | No | No | No |
| ***mg-ActivationRequestPRS-Meas-r17***  Indicates whether UE supports preconfiguration of MGs in RRC signalling for PRS measurements and supports the use of UL MAC CE, as specified in TS 38.321 [8], to request the activation/deactivation of the preconfigured MG for PRS measurements. The UE can include this field only if the UE supports *mg-ActivationCommPRS-Meas-r17*. | UE | No | No | No |
| ***multipleConfiguredGrants***  Indicates whether UE supports more than one configured grant configurations (including both Type 1 and Type 2) in a cell group. For each cell, the UE supports at most one configured grant per BWP and the maximum number of configured grant configurations per cell group is 2. If absent, for each configured cell group, the UE only supports one configured grant configuration on one serving cell. | UE | No | Yes | No |
| ***multipleSR-Configurations***  Indicates whether the UE supports 8 SR configurations per PUCCH cell group as specified in TS 38.321 [8]. | UE | No | Yes | No |
| ***non-IntegerDRX-r18***  Indicates whether the UE supports non-integer DRX periodicity as specified in TS 38.331 [9] and TS 38.321 [8]. | UE | No | No | No |
| ***ptmRetransmission-r18***  Indicates whether the UE supports starting *drx-HARQ-RTT-TimerDL-PTM* and *drx-RetransmissionTimerDL-PTM* during multicast reception in RRC\_CONNECTED state as specified in TS 38.321 [8], when HARQ feedback is disabled for the UE.  A UE supporting this feature shall also indicate support of*dynamicMulticastPCell-r17,* and at least one of the following features:  - *ack-NACK-FeedbackForMulticast-r17*  - *ack-NACK-FeedbackForSPS-Multicast-r17*  - *nack-OnlyFeedbackForMulticast-r17*  - *nack-OnlyFeedbackForSPS-Multicast-r17* | UE | No | Yes | No |
| ***ptmRetransmissionInactive-r18***  Indicates whether the UE supports receiving PTM retransmission by starting the *drx-HARQ-RTT-TimerDL-PTM* and *drx-RetransmissionTimerDL-PTM* during multicast reception in RRC\_INACTIVE as specified in TS 38.321 [8]. A UE supporting this feature shall also indicate support of *multicastInactive-r18*. | UE | No | Yes | No |
| ***recommendedBitRate***  Indicates whether the UE supports the bit rate recommendation message from the gNB to the UE as specified in TS 38.321 [8]. | UE | No | No | No |
| ***recommendedBitRateMultiplier-r16***  Indicates whether the UE supports the bit rate multiplier for recommended bit rate MAC CE as specified in TS 38.321 [8], clause 6.1.3.20. This field is only applicable if the UE supports recommendedBitRate. | UE | No | No | No |
| ***recommendedBitRateQuery***  Indicates whether the UE supports the bit rate recommendation query message from the UE to the gNB as specified in TS 38.321 [8]. This field is only applicable if the UE supports *recommendedBitRate*. | UE | No | No | No |
| ***secondaryDRX-Group-r16***  Indicates whether UE supports secondary DRX group as specified in TS 38.321 [8]. | UE | No | Yes | No |
| ***shortDRX-Cycle***  Indicates whether UE supports short DRX cycle as specified in TS 38.321 [8]. | UE | Yes | Yes | No |
| ***simultaneousSR-PUSCH-DiffPUCCH-groups-r17***  Indicates whether the UE supports simultaneous transmission of SR and PUSCH in different PUCCH groups as specified in TS 38.321 [8]. | UE | No | No | No |
| ***singlePHR-P-r16***  Indicates whether UE supports the P bit in single PHR MAC CE as specified in TS 38.321 [8]. | UE | No | No | No |
| ***skipUplinkTxDynamic***  Indicates whether the UE supports skipping of UL transmission for an uplink grant indicated on PDCCH if no data is available for transmission as specified in TS 38.321 [8]. | UE | No | Yes | No |
| ***spCell-BFR-CBRA-r16***  Indicates whether the UE supports sending BFR MAC CE for SpCell BFR as specified in TS 38.321 [8]. | UE | No | No | No |
| ***srs-ResourceId-Ext-r16***  Indicates whether the UE supports the extended 6-bit (Positioning) SRS resource ID in SP Positioning SRS Activation/Deactivation MAC CE, as specified in TS 38.321 [8]. | UE | No | No | No |
| ***sr-TriggeredBy-TA-Report-r17***  Indicates whether the UE supports triggering of SR when a TA report is triggered and there are no available UL-SCH resources. A UE supporting this feature shall also indicate the support of *nonTerrestrialNetwork-r17*. | UE | No | No | No |
| ***sr-TriggeredByTA-ReportATG-r18***  Indicates whether the UE supports triggering of SR when a TA report is triggered and there are no available UL-SCH resources. A UE supporting this feature shall also indicate the support of *uplinkTA-ReportingATG-r18*. | UE | No | No | FR1 only |
| ***survivalTime-r17***  Indicates whether the UE supports services with survival time requirement using configured grant resource and PDCP duplication, as specified in TS 38.321 [8]. A UE supporting this feature shall support *pdcp-DuplicationMCG-orSCG-DRB* or *pdcp-DuplicationSplitDRB*. A UE supporting this feature shall also support *configuredUL-GrantType1-v1650* or *configuredUL-GrantType2-v1650*. | UE | No | No | No |
| ***tdd-MPE-P-MPR-Reporting-r16***  Indicates whether the UE supports P-MPR reporting for Maximum Permissible Exposure, as specified in TS 38.321 [8]. | UE | No | TDD only | FR2 only |
| *ul-LBT-FailureDetectionRecovery-r16*  Indicates whether the UE supports consistent uplink LBT detection and recovery, as specified in TS 38.321 [8], for cells operating with shared spectrum channel access.  This field applies to all serving cells with which the UE is configured with shared spectrum channel access. | UE | No | No | No |
| ***uplink-Harq-ModeB-r17***  Indicates whether the UE supports HARQ Mode B and the corresponding LCP restrictions for uplink transmission. A UE supporting this feature shall also indicate the support of *nonTerrestrialNetwork-r17*. | UE | No | No | No |
| ***uplinkTA-ReportingATG-r18***  Indicates whether the UE supports reporting of information related to TA pre-compensation as specified in TS 38.321 [8]. The UE indicating support of this feature shall also indicate support of *uplinkPreCompensationATG-r18*. | UE | No | No | FR1 only |

***End of the modified section***

# Annex: RAN2 UE capability feature list

According to the following agreements made in RAN2#116-e, RAN2 determined UE capabilities in the feature list format for TR 38.822 is included.

* Include an annex containing the RAN2 determined UE capabilities in the feature list format in the running UE capability CRs (similar to annex containing RAN2 agreements) for easy compilation into the TR38.822 in the later stage.
* For capabilities developed in R2, WIs will provide input to the mega CR.

|  |  |  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Features | Index | Feature group | Components | Prerequisite feature groups | Field name in TS 38.331 | Parent IE in TS 38.331 | Need of FDD/TDD differentiation | Need of FR1/FR2 differentiation | Note | Mandatory/Optional |
| x.  NR\_XR\_enh-Core | x-1 | Additional BS table | Indicates whether the UE supports using the refined buffer size table for BSR and if *delayStatusReport-r18* is supported, DSR, as specified in TS 38.321 [8] and 38.331 [9]. |  | *additionalBS-Table-r18* | *MAC-ParametersCommon* | No | No |  | Optional with capability signalling |
| x.  NR\_XR\_enh-Core | x-2 | Delay Status Report | Indicates whether the UE supports the delay status report of the buffered data as specified in TS 38.321 [8] and 38.331 [9], 38.323 [16] and 38.322 [x]. |  | *delayStatusReport-r18* | *MAC-ParametersCommon* | No | No |  | Optional with capability signalling |
| x.  NR\_XR\_enh-Core | x-3 | Disable CG ReTx Monitoring | Indicates whether the UE supports disabling of waking-up to monitor possible grants for UL retransmissions of configured grants corresponding to a *ConfiguredGrantConfig* as specified in TS 38.321 [8] and 38.331 [9] | See note | *disableCG-RetransmissionMonitoring -r18* | *MAC-ParametersCommon* | No | No | A UE supporting this feature shall also indicate support of at least one of *configuredUL-GrantType1*, *configuredUL-GrantType2*, *configuredUL-GrantType1-v1650*, *configuredUL-GrantType2-v1650*, *configuredUL-GrantType1-r16*, *configuredUL-GrantType2-r16*. | Optional with capability signalling |
| x.  NR\_XR\_enh-Core | x-4 | Non-Integer DRX | Indicates whether the UE supports non-integer DRX periodicity as specified in TS 38.331 [9] and 38.321 [8]. |  | *non-IntegerDRX-r18* | *MAC-ParametersCommon* | No | No |  | Optional with capability signalling |
| x.  NR\_XR\_enh-Core | x-5 | PDU Set based discard | Indicates whether the UEs supports PDU set based discard operation (i.e. *pdu-SetDiscard-r18* configuration, as specified in TS 38.331 [9]). | See note | *pdu-SetDiscard-r18* | *PDCP-Parameters* | No | No | UE supporting *pdu-SetDiscard-r18* shall also support the ability to identify PDU sets for UL XR traffic. | Optional with capability signalling |
| x.  NR\_XR\_enh-Core | x-6 | PSI based discard | Indicates whether the UEs supports PSI based discard (i.e. *discardTimerForLowImportance-r18* configuration, as specified in TS 38.331). | See note | *psi-BasedDiscard-r18* | *PDCP-Parameters* | No | No | UE supporting *psi-BasedDiscard-r18* shall also support the ability to identify PDU sets and, PSI for UL XR traffic. | Optional with capability signalling |
| x.  NR\_XR\_enh-Core | x-7 | UL traffic information | Indicates whether UE supports the new UE assistance information on UL traffic information to report jitter range, burst arrival time, data burst periodicity and, PDU Set and PSI identification as specified in TS 38.331 [9]. | See note | *ul-TrafficInfo-r18* | *UE-NR-Capability-v18xy* | No | No |  | Optional with capability signalling |