3GPP TSG-RAN WG2 Meeting #124 R2-2313567

Chicago, USA, Nov. 13th – 17th, 2023

**Source: Session Chair (Apple)**

**Title: Report from SON/MDT session**

**Status of At-Meeting Email Discussions**

*This subclause is not an Agenda Item. It contains a running summary of the email discussions assigned to take place during the meeting weeks. This section will be moved to an appendix in the final version of the report.*

* **[AT124][650][SONMDT] Organisational Sasha – SONMDT (Apple)**

Scope: Organisational discussions and announcements, as needed throughout the meeting weeks

Intended outcome: Well-informed participants

**5 NR Rel-15 and Rel-16**

*Essential corrections only.*

*Tdoc Limitation: 5 tdocs in total for all sub agenda items.*

*In case a correction need to be reflected in both NR TS and LTE TS, the corrections should be submitted under one single AI (so the NR and LTE correction can be treatee together), the sub-Ais below this*

**5.4 SON MDT support for NR**

*(NR\_SON\_MDT-Core; leading WG: RAN3; REL-16; started: Jun 19; Completed June 20; WID:* [*RP-191776*](http://ftp.3gpp.org/tsg_ran/TSG_RAN/TSGR_85/Docs/RP-191776.zip)*).*

### 5.4.1 General and stage-2 corrections

*Including incoming LSs, TS 37.320 corrections*

### 5.4.2 TS 38.314 corrections

### 5.4.3 RRC corrections

R2-2312888 Clarification to the the field description of the raPurpose in RA-Report Ericsson CR Rel-16 38.331 16.14.0 4447 - F NR\_SON\_MDT-Core

R2-2312889 Clarification to the field description of the raPurpose in RA-Report Ericsson CR Rel-17 38.331 17.6.0 4448 - A NR\_SON\_MDT-Core

R2-2312890 Setting the content of the RA report for the selected beam Ericsson CR Rel-16 38.331 16.14.0 4449 - F NR\_SON\_MDT-Core

R2-2312891 Setting the content of the RA report for the selected beam Ericsson CR Rel-17 38.331 17.6.0 4450 - A NR\_SON\_MDT-Core

**6 NR Rel-17**

*Essential corrections only. Editorial/clarifications should be sent to be reviewed and approved by spec rapporteurs prior to submission. Editiorials should only be submitted by spec rapporteurs.*

**6.5 SON MDT**

*(NR\_ENDC\_SON\_MDT\_enh-Core; leading WG: RAN3; REL-17; WID:* [*RP-201281*](http://ftp.3gpp.org/tsg_ran/TSG_RAN/TSGR_88e/Docs/RP-201281.zip)*)*

*Tdoc Limitation: 2 tdocs*

### 6.5.0 In Principle Agreed CRs

R2-2312892 Logging previousPSCellId in case of SCG addition failure Ericsson CR Rel-17 38.331 17.6.0 4348 1 F NR\_ENDC\_SON\_MDT\_enh-Core R2-2310742

R2-2312893 Successful handover report is missing under ObtainCommonLocationInfo Ericsson CR Rel-17 38.331 17.6.0 4349 1 F NR\_ENDC\_SON\_MDT\_enh-Core R2-2310743

R2-2313128 Correction on delay definitions for split DRB Huawei, HiSilicon CR Rel-17 38.314 17.3.0 0031 - F NR\_ENDC\_SON\_MDT\_enh-Core

### 6.5.1 SON Corrections

R2-2313594 LS reply for LS on user consent for SON/MDT for NB-IoT UEs (S3-235004; contact: Nokia) SA3 LSin Rel-17 NR\_ENDC\_SON\_MDT\_enh-Core To:RAN2, SA5

R2-2312894 On logging CHO candidate cells in SHR Ericsson CR Rel-17 38.331 17.6.0 4451 - F NR\_ENDC\_SON\_MDT\_enh-Core

R2-2312895 Discussion on the areaConfiguration Ericsson discussion NR\_ENDC\_SON\_MDT\_enh-Core

R2-2313322 Failure cause in RLF report for inter-RAT mobility Sharp CR Rel-17 38.331 17.6.0 4486 - F NR\_ENDC\_SON\_MDT\_enh-Core

R2-2313324 Failure information in RLF report for inter-RAT mobility SHARP Corporation discussion

### 6.5.2 MDT Corrections

R2-2313273 Corrections on extension of AreaConfiguration CATT CR Rel-17 38.331 17.6.0 4327 1 F NR\_ENDC\_SON\_MDT\_enh-Core R2-2310364

## 7.13 Further enhancement of data collection for SON MDT in NR and EN-DC

(NR\_ENDC\_SON\_MDT\_enh2-Core; leading WG: RAN3; REL-18; WID: [RP-221825](http://ftp.3gpp.org/tsg_ran/TSG_RAN/TSGR_96/Docs/RP-221825.zip))

Includes LS in’s related to AI/ML for NG-RAN

Time budget: 1 TU

Tdoc Limitation: 6 tdocs

### 7.13.1 Organizational

Ls in Rapporteur input.

R2-2311725 LS on SPR (R3-235868; contact: Samsung) RAN3 LS in Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core To:RAN2

R2-2311729 LS on MRO for Fast MCG Recovery (R3-235897; contact: Huawei) RAN3 LS in Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core To:RAN2

R2-2311767 Reply LS on user consent of Non-public Network (S5-236928; contact: Ericsson) SA5 LS in Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core To:RAN3 Cc:RAN2, SA3

R2-2312740 The report of [Post123bis][658][R18 SONMDT] Running UE capabilities CR of SONMDT(CATT) CATT report Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312791 Running 36.331 CR for SN RACH report ZTE Corporation, Sanechips CR Rel-18 36.331 17.6.0 4969 - B NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312792 Running 38.331 CR for SON on RACH report ZTE Corporation, Sanechips CR Rel-18 38.331 17.6.0 4444 - B NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312793 RACH relevant SON open issues ZTE Corporation, Sanechips discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312896 List of Open Issues of Rel-18 SONMDT MRO Ericsson discussion NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312902 Running CR 38331 for Rel-18 SON MRO Ericsson CR Rel-18 38.331 17.6.0 4253 2 B NR\_ENDC\_SON\_MDT\_enh2-Core R2-2310750

R2-2312903 CR to 38331 for introducing SON/MDT features in Rel-18 Ericsson, Huawei, ZTE CR Rel-18 38.331 17.6.0 4452 - B NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2313129 CR to 36.331 for Further enhancements on SONMDT Huawei, Ericsson, ZTE CR Rel-18 36.331 17.6.0 4973 - B NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2313130 CR to 36.306 for UE capability for R18 SONMDT Huawei, HiSilicon, CATT CR Rel-18 36.306 17.4.0 1875 - B NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2313131 CR to 36.331 for UE capability for R18 SONMDT Huawei, HiSilicon, CATT CR Rel-18 36.331 17.6.0 4974 - B NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2313139 Running 36.331 CR for logged MDT enhancements Huawei, HiSilicon draftCR Rel-18 36.331 17.6.0 B NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2313140 Running 38.331 CR for logged MDT enhancements and NPN Huawei, HiSilicon draftCR Rel-18 38.331 17.6.0 B NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2313271 CR to 38306 for UE capability for R18 SONMDT CATT, Huawei, HiSilicon CR Rel-18 38.306 17.6.0 1007 - B NR\_ENDC\_SON\_MDT\_enh2-Core Revised

R2-2313272 CR to 38331 for UE capability for R18 SONMDT CATT, Huawei, HiSilicon CR Rel-18 38.331 17.6.0 4484 - B NR\_ENDC\_SON\_MDT\_enh2-Core Revised

R2-2313545 CR to 38306 for UE capability for R18 SONMDT CATT, Huawei, HiSilicon CR Rel-18 38.306 17.6.0 1007 1 B NR\_ENDC\_SON\_MDT\_enh2-Core R2-2313271 Late

R2-2313546 CR to 38331 for UE capability for R18 SONMDT CATT, Huawei, HiSilicon CR Rel-18 38.331 17.6.0 4484 1 B NR\_ENDC\_SON\_MDT\_enh2-Core R2-2313272 Late

### 7.13.2 MRO for inter-system handover for voice fallback

R2-2312794 Consideration on MRO for inter-system handover for voice fallback ZTE Corporation, Sanechips discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312897 Discussion on voice fallback HO failure Ericsson, CMCC discussion NR\_ENDC\_SON\_MDT\_enh2-Core

### 7.13.3 MDT override

### 7.13.4 SHR and SPCR

R2-2312308 On SPR availability indication Apple discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312473 SON enhancements for inter-RAT SHR and SPR Lenovo discussion Rel-18

R2-2312618 SPR reporting mechanism Nokia, Nokia Shanghai Bell discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312741 Further discussion on SPR CATT discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core Revised

R2-2312795 Consideration on SPR remaining issues ZTE Corporation, Sanechips discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312885 SON/MDT enhancements for Inter-RAT SHR Samsung discussion

R2-2312898 Discussion on inter-RAT SHR and SPR Ericsson discussion NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312904 SON/MDT enhancements for SPR Samsung discussion

R2-2313070 Discussion on Open Issues in SPR Qualcomm Incorporated discussion Rel-18

R2-2313132 Discussion on leftover issues for SHR and SPR Huawei, HiSilicon discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2313222 Discussion on remaining issues for SPR SHARP Corporation discussion

R2-2313443 Remaining issues on SPR vivo discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh-Core

R2-2313544 Further discussion on SPR CATT discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core R2-2312741 Late

### 7.13.5 SON for NR-U

Focus on UE impacts. RAN2/RAN3 progress should be considered.

R2-2312474 Discussion on MRO for NR-U Lenovo discussion Rel-18

R2-2312676 SONMDT enhancement for NR-U CMCC discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312742 SON Enhancement for NR-U CATT discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312796 Remaining issue on NR-U ZTE Corporation, Sanechips discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312905 SON/MDT enhancements for NR-U Samsung discussion

R2-2313133 Discussion on leftover issues for SON for NR-U Huawei, HiSilicon discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2313514 Enhancements of SON reports for NR-U Ericsson discussion

### 7.13.6 RACH enhancement

R2-2312489 Consideration on the SON enhancements for RACH report Xiaomi discussion Rel-18

R2-2312619 Discussion on RACH enhancement for SON Nokia, Nokia Shanghai Bell discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312743 RACH enhancement for SON CATT discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312797 Remaining issue on RACH enhancements ZTE Corporation, Sanechips discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312899 RA report enhancement Ericsson discussion NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312914 SON/MDT enhancements for RACH Samsung discussion

R2-2313082 On SgNB RACH reporting Qualcomm Incorporated discussion Rel-18

R2-2313134 Discussion on leftover issues for RACH enhancement Huawei, HiSilicon discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2313177 Power information in RA report SHARP Corporation discussion R2-2310423

R2-2313214 RA report enhancement for SDT SHARP Corporation discussion R2-2310428

### 7.13.7 SON/MDT enhancements for Non-Public Networks

R2-2312309 OOC analysis involving NPN network Apple discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312451 Discussion on the SONMDT enhancement for NPN Xiaomi discussion Rel-18

R2-2312620 Discussion on open NPN issues in SON/MDT Nokia, Nokia Shanghai Bell discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312744 SON and MDT Enhancement for NPN CATT discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312798 Remaining issue on SON-MDT support for NPN ZTE Corporation, Sanechips discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312886 SON/MDT enhancements for NPN Samsung discussion

R2-2312900 SON Support for NPN Ericsson discussion NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2313072 Discussion on Open Issues in SON/MDT Enhancements for NPN Qualcomm Incorporated discussion

R2-2313135 Discussion on leftover issues for SONMDT enhancements for NPN Huawei, HiSilicon discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2313141 Open issue list for RRC running CR for NPN Huawei, HiSilicon discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2313444 Remaining issues on SON enhancement for NPN vivo discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh-Core

### 7.13.8 Other

R2-2312475 SON enhancements for CPAC Lenovo discussion Rel-18

R2-2312621 Improvement of handling of timeConnFailure Nokia, Nokia Shanghai Bell discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312622 MRO for CPAC Nokia, Nokia Shanghai Bell discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312623 MRO for fast MCG recovery Nokia, Nokia Shanghai Bell discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312659 Discussion on MRO for fast MCG recovery CMCC discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312660 [Draft] Reply LS on MRO for Fast MCG Recovery CMCC LS out Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core To:RAN3

R2-2312677 SON MDT enhancement for MR-DC CPAC CMCC discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312678 MHI Enhancement for SCG Activation/Deactivation CMCC, Ericsson, CATT discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312745 Discussion on Fast MCG recovery MRO Enhancement CATT discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312746 Discussion on MHI Enhancement for SCG Deactivation/Activation CATT discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312799 Consideration on other SON remaining issues ZTE Corporation, Sanechips discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2312884 Fast MCG Link Recovery Optimization Samsung discussion

R2-2312901 Discussion on Fast MCG recovery Ericsson discussion NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2313136 Discussion on leftover issues for fast MCG recovery Huawei, HiSilicon discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2313137 Discussion on leftover issues for CPAC MRO Huawei, HiSilicon discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2313138 Discussion on MRO for Fast MCG Recovery (RAN3 LS R3-235897) Huawei, HiSilicon discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh2-Core

R2-2313239 Discussion on fast MCG recovery MRO SHARP Corporation discussion

R2-2313445 Remaining issues on MRO for CPAC vivo discussion Rel-18 NR\_ENDC\_SON\_MDT\_enh-Core

## Summary

All the tdocs have been discussed offline by email.

### **Agreed Documents**

### **Post-meeting email discussions**