**Third Generation Partnership Project (3GPP™)**

**DRAFT Meeting Report  
for  
TSG RAN WG4  
meeting: 98-e**

**Electronic Meeting, Online, 25/01/2021 to 05/02/2021**

Report generated on Monday, 2021-01-18 22:13 UTC

Contents:

2 Approval of the agenda 14

3 Letters / reports from other groups / meetings 14

4 Rel-15 New radio access technology 19

4.1 System Parameters Maintenance [NR\_newRAT-Core] 19

4.2 UE RF requirements maintenance [NR\_newRAT] 20

4.2.1 [FR1] Maintenance for 38.101-1 [NR\_newRAT-Core] 20

4.2.2 [FR2] Maintenance for 38.101-2 [NR\_newRAT-Core] 30

4.2.3 Maintenance for 38.101-3 [NR\_newRAT-Core] 35

4.3 UE EMC requirements maintenance [NR\_newRAT-Core] 41

4.4 BS RF requirements maintenance [NR\_newRAT-Core] 42

4.4.1 General [NR\_newRAT-Core] 42

4.4.2 TX/RX requirements maintenance (38.104) [NR\_newRAT-Core] 43

4.4.3 MSR specifications maintenance [NR\_newRAT-Core/Perf] 45

4.5 BS conformance testing Maintenance [NR\_newRAT-Perf] 50

4.5.1 General [NR\_newRAT-Perf] 50

4.5.2 Conducted conformance testing (38.141-1) [NR\_newRAT-Perf] 52

4.5.3 Radiated conformance testing (38.141-2) [NR\_newRAT-Perf] 53

4.5.4 eAAS specifications maintenance [NR\_newRAT-Core/Perf] 59

4.6 BS EMC requirements Maintenance [NR\_newRAT-Core] 62

4.6.1 Core requirements [NR\_newRAT-Core] 62

4.6.2 Performance requirements [NR\_newRAT-Perf] 62

4.7 RRM core requirements maintenance (38.133/36.133) [NR\_newRAT-Core] 64

4.8 RRM perf. requirements maintenance (38.133/36.133) [NR\_newRAT-Perf] 72

4.9 Demodulation and CSI requirements maintenance (38.101-4/38.104)[NR\_newRAT-Perf] 93

4.9.1 UE demodulation requirements[NR\_newRAT-Perf] 93

4.9.2 CSI requirements [NR\_newRAT-Perf] 94

4.9.3 BS demodulation requirements [NR\_newRAT-Perf] 95

4.10 Positioning specs maintenance (36.171, 37.171 and 38.171) [NR\_newRAT-Perf or TEI] 98

4.11 Testability Maintenance (38.810) [FS\_NR\_test\_methods] 98

5 LTE maintenance (up to Rel15) [WI code or TEI] 98

5.1 BS RF requirements [WI code or TEI] 98

5.2 UE RF requirements [WI code or TEI] 99

5.3 RRM requirements [WI code or TEI] 102

5.4 Demodulation and CSI requirements [WI code or TEI] 109

5.4.1 UE demodulation and CSI requirements [WI code or TEI] 109

5.4.2 BS demodulation requirements [WI code or TEI] 109

6 Rel-16 Work Items for LTE 109

6.1 Additional MTC enhancements for LTE [LTE\_eMTC5] 109

6.1.1 RF core requirements maintenance [LTE\_eMTC5-Core] 109

6.1.2 RRM requirements maintenance [LTE\_eMTC5-Core/Perf] 109

6.2 Additional enhancements for NB-IoT [NB\_IOTenh3] 110

6.2.1 RF core requirements maintenance [NB\_IOTenh3-Core] 110

6.2.2 RRM requirements maintenance [NB\_IOTenh3-Core/Perf] 110

6.3 Even further Mobility enhancement in E-UTRAN [LTE\_feMob] 111

6.3.1 RRM core requirements maintenance [LTE\_feMob-Core] 111

6.3.2 RRM perf. requirements [LTE\_feMob-Perf] 113

6.3.2.1 General [LTE\_feMob-Perf] 113

6.3.2.2 Test cases [LTE\_feMob-Perf] 113

6.4 R16 LTE maintenance [WI code] 114

6.4.1 BS RF requirements [WI code] 114

6.4.2 UE RF requirements [WI code] 114

6.4.3 RRM requirements [WI code] 115

6.4.4 Demodulation and CSI requirements [WI code] 115

6.4.4.1 UE demodulation and CSI requirements [WI code] 115

6.4.4.2 BS demodulation requirements [WI code] 115

7 Rel-16 non-spectrum related work items for NR 115

7.1 NR-based access to unlicensed spectrum [NR\_unlic] 115

7.1.1 System parameters maintenance [NR\_unlic-Core] 115

7.1.2 UE RF requirements maintenance [NR\_unlic-Core] 117

7.1.2.1 Transmitter characteristics [NR\_unlic-Core] 117

7.1.2.2 Receiver characteristics [NR\_unlic-Core] 118

7.1.3 BS RF requirements maintenance [NR\_unlic-Core] 118

7.1.3.1 General [NR\_unlic-Core] 119

7.1.3.2 Transmitter characteristics [NR\_unlic-Core] 119

7.1.3.3 Receiver characteristics [NR\_unlic-Core] 120

7.1.4 BS conformance testing [NR\_unlic-Perf] 121

7.1.4.1 General [NR\_unlic-Perf] 122

7.1.4.2 Transmitter characteristics [NR\_unlic-Perf] 122

7.1.4.3 Receiver characteristics [NR\_unlic-Perf] 123

7.1.5 RRM core requirements maintenance (38.133) [NR\_unlic-Core] 124

7.1.5.1 General [NR\_unlic-Core] 124

7.1.5.2 RRC connection mobility control [NR\_unlic-Core] 126

7.1.5.3 SCell activation/deactivation (delay and interruption) [NR\_unlic-Core] 129

7.1.5.4 Active TCI state switching [NR\_unlic-Core] 132

7.1.5.5 RLM [NR\_unlic-Core] 132

7.1.5.6 Beam management [NR\_unlic-Core] 133

7.1.5.7 Measurement requirements [NR\_unlic-Core] 134

7.1.5.8 Measurement capability and reporting criteria [NR\_unlic-Core] 136

7.1.5.9 Timing [NR\_unlic-Core] 136

7.1.5.10 Other requirements [NR\_unlic-Core] 137

7.1.6 RRM perf. requirements (38.133) [NR\_unlic-Perf] 139

7.1.6.1 General [NR\_unlic-Perf] 139

7.1.6.2 Common RRM test configuration [NR\_unlic-Perf] 140

7.1.6.3 Test cases [NR\_unlic-Perf] 141

7.1.6.3.1 General [NR\_unlic-Perf] 141

7.1.6.3.2 RRC IDLE, cell re-selection [NR\_unlic-Perf] 142

7.1.6.3.3 HO delay and interruptions [NR\_unlic-Perf] 143

7.1.6.3.4 RRC Re-establishment [NR\_unlic-Perf] 144

7.1.6.3.5 RRC Connection Release with Redirection [NR\_unlic-Perf] 144

7.1.6.3.6 Timing (transmit timing and TA) [NR\_unlic-Perf] 145

7.1.6.3.7 BWP switching delay and interruptions [NR\_unlic-Perf] 146

7.1.6.3.8 PSCell addition/release (delay and interruption) [NR\_unlic-Perf] 146

7.1.6.3.9 Interruptions [NR\_unlic-Perf] 147

7.1.6.3.10 RLM [NR\_unlic-Perf] 147

7.1.6.3.11 Beam management [NR\_unlic-Perf] 148

7.1.6.3.12 Intra-frequency, inter-frequency and inter-RAT measurement requirements [NR\_unlic-Perf] 148

7.1.6.3.13 Accuracy requirements for NR-U intra-frequency, inter-frequency and inter-RAT measurements [NR\_unlic-Perf] 150

7.1.7 Demodulation and CSI requirements (38.101-4/38.104) [NR\_unlic-Perf] 151

7.1.7.1 General [NR\_unlic-Perf] 151

7.1.7.2 UE demodulation requirements [NR\_unlic-Perf] 152

7.1.7.3 CSI requirements [NR\_unlic-Perf] 153

7.1.7.4 BS demodulation requirements [NR\_unlic-Perf] 153

7.1.7.4.1 General [NR\_unlic-Perf] 153

7.1.7.4.2 PUSCH requirements [NR\_unlic-Perf] 154

7.1.7.4.3 PUCCH requirements [NR\_unlic-Perf] 156

7.1.7.4.4 PRACH requirements [NR\_unlic-Perf] 157

7.2 NR mobility enhancement [NR\_Mob\_enh] 159

7.2.1 RRM requirements maintenance (38.133) [NR\_Mob\_enh-Core/Perf] 159

7.3 5G V2X with NR sidelink [5G\_V2X\_NRSL] 161

7.3.1 System parameters maintenance [5G\_V2X\_NRSL-Core] 161

7.3.2 UE RF requirements maintenance [5G\_V2X\_NRSL-Core] 161

7.3.2.1 Transmitter characteristics [5G\_V2X\_NRSL-Core] 161

7.3.2.2 Receiver characteristics [5G\_V2X\_NRSL-Core] 163

7.3.3 Concurrent operation maintenance (scenarios, requirements, etc) [5G\_V2X\_NRSL-Core] 163

7.3.3.1 Transmitter characteristics [5G\_V2X\_NRSL-Core] 163

7.3.3.2 Receiver characteristics [5G\_V2X\_NRSL-Core] 165

7.3.4 RRM core requirements maintenance (38.133) [5G\_V2X\_NRSL-Core] 165

7.3.5 RRM perf. requirements (38.133) [5G\_V2X\_NRSL-Perf] 165

7.3.5.1 General [5G\_V2X\_NRSL-Perf] 166

7.3.5.2 L1 SL-RSRP measurement accuracy [5G\_V2X\_NRSL-Perf] 166

7.3.5.3 Test cases [5G\_V2X\_NRSL-Perf] 166

7.3.5.3.1 UE transmit timing [5G\_V2X\_NRSL-Perf] 166

7.3.5.3.2 Initiation/Cease of SLSS Transmission [5G\_V2X\_NRSL-Perf] 166

7.3.5.3.3 Selection / Reselection of V2X Synchronization Reference Source [5G\_V2X\_NRSL-Perf] 166

7.3.5.3.4 L1 SL-RSRP measurements [5G\_V2X\_NRSL-Perf] 166

7.3.5.3.5 Congestion control measurements [5G\_V2X\_NRSL-Perf] 166

7.3.5.3.6 Interruptions [5G\_V2X\_NRSL-Perf] 167

7.3.5.3.7 Resource Pre-emption [5G\_V2X\_NRSL-Perf] 167

7.3.5.3.8 Resource Re-evaluation [5G\_V2X\_NRSL-Perf] 167

7.3.5.3.9 Others [5G\_V2X\_NRSL-Perf] 167

7.3.6 Demodulation requirements (38.101-4) [5G\_V2X\_NRSL-Perf] 167

7.3.6.1 General [5G\_V2X\_NRSL-Perf] 167

7.3.6.2 Single link test [5G\_V2X\_NRSL-Perf] 167

7.3.6.2.1 PSSCH demodulation test [5G\_V2X\_NRSL-Perf] 168

7.3.6.2.2 PSCCH demodulation test [5G\_V2X\_NRSL-Perf] 169

7.3.6.2.3 PSBCH demodulation test [5G\_V2X\_NRSL-Perf] 170

7.3.6.2.4 PSFCH demodulation test [5G\_V2X\_NRSL-Perf] 171

7.3.6.3 Multiple link test [5G\_V2X\_NRSL-Perf] 171

7.3.6.3.1 Power imbalance requirement [5G\_V2X\_NRSL-Perf] 172

7.3.6.3.2 HARQ soft buffer combing test [5G\_V2X\_NRSL-Perf] 173

7.3.6.3.3 PSFCH decoding capability test [5G\_V2X\_NRSL-Perf] 173

7.3.6.3.4 PSCCH/PSSCH decoding capability [5G\_V2X\_NRSL-Perf] 174

7.3.6.3.5 Others [5G\_V2X\_NRSL-Perf] 174

7.4 Integrated Access and Backhaul for NR [NR\_IAB] 175

7.4.1 General [NR\_IAB-Core] 175

7.4.1.1 System parameters maintenance [NR\_IAB-Core] 175

7.4.1.2 Others [NR\_IAB-Core] 175

7.4.2 RF requirements maintenance [NR\_IAB-Core] 176

7.4.2.1 Transmitter characteristics [NR\_IAB-Core] 176

7.4.2.1.1 Tx Power related requirements [NR\_IAB-Core] 176

7.4.2.1.2 Transmitted signal quality [NR\_IAB-Core] 176

7.4.2.1.3 Unwanted emissions [NR\_IAB-Core] 178

7.4.2.1.4 Others [NR\_IAB-Core] 178

7.4.2.2 Receiver characteristics [NR\_IAB-Core] 178

7.4.2.2.1 Sensitivity and dynamic range requirements [NR\_IAB-Core] 178

7.4.2.2.2 In-band selectivity and blocking requirements [NR\_IAB-Core] 179

7.4.2.2.3 Others [NR\_IAB-Core] 179

7.4.3 RF conformance testing [NR\_IAB-Perf] 180

7.4.3.1 General and work plan [NR\_IAB-Perf] 180

7.4.3.2 Common test issues for conducted and radiated conformance testing [NR\_IAB-Perf] 180

7.4.3.2.1 Test configurations [NR\_IAB-Perf] 180

7.4.3.2.2 Test models [NR\_IAB-Perf] 181

7.4.3.2.3 Others [NR\_IAB-Perf] 182

7.4.3.3 Conducted conformance testing [NR\_IAB-Perf] 183

7.4.3.3.1 Transmitter characteristics [NR\_IAB-Perf] 183

7.4.3.3.2 Receiver characteristics [NR\_IAB-Perf] 184

7.4.3.3.3 Other test issues [NR\_IAB-Perf] 184

7.4.3.4 Radiated conformance testing [NR\_IAB-Perf] 185

7.4.3.4.1 Transmitter characteristics [NR\_IAB-Perf] 185

7.4.3.4.2 Receiver characteristics [NR\_IAB-Perf] 185

7.4.3.4.3 Other test issues [NR\_IAB-Perf] 186

7.4.4 RRM core requirements maintenance [NR\_IAB-Core] 186

7.4.5 RRM perf. requirements [NR\_IAB-Perf] 188

7.4.5.1 General [NR\_IAB-Perf] 188

7.4.5.2 Test cases [NR\_IAB-Perf] 189

7.4.6 EMC core requirements maintenance [NR\_IAB-Core] 191

7.4.6.1 General [NR\_IAB-Core] 191

7.4.6.2 Emission requirements [NR\_IAB-Core] 191

7.4.6.3 Immunity requirements [NR\_IAB-Core] 191

7.4.7 EMC performance requirements [NR\_IAB-Perf] 192

7.4.8 Demodulation and CSI requirements [NR\_IAB-Perf] 193

7.4.8.1 General [NR\_IAB-Perf] 193

7.4.8.2 IAB-DU performance requirements [NR\_IAB-Perf] 193

7.4.8.3 IAB-MT performance requirements [NR\_IAB-Perf] 194

7.5 Multi-RAT Dual-Connectivity and Carrier Aggregation enhancements [LTE\_NR\_DC\_CA\_enh] 195

7.5.1 RF requirements maintenance [LTE\_NR\_DC\_CA\_enh-Core] 195

7.5.2 RRM core requirements maintenance (38.133/36.133) [LTE\_NR\_DC\_CA\_enh-Core] 197

7.5.2.1 Early Measurement reporting [LTE\_NR\_DC\_CA\_enh-Core] 197

7.5.2.2 Efficient and low latency serving cell configuration, activation and setup [LTE\_NR\_DC\_CA\_enh-Core] 198

7.5.3 RRM perf. requirements (38.133) [LTE\_NR\_DC\_CA\_enh-Perf] 204

7.5.3.1 Early Measurement reporting [LTE\_NR\_DC\_CA\_enh- Perf] 204

7.5.3.1.1 Accuracy requirements [LTE\_NR\_DC\_CA\_enh-Perf] 204

7.5.3.1.2 Test cases [LTE\_NR\_DC\_CA\_enh-Perf] 205

7.5.3.2 Efficient and low latency serving cell configuration, activation and setup [LTE\_NR\_DC\_CA\_enh-Perf] 206

7.5.3.2.1 Test cases for direct SCell activation [LTE\_NR\_DC\_CA\_enh-Perf] 206

7.5.3.2.2 Test case for SCell Dormancy [LTE\_NR\_DC\_CA\_enh-Perf] 208

7.6 UE power saving in NR [NR\_UE\_pow\_sav] 210

7.6.1 RRM requirements maintenance (38.133) [NR\_UE\_pow\_sav-Core/Perf] 210

7.6.2 Demodulation and CSI requirements (38.101-4) [NR\_UE\_pow\_sav-Perf] 213

7.7 NR Positioning Support [NR\_pos] 215

7.7.1 RRM core requirements maintenance (38.133) [NR\_pos-Core] 215

7.7.1.1 PRS-RSTD measurement requirements [NR\_pos-Core] 215

7.7.1.2 PRS-RSRP measurement requirements [NR\_pos-Core] 220

7.7.1.3 UE Rx-Tx time difference measurement requirements [NR\_pos-Core] 221

7.7.1.4 Other requirements [NR\_pos-Core] 225

7.7.2 RRM perf. requirements (38.133) [NR\_pos-Perf] 227

7.7.2.1 General [NR\_pos-Perf] 227

7.7.2.2 UE requirements and test cases [NR\_pos-Perf] 228

7.7.2.2.1 Measurement accuracy requirements [NR\_pos-Perf] 228

7.7.2.2.1.1 PRS RSTD [NR\_pos-Perf] 228

7.7.2.2.1.2 PRS RSRP [NR\_pos-Perf] 229

7.7.2.2.1.3 UE Rx-Tx time difference [NR\_pos-Perf] 231

7.7.2.2.2 Test cases [NR\_pos-Perf] 232

7.7.2.2.3 Measurement requirements [NR\_pos-Perf] 234

7.7.2.2.4 Accuracy requirements [NR\_pos-Perf] 235

7.7.2.2.5 Other [NR\_pos-Perf] 235

7.7.2.3 gNB requirements [NR\_pos-Perf] 235

7.7.2.3.1 General [NR\_pos-Perf] 235

7.7.2.3.2 SRS-RSRP requirements [NR\_pos-Perf] 237

7.7.2.3.3 gNB Rx-Tx time difference requirements [NR\_pos-Perf] 238

7.7.2.3.4 UL RTOA requirements [NR\_pos-Perf] 239

7.8 Physical layer enhancements for NR URLLC [NR\_L1enh\_URLLC-Core] 240

7.8.1 Demodulation and CSI requirements (38.101-4/38.104) [NR\_L1enh\_URLLC-Perf] 240

7.8.1.1 Performance requirements with ultra-low BLER [NR\_L1enh\_URLLC-Perf] 240

7.8.1.1.1 UE demodulation requirements [NR\_L1enh\_URLLC-Perf] 240

7.8.1.1.2 CSI requirements [NR\_L1enh\_URLLC-Perf] 241

7.8.1.1.3 BS demodulation requirements [NR\_L1enh\_URLLC-Perf] 243

7.8.1.2 Performance requirements with higher BLER [NR\_L1enh\_URLLC-Perf] 244

7.8.1.2.1 UE demodulation requirements [NR\_L1enh\_URLLC-Perf] 244

7.8.1.2.2 BS demodulation requirements [NR\_L1enh\_URLLC-Perf] 248

7.9 Enhancements on MIMO for NR [NR\_eMIMO] 253

7.9.1 UE RF core requirements maintenance (38.101) [NR\_eMIMO-Core] 253

7.9.2 RRM core requirements maintenance (38.133) [NR\_eMIMO-Core] 254

7.9.3 RRM perf. requirements (38.133) [NR\_eMIMO-Perf] 257

7.9.3.1 General [NR\_eMIMO-Perf] 258

7.9.3.2 L1-SINR measurement accuracy [NR\_eMIMO-Perf] 258

7.9.3.3 Test cases [NR\_eMIMO-Perf] 260

7.9.3.3.1 L1-SINR measurements [NR\_eMIMO-Perf] 260

7.9.3.3.2 BFR for SCell [NR\_eMIMO-Perf] 261

7.9.3.3.3 DL/UL beam indication with reduced latency and overhead [NR\_eMIMO-Perf] 261

7.9.3.3.4 Others [NR\_eMIMO-Perf] 262

7.9.4 Demodulation and CSI requirements (38.101-4) [NR\_eMIMO-Perf] 263

7.9.4.1 General [NR\_eMIMO-Perf] 263

7.9.4.2 Demodulation requirements [NR\_eMIMO-Perf] 264

7.9.4.2.1 Single-DCI based SDM scheme [NR\_eMIMO-Perf] 264

7.9.4.2.2 Multi-DCI based transmission scheme [NR\_eMIMO-Perf] 265

7.9.4.2.3 Single-DCI based transmission schemes (URLLC) [NR\_eMIMO-Perf] 266

7.9.4.3 CSI requirements [NR\_eMIMO-Perf] 267

7.10 Add support of NR DL 256QAM for FR2 [NR\_DL256QAM\_FR2] 269

7.10.1 Demodulation and CSI requirements (38.101-4) [NR\_DL256QAM\_FR2-Perf] 269

7.10.1.1 UE Demodulation requirements [NR\_DL256QAM\_FR2-Perf] 269

7.10.1.2 CSI requirements [NR\_DL256QAM\_FR2-Perf] 271

7.10.1.3 SDR requirements [NR\_DL256QAM\_FR2-Perf] 273

7.11 RF requirements for NR frequency range 1 (FR1) [NR\_RF\_FR1] 274

7.11.1 RF core requirements maintenance [NR\_RF\_FR1-Core] 274

7.11.1.1 Intra-band UL CA for FR1 power class 3 [NR\_RF\_FR1-Core] 274

7.11.1.2 Others [NR\_RF\_FR1-Core] 275

7.11.2 RRM requirements maintenance (38.133) [NR\_RF\_FR1-Core/Perf] 278

7.12 NR RF requirement enhancements for frequency range 2 (FR2) [NR\_RF\_FR2\_req\_enh] 279

7.12.1 RF core requirements maintenance [NR\_RF\_FR2\_req\_enh-Core] 279

7.12.2 RRM requirements maintenance (38.133) [NR\_RF\_FR2\_req\_enh-Core] 281

7.13 NR RRM requirement enhancement [NR\_RRM\_Enh-Core] 281

7.13.1 RRM core requirements maintenance (38.133) [NR\_RRM\_Enh-Core] 281

7.13.1.1 Multiple Scell activation/deactivation [NR\_RRM\_Enh-Core] 281

7.13.1.2 BWP switching on multiple CCs [NR\_RRM\_Enh-Core] 282

7.13.1.3 Other requirements maintenance [NR\_RRM\_Enh-Core] 284

7.13.2 RRM perf. requirements (38.133) [NR\_RRM\_Enh-Perf] 290

7.13.2.1 General [NR\_RRM\_Enh-Perf] 290

7.13.2.2 Test cases [NR\_RRM\_Enh-Perf] 290

7.13.2.2.1 SRS carrier switching requirements [NR\_RRM\_Enh-Perf] 290

7.13.2.2.2 Multiple Scell activation/deactivation [NR\_RRM\_Enh-Perf] 292

7.13.2.2.3 CGI reading requirements with autonomous gap [NR\_RRM\_Enh-Perf] 292

7.13.2.2.4 BWP switching on multiple CCs [NR\_RRM\_Enh-Perf] 293

7.13.2.2.5 Inter-frequency measurement requirement without MG [NR\_RRM\_Enh-Perf] 294

7.13.2.2.6 Mandatory MG patterns [NR\_RRM\_Enh-Perf] 295

7.13.2.2.7 UE-specific CBW change [NR\_RRM\_Enh-Perf] 296

7.13.2.2.8 Spatial relation switch for uplink [NR\_RRM\_Enh-Perf] 296

7.13.2.2.9 Inter-band CA requirement for FR2 UE measurement capability of independent Rx beam [NR\_RRM\_Enh-Perf] 296

7.14 NR RRM requirements for CSI-RS based L3 measurement [NR\_CSIRS\_L3meas] 297

7.14.1 RRM core requirements maintenance (38.133) [NR\_CSIRS\_L3meas-Core] 297

7.14.2 RRM perf. requirements (38.133) [NR\_CSIRS\_L3meas-Perf] 301

7.14.2.1 General [NR\_CSIRS\_L3meas-Perf] 301

7.14.2.1.1 CSI-RSRP requirements [NR\_CSIRS\_L3meas-Perf] 302

7.14.2.1.2 CSI-RSRQ requirements [NR\_CSIRS\_L3meas-Perf] 304

7.14.2.1.3 CSI-SINR requirements [NR\_CSIRS\_L3meas-Perf] 306

7.14.2.2 Test cases [NR\_CSIRS\_L3meas-Perf] 308

7.14.2.2.1 General [NR\_CSIRS\_L3meas-Perf] 308

7.14.2.2.2 Intra-frequency measurement [NR\_CSIRS\_L3meas-Perf] 309

7.14.2.2.3 Inter-frequency measurement [NR\_CSIRS\_L3meas-Perf] 310

7.14.2.2.4 Measurement performance [NR\_CSIRS\_L3meas-Perf] 311

7.15 NR support for high speed train scenario [NR\_HST] 313

7.15.1 RRM requirements maintenance (38.133) [NR\_HST-Core/Perf] 313

7.15.2 Demodulation and CSI requirements Maintenance (38.101-4 / 38.104) [NR\_HST-Perf] 315

7.15.2.1 UE demodulation and CSI requirements [NR\_HST-Perf] 315

7.15.2.2 BS demodulation requirements [NR\_HST-Perf] 317

7.16 NR performance requirement enhancement [NR\_perf\_enh-Perf] 321

7.16.1 UE demodulation and CSI requirements (38.101-4) [NR\_perf\_enh-Perf] 321

7.16.1.1 NR CA PDSCH requirements [NR\_perf\_enh-Perf] 321

7.16.1.2 PMI reporting requirements with larger number of Tx ports [NR\_perf\_enh-Perf] 323

7.16.1.3 FR1 CA and EN-DC power imbalance requirements [NR\_perf\_enh-Perf] 325

7.16.1.4 NR CA CQI reporting requirements [NR\_perf\_enh-Perf] 325

7.16.1.5 Release independent [NR\_perf\_enh-Perf] 326

7.16.2 BS demodulation requirements (38.104) [NR\_perf\_enh-Perf] 326

7.17 Over the air (OTA) base station (BS) testing TR Maintenance [OTA\_BS\_testing-Perf] 326

7.18 2-step RACH for NR [NR\_2step\_RACH-Perf] 327

7.18.1 RRM requirements maintenance (38.133) [NR\_2step\_RACH-Core/Perf] 327

7.18.2 BS Demodulation requirements maintenance (38.104) [NR\_2step\_RACH-Perf] 329

7.18.3 Others [NR\_2step\_RACH-Perf] 332

7.19 R16 NR maintenance [WI code or TEI16] 332

7.19.1 UE transient period capability [TEI16] 332

7.19.2 Transmit diversity and power class related to UL MIMO [TEI16] 333

7.19.2.1 R16 support of transmit diversity [TEI16] 333

7.19.2.2 Power class related to UL MIMO and other related req. (MPR, SEM, etc) [TEI16 or NR\_newRAT-Core] 336

7.19.3 Other UE RF [WI code or TEI16] 337

7.19.4 BS RF [WI code or TEI16] 349

7.19.5 RRM [WI code or TEI16] 352

7.19.6 Demodulation and CSI [WI code or TEI16] 356

7.19.7 NR MIMO OTA test methods (38.827) [FS\_NR\_MIMO\_OTA\_test] 356

8 Rel-16 UE feature list 358

9 Rel-17 spectrum related Work Items for NR 359

9.1 NR intra band Carrier Aggregation for xCC DL/yCC UL including contiguous and non-contiguous spectrum (x>=y) [NR\_CA\_R17\_intra] 359

9.1.1 Rapporteur Input (WID/TR/CR) [NR\_CA\_R17\_intra-Core /Perf] 359

9.1.2 UE RF for FR1 [NR\_CA\_R17\_intra-Core] 360

9.1.3 UE RF for FR2 [NR\_CA\_R17\_intra-Core] 361

9.2 NR inter-band Carrier Aggregation/Dual Connectivity for 2 bands DL with x bands UL (x=1, 2) [NR\_CADC\_R17\_2BDL\_xBUL] 361

9.2.1 Rapporteur Input (WID/TR/CR) [NR\_CADC\_R17\_2BDL\_xBUL-Core/Perf] 361

9.2.2 NR inter band CA without any FR2 band(s) [NR\_CADC\_R17\_2BDL\_xBUL-Core] 362

9.2.3 NR inter band CA with at least one FR2 band [NR\_CADC\_R17\_2BDL\_xBUL-Core] 368

9.3 DC of 1 LTE band and 1 NR band [DC\_R17\_1BLTE\_1BNR\_2DL2UL] 369

9.3.1 Rapporteur Input (WID/TR/CR) [DC\_R17\_1BLTE\_1BNR\_2DL2UL-Core/Perf] 369

9.3.2 EN-DC without FR2 band [DC\_R17\_1BLTE\_1BNR\_2DL2UL-Core] 370

9.3.3 EN-DC with FR2 band [DC\_R17\_1BLTE\_1BNR\_2DL2UL-Core] 373

9.4 DC of 2 LTE band and 1 NR band [DC\_R17\_2BLTE\_1BNR\_3DL2UL] 374

9.4.1 Rapporteur Input (WID/TR/CR) [DC\_R17\_2BLTE\_1BNR\_3DL2UL-Core/Perf] 374

9.4.2 EN-DC without FR2 band [DC\_R17\_2BLTE\_1BNR\_3DL2UL-Core] 374

9.4.3 DMEN-DC with FR2 band [DC\_R17\_2BLTE\_1BNR\_3DL2UL-Core] 383

9.5 DC of 3 LTE band and 1 NR band [DC\_R17\_3BLTE\_1BNR\_4DL2UL] 384

9.5.1 Rapporteur Input (WID/TR/CR) [DC\_R17\_3BLTE\_1BNR\_4DL2UL-Core/Perf] 384

9.5.2 EN-DC without FR2 band [DC\_R17\_3BLTE\_1BNR\_4DL2UL-Core] 384

9.5.3 EN-DC with FR2 band [DC\_R17\_3BLTE\_1BNR\_4DL2UL-Core] 395

9.6 DC of 4 LTE band and 1 NR band [DC\_R17\_4BLTE\_1BNR\_5DL2UL] 395

9.6.1 Rapporteur Input (WID/TR/CR) [DC\_R17\_4BLTE\_1BNR\_5DL2UL-Core/Perf] 395

9.6.2 EN-DC without FR2 band [DC\_R17\_4BLTE\_1BNR\_5DL2UL-Core] 396

9.6.3 EN-DC with FR2 band [DC\_R17\_4BLTE\_1BNR\_5DL2UL-Core] 400

9.7 DC of x bands (x=1,2, 3, 4) LTE inter-band CA and 2 bands NR inter-band CA [DC\_R17\_xBLTE\_2BNR\_yDL2UL] 400

9.7.1 Rapporteur Input (WID/TR/CR) [DC\_R17\_xBLTE\_2BNR\_yDL2UL-Core/Per] 400

9.7.2 EN-DC including NR inter CA without FR2 band [DC\_R17\_xBLTE\_2BNR\_yDL2UL-Core] 401

9.7.3 EN-DC including NR inter CA with FR2 band [DC\_R17\_xBLTE\_2BNR\_yDL2UL-Core] 421

9.8 Band combinations for SA NR supplementary uplink (SUL) 422

9.8.1 Rapporteur Input (WID/TR/CR) [NR\_SUL\_combos\_R17-Core/Per] 422

9.8.2 UE RF [NR\_SUL\_combos\_R17-Core] 423

9.9 NR Inter-band Carrier Aggregation for 3 bands DL with 1 band UL [NR\_CA\_R17\_3BDL\_1BUL] 425

9.9.1 Rapporteur Input (WID/TR/CR) [NR\_CA\_R17\_3BDL\_1BUL-Core/Per] 425

9.9.2 UE RF [NR\_CA\_R17\_3BDL\_1BUL-Core] 425

9.10 NR Inter-band Carrier Aggregation for 4 bands DL with 1 band UL [NR\_CA\_R17\_4BDL\_1BUL] 430

9.10.1 Rapporteur Input (WID/TR/CR) [NR\_CA\_R17\_4BDL\_1BUL-Core/Per] 430

9.10.2 UE RF [NR\_CA\_R17\_4BDL\_1BUL-Core] 431

9.11 NR Inter-band Carrier Aggregation/Dual connectivity for 3 bands DL with 2 bands UL [NR\_CADC\_R17\_3BDL\_2BUL] 431

9.11.1 Rapporteur Input (WID/TR/CR) [NR\_CADC\_R17\_3BDL\_2BUL-Core/Per] 431

9.11.2 UE RF [NR\_CADC\_R17\_3BDL\_2BUL-Core] 432

9.12 DC of x bands (x=1,2) LTE inter-band CA (xDL/xUL) and y bands (y=3-x) NR inter-band CA [DC\_R17\_xBLTE\_yBNR\_3DL3UL] 438

9.12.1 Rapporteur Input (WID/TR/CR) [DC\_R17\_xBLTE\_yBNR\_3DL3UL-Core/Per] 438

9.12.2 UE RF [DC\_R17\_xBLTE\_yBNR\_3DL3UL-Core] 439

9.13 DC of x bands (x=1,2,3) LTE inter-band CA (xDL/1UL) and 3 bands NR inter-band CA (3DL/1UL) [DC\_R17\_xBLTE\_3BNR\_yDL2UL] 439

9.13.1 Rapporteur Input (WID/TR/CR) [DC\_R17\_xBLTE\_3BNR\_yDL2UL -Core/Per] 439

9.13.2 UE RF [DC\_R17\_xBLTE\_3BNR\_yDL2UL-Core] 439

9.14 NR inter-band Carrier Aggregation and Dual connectivity for DL 4 bands and 2UL bands [NR\_CADC\_R17\_4BDL\_2BUL] 446

9.14.1 Rapporteur Input (WID/TR/CR) [NR\_CADC\_R17\_4BDL\_2BUL -Core/Per] 446

9.14.2 UE RF [NR\_CADC\_R17\_4BDL\_2BUL -Core] 446

9.15 NR inter-band CA for 5 bands DL with x bands UL (x=1, 2) [NR\_CADC\_R17\_5BDL\_xBUL\_3DL3UL] 448

9.15.1 Rapporteur Input (WID/TR/CR) [NR\_CADC\_R17\_5BDL\_xBUL -Core/Per] 448

9.15.2 UE RF [NR\_CADC\_R17\_5BDL\_xBUL -Core] 448

9.16 DC of 5 bands LTE inter-band CA (5DL/1L) and 1 NR band (1DL/1UL) [DC\_R17\_5BLTE\_1BNR\_6DL2UL] 448

9.16.1 Rapporteur Input (WID/TR/CR) [DC\_R17\_5BLTE\_1BNR\_6DL2UL-Core/Per] 448

9.16.2 UE RF [DC\_R17\_5BLTE\_1BNR\_6DL2UL-Core] 449

9.17 DC of x bands (x=2,3,4) LTE inter-band CA (xDL/1UL) and 1 NR FR1 band (1DL/1UL) and 1 NR FR2 band (1DL/1UL) [DC\_R17\_xBLTE\_2BNR\_yDL3UL] 449

9.17.1 Rapporteur Input (WID/TR/CR) [DC\_R17\_xBLTE\_2BNR\_yDL3UL-Core/Per] 449

9.17.2 UE RF [DC\_R17\_xBLTE\_2BNR\_yDL3UL-Core] 450

9.18 SAR schemes for UE power class 2 (PC2) for NR inter-band Carrier Aggregation and supplemental uplink (SUL) configurations with 2 bands UL [NR\_SAR\_PC2\_interB\_SUL\_2BUL] 450

9.18.1 General and Rapporteur Input (WID/TR/CR) [NR\_SAR\_PC2\_interB\_SUL\_2BUL-Core/Per] 450

9.18.2 PC2 for inter-band CA [NR\_SAR\_PC2\_interB\_SUL\_2BUL-Core] 451

9.18.3 PC2 for SUL [NR\_SAR\_PC2\_interB\_SUL\_2BUL-Core] 453

9.18.4 Others [NR\_SAR\_PC2\_interB\_SUL\_2BUL-Core] 454

9.19 High power UE (power class 2) for NR inter-band Carrier Aggregation with 2 bands downlink and 2 bands uplink [NR\_PC2\_CA\_R17\_2BDL\_2BUL] 455

9.19.1 Rapporteur Input (WID/TR/CR) [NR\_PC2\_CA\_R17\_2BDL\_2BUL-Core/Per] 455

9.19.2 UE RF [NR\_PC2\_CA\_R17\_2BDL\_2BUL-Core] 455

9.20 High power UE (power class 2) for EN-DC with 1 LTE band + 1 NR TDD band [ENDC\_UE\_PC2\_R17\_NR\_TDD] 456

9.20.1 Rapporteur Input (WID/TR/CR) [ENDC\_UE\_PC2\_R17\_NR\_TDD -Core/Per] 456

9.20.2 UE RF [ENDC\_UE\_PC2\_R17\_NR\_TDD -Core] 457

9.21 Adding channel bandwidth support to existing NR bands [NR\_bands\_R17\_BWs] 458

9.21.1 General and Rapporteur Input (WID/TR/CR) [NR\_bands\_R17\_BWs -Core/Per] 458

9.21.2 UE RF requirement [NR\_bands\_R17\_BWs -Core] 459

9.21.2.1 Reference sensitivity [NR\_bands\_R17\_BWs -Core] 460

9.21.2.2 MPR/A-MPR/NS signaling [NR\_bands\_R17\_BWs -Core] 460

9.21.2.3 others [NR\_bands\_R17\_BWs -Core] 461

9.21.3 BS RF requirement [NR\_bands\_R17\_BWs -Core] 462

9.22 Introduction of channel bandwidths 35MHz and 45MHz for NR [NR\_FR1\_35MHz\_45MHz\_BW] 462

9.22.1 General and Rapporteur Input (WID/TR/CR) [NR\_FR1\_35MHz\_45MHz\_BW-Core/Per] 462

9.22.2 Spectrum utilization [NR\_FR1\_35MHz\_45MHz\_BW-Core] 462

9.22.3 UE RF requirements [NR\_FR1\_35MHz\_45MHz\_BW-Core] 463

9.22.4 BS RF requirements [NR\_FR1\_35MHz\_45MHz\_BW-Core] 465

9.22.5 Others [NR\_FR1\_35MHz\_45MHz\_BW-Core] 467

9.23 Band combinations for Uu and V2X con-current operation [NR\_LTE\_V2X\_PC5\_combos] 467

9.23.1 General and Rapporteur Input (WID/TR/CR) [NR\_LTE\_V2X\_PC5\_combos-Core/Per] 467

9.23.2 UE RF requirement for concurrent operation between NR Uu band and NR PC5 band [NR\_LTE\_V2X\_PC5\_combos-Core] 468

9.23.3 UE RF requirement for concurrent operation between LTE Uu band and NR PC5 band [NR\_LTE\_V2X\_PC5\_combos-Core] 468

9.23.4 UE RF requirement for concurrent operation between NR Uu band and LTE PC5 band [NR\_LTE\_V2X\_PC5\_combos-Core] 469

9.23.5 UE RF requirement for concurrent operation of LTE/NR CA/DC band combinations + PC5 V2X [NR\_LTE\_V2X\_PC5\_combos-Core] 469

9.24 Introduction of FR2 FWA UE with maximum TRP of 23dBm for band n257 and n258 [NR\_FR2\_FWA\_Bn257\_Bn258] 469

9.24.1 UE RF (38.101-2) [NR\_FR2\_FWA\_Bn257\_Bn258-Core] 469

9.24.2 RRM Core requirements (38.133) [NR\_FR2\_FWA\_Bn257\_Bn258-Core] 472

9.24.3 RRM Perf. requirements (38.133) [NR\_FR2\_FWA\_Bn257\_Bn258-Perf] 472

9.24.4 Others [NR\_FR2\_FWA\_Bn257\_Bn258-Core/Perf] 472

9.25 Introduction of NR 47 GHz band [NR\_47GHz\_Band] 473

9.25.1 UE RF (38.101-2) [NR\_47GHz\_Band-Core] 473

9.25.1.1 Peak EIRP and EIRP spherical coverage [NR\_47GHz\_Band-Core] 473

9.25.1.2 Other UE TX requirements [NR\_47GHz\_Band-Core] 474

9.25.1.3 REFSENS and EIS spherical coverage [NR\_47GHz\_Band-Core] 475

9.25.1.4 Other UE RX requirements [NR\_47GHz\_Band-Core] 476

9.25.2 BS RF (38.104) [NR\_47GHz\_Band-Core] 476

9.25.3 RRM (38.133) [NR\_47GHz\_Band-Core] 476

9.25.4 Others [NR\_47GHz\_Band-Core/Perf] 477

9.25.4.1 BS conformance (38.141) [NR\_47GHz\_Band-Perf] 477

9.25.4.2 UE Demod (38.101-4) [NR\_47GHz\_Band-Perf] 478

9.25.4.3 BS Demod (38.104) [NR\_47GHz\_Band-Perf] 479

9.25.4.4 Others [NR\_47GHz\_Band-Core/Perf] 479

9.26 Introduction of NR band n24 [NR\_band\_n24] 480

9.26.1 UE RF (38.101-1) [NR\_band\_n24-Core] 480

9.26.2 BS RF (38.104) [NR\_band\_n24-Core] 480

9.26.3 RRM (38.133) [NR\_band\_n24-Core] 481

9.26.4 Others [NR\_band\_n24-Core/Perf] 481

9.27 Introduction of 1.6 GHz NR SUL band with same uplink frequency range of Band 24 [NR\_SUL\_UL\_n24] 483

9.27.1 UE RF (38.101-1) [NR\_SUL\_UL\_n24-Core] 483

9.27.2 BS RF (38.104) [NR\_SUL\_UL\_n24-Core] 484

9.27.3 RRM (38.133) [NR\_SUL\_UL\_n24-Core] 487

9.27.4 Others [NR\_SUL\_UL\_n24-Core/Perf] 487

9.28 Introduction of NR band n67 [NR\_n67] 487

9.28.1 UE RF (38.101-1) [NR\_n67-Core] 487

9.28.2 BS RF (38.104) [NR\_n67-Core] 487

9.28.3 RRM (38.133) [NR\_n67-Core] 488

9.28.4 Others [NR\_n67-Core/Perf] 488

9.29 Introduction of NR band n85 [NR\_n85] 488

9.29.1 UE RF (38.101-1) [NR\_n85-Core] 488

9.29.2 BS RF (38.104) [NR\_n85-Core] 488

9.29.3 RRM (38.133) [NR\_n85-Core] 489

9.29.4 Others [NR\_n85-Core/Perf] 489

9.30 Introduction of bandwidth combination set 4 (BCS4) for NR [NR\_BCS4] 489

9.30.1 General and Rapporteur Input (WID/TR/CR) [NR\_BCS4-Core] 489

9.30.2 UE RF requirements [NR\_BCS4-Core] 489

9.30.2.1 MSD [NR\_BCS4-Core] 489

9.30.2.2 Others (in case MPR/A-MPR is needed) [NR\_BCS4-Core] 490

9.30.3 Signalling [NR\_BCS4-Core] 490

9.31 Band combination specific requirements for NR intra band UL Carrier Aggregation [] 491

9.31.1 General and Rapporteur Input (WID/TR/CR) [-Core] 491

9.31.2 PC2 UE RF requirements [-Core] 492

9.31.2.1 Maximum output power [-Core] 492

9.31.2.2 A-MPR [-Core] 492

9.31.2.3 others [-Core] 492

9.31.3 PC3 UE RF requirements [-Core] 492

9.32 Additional NR bands for UL-MIMO [NR\_bands\_UL\_MIMO\_PC3\_R17] 492

9.32.1 General and Rapporteur Input (WID/TR/CR) [NR\_bands\_UL\_MIMO\_PC3\_R17-Core] 492

9.32.2 MPR/A-MPR requirement [NR\_bands\_UL\_MIMO\_PC3\_R17-Core] 492

9.32.3 Others [NR\_bands\_UL\_MIMO\_PC3\_R17-Core/Perf] 492

9.33 Down link interruption for band combinations to conduct dynamic Tx Switching [DL\_intrpt\_combos\_TxSW\_R17] 493

9.33.1 General and Rapporteur Input (WID/TR/CR) [DL\_intrpt\_combos\_TxSW\_R17-Core] 493

9.33.2 Determination of inter-band uplink CA and EN-DC combinations for which DL interruption is not allowed [DL\_intrpt\_combos\_TxSW\_R17-Core] 493

9.33.3 Others [DL\_intrpt\_combos\_TxSW\_R17-Core/Perf] 495

9.34 High-power UE operation for use cases in Band n77 and n78 [HPUE\_PC1\_5\_n77\_n78] 495

9.34.1 General [HPUE\_PC1\_5\_n77\_n78-Core] 495

9.34.2 PC1.5 UE RF requirements [HPUE\_PC1\_5\_n77\_n78-Core] 495

9.34.2.1 A-MPR [HPUE\_PC1\_5\_n77\_n78-Core] 496

9.34.2.2 others [HPUE\_PC1\_5\_n77\_n78-Core] 496

9.35 Introduction of lower 6GHz NR unlicensed operation for Europe [NR\_6GHz\_unlic\_EU] 496

9.35.1 General [NR\_6GHz\_unlic\_EU-Core] 496

9.35.2 UE RF requirements [NR\_6GHz\_unlic\_EU-Core] 498

9.35.3 BS RF requirements [NR\_6GHz\_unlic\_EU-Core] 498

9.35.4 Others [NR\_6GHz\_unlic\_EU-Core] 499

10 Reply to ITU-R LS (RP-200042) 499

10.1 Study on IMT parameters for frequency ranges 6.425-7.125GHz and 10.0-10.5GHz [FS\_6425\_10500MHz \_NR] 499

10.1.1 UE parameters 499

10.1.2 BS parameters 501

10.1.3 Coexistence study 502

10.1.3.1 Simulation assumptions 502

10.1.3.2 Downlink 503

10.1.3.3 Uplink 504

10.1.4 Antenna characteristics 505

10.1.5 Relevant information for the sharing and compatibility studies 506

11 Rel-17 non-spectrum related work items for NR 506

11.1 Multiple Input Multiple Output (MIMO) Over-the-Air (OTA) requirements for NR UEs [NR\_MIMO\_OTA] 506

11.1.1 General [NR\_MIMO\_OTA] 506

11.1.2 Performance Requirements [NR\_MIMO\_OTA-Core] 507

11.1.2.1 Performance Requirements for FR1 [NR\_MIMO\_OTA-Core] 507

11.1.2.2 Performance Requirements for FR2 [NR\_MIMO\_OTA-Core] 507

11.1.3 Testing methodologies [NR\_MIMO\_OTA-Core] 508

11.1.3.1 Testing parameters for Performance [NR\_MIMO\_OTA-Core] 508

11.1.3.2 Optimization of test methodologies [NR\_MIMO\_OTA-Core] 509

11.1.3.3 Channel model validation [NR\_MIMO\_OTA-Core] 509

11.2 RF requirements enhancement for NR frequency range 1 (FR1) [NR\_RF\_FR1\_enh] 510

11.2.1 General and work plan [NR\_RF\_FR1\_enh-Core] 510

11.2.2 RF core requirements [NR\_RF\_FR1\_enh-Core] 510

11.2.2.1 UL MIMO configuration for SUL band configurations [NR\_RF\_FR1\_enh-Core] 511

11.2.2.2 2Tx switching between carrier 1 and carrier 2 [NR\_RF\_FR1\_enh-Core] 511

11.2.2.3 Tx switching between 1 carrier on band A and 2 contiguous aggregated carriers on band B [NR\_RF\_FR1\_enh-Core] 512

11.2.2.4 HPUE for TDD intra-band contiguous UL CA [NR\_RF\_FR1\_enh-Core] 513

11.2.2.5 HPUE for TDD intra-band non-contiguous UL CA [NR\_RF\_FR1\_enh-Core] 515

11.3 NR RF requirement enhancements for frequency range 2 (FR2) [NR\_RF\_FR2\_req\_enh2] 516

11.3.1 General and work plan [NR\_RF\_FR2\_req\_enh2-Core] 516

11.3.2 RF core requirements [NR\_RF\_FR2\_req\_enh2-Core] 517

11.3.2.1 Inter-band DL CA enhancements [NR\_RF\_FR2\_req\_enh2-Core] 517

11.3.2.1.1 Applicability of CBM/IBM for different CA configurations [NR\_RF\_FR2\_req\_enh2-Core] 517

11.3.2.1.2 UE requirements for CA configurations CA\_n258A-n260A and CA\_n257A-n259A based on IBM [NR\_RF\_FR2\_req\_enh2-Core] 519

11.3.2.1.3 UE requirements for CA configurations within the same frequency group based on CBM [NR\_RF\_FR2\_req\_enh2-Core] 520

11.3.2.2 Inter-band UL CA [NR\_RF\_FR2\_req\_enh2-Core] 521

11.3.2.2.1 UE requirements for CA configuration CA\_n257A-n259A based on IBM [NR\_RF\_FR2\_req\_enh2-Core] 521

11.3.3 Feasibility study [NR\_RF\_FR2\_req\_enh2-Core] 522

11.3.3.1 Inter-band DL CA enhancements [NR\_RF\_FR2\_req\_enh2-Core] 522

11.3.3.1.1 Feasibility study for CA configurations within same frequency group based on IBM [NR\_RF\_FR2\_req\_enh2-Core] 522

11.3.3.1.2 Feasibility study for CA configurations between different frequency groups based on CBM [NR\_RF\_FR2\_req\_enh2-Core] 522

11.3.3.2 Inter-band UL CA [NR\_RF\_FR2\_req\_enh2-Core] 523

11.3.3.2.1 Feasibility study for CA configurations within same frequency group based on IBM and CBM [NR\_RF\_FR2\_req\_enh2-Core] 523

11.3.3.2.2 Feasibility study for CA configurations between different frequency groups based on CBM [NR\_RF\_FR2\_req\_enh2-Core] 523

11.3.4 UL gaps for self-calibration and monitoring [NR\_RF\_FR2\_req\_enh2-Core] 523

11.3.4.1 Gap use cases and performance evaluation [NR\_RF\_FR2\_req\_enh2-Core] 524

11.3.4.2 Others [NR\_RF\_FR2\_req\_enh2-Core] 525

11.3.5 RRM core requirements [NR\_RF\_FR2\_req\_enh2-Core] 525

11.3.5.1 Inter-band DL CA enhancements [NR\_RF\_FR2\_req\_enh2-Core] 526

11.3.5.2 Inter-band UL CA [NR\_RF\_FR2\_req\_enh2-Core] 527

11.4 Further RRM enhancement for NR and MR-DC [NR\_RRM\_enh2] 528

11.4.1 General and work plan [NR\_RRM\_enh2-Core] 528

11.4.2 RRM core requirements [NR\_RRM\_enh2-Core] 528

11.4.2.1 SRS antenna port switching [NR\_RRM\_enh2-Core] 528

11.4.2.2 HO with PSCell [NR\_RRM\_enh2-Core] 530

11.4.2.3 PUCCH SCell activation/deactivation [NR\_RRM\_enh2-Core] 532

11.5 NR and MR-DC measurement gap enhancements [NR\_MG\_enh] 534

11.5.1 General and work plan [NR\_MG\_enh-Core] 534

11.5.2 RRM core requirements [NR\_MG\_enh-Core] 534

11.5.2.1 Pre-configured MG pattern(s) [NR\_MG\_enh-Core] 534

11.5.2.2 Multiple concurrent and independent MG patterns [NR\_MG\_enh-Core] 537

11.5.2.3 Network Controlled Small Gap [NR\_MG\_enh-Core] 539

11.6 Enhancement for NR high speed train scenario in FR1 [NR\_HST\_FR1\_enh-Core] 541

11.6.1 General and work plan [NR\_HST\_FR1\_enh-Core] 541

11.6.2 RRM core requirements [NR\_HST\_FR1\_enh-Core] 541

11.6.2.1 UE RRM core requirements for CA scenario [NR\_HST\_FR1\_enh-Core] 541

11.6.3 UE demodulation requirements (38.101-4) [NR\_HST\_FR1\_enh-Perf] 543

11.6.3.1 General [NR\_HST\_FR1\_enh-Perf] 543

11.6.3.2 PDSCH requirements for CA scenarios [NR\_HST\_FR1\_enh-Perf] 543

11.6.3.3 Enhanced transmission schemes [NR\_HST\_FR1\_enh-Perf] 544

11.7 NR support for high speed train scenario in FR2 [NR\_HST\_FR2\_enh] 545

11.7.1 General and work plan [NR\_HST\_FR2\_enh-Core] 545

11.7.2 High speed train deployment scenario in FR2 [NR\_HST\_FR2\_enh-Core] 546

11.7.3 UE RF core requirements [NR\_HST\_FR2\_enh-Core] 547

11.7.4 RRM core requirements [NR\_HST\_FR2\_enh-Core] 548

11.8 Solutions for NR to support non-terrestrial networks (NTN) [NR\_NTN\_solutions] 550

11.8.1 General and work plan [NR\_NTN\_solutions-Core] 550

11.8.2 Use cases, deployment scenarios, and regulatory information [NR\_NTN\_solutions-Core] 550

11.8.3 Coexistence aspects [NR\_NTN\_solutions-Core] 552

11.8.3.1 Simulation assumptions [NR\_NTN\_solutions-Core] 552

11.8.3.2 UE requirements aspects [NR\_NTN\_solutions-Core] 553

11.8.3.3 BS requirements aspects [NR\_NTN\_solutions-Core] 553

11.8.4 RRM core requirements [NR\_NTN\_solutions-Core] 554

11.8.4.1 General [NR\_NTN\_solutions-Core] 555

11.8.4.2 Timing requirements [NR\_NTN\_solutions-Core] 555

11.8.4.3 Measurement requirements [NR\_NTN\_solutions-Core] 556

11.9 UE Power Saving Enhancements [NR\_UE\_pow\_sav\_enh] 557

11.9.1 General and work plan [NR\_UE\_pow\_sav\_enh-Core] 557

11.9.2 UE measurements relaxation for RLM and/or BFD [NR\_UE\_pow\_sav\_enh-Core] 558

11.10 NR Sidelink enhancement [NRSL\_enh] 561

11.10.1 General and work plan [NRSL\_enh] 561

11.10.2 Spectrum request for SL operation [NRSL\_enh-Core] 561

11.10.3 UE RF requirements for NR SL enhancement [NRSL\_enh-Core] 562

11.10.3.1 TX requirements [NRSL\_enh-Core] 562

11.10.3.2 RX requirements [NRSL\_enh-Core] 562

11.10.4 Partially used SL operation with NR Uu operating bands [NRSL\_enh-Core] 563

11.10.4.1 Operating scenarios for partially used SL operation [NRSL\_enh-Core] 563

11.10.4.2 Synchronous operation between NR Uu and NR SL in an operating band [NRSL\_enh-Core] 563

11.10.4.3 Others [NRSL\_enh-Core] 564

11.10.5 High power UE(PC2) for SL [NRSL\_enh-Core] 564

11.10.5.1 TX requirements [NRSL\_enh-Core] 565

11.10.5.2 RX requirements [NRSL\_enh-Core] 565

11.10.6 Other RF/general requirements for New SL enhancement [NRSL\_enh-Core] 565

11.11 NR repeater 566

11.11.1 General and work plan [NR\_repeaters-Core] 566

11.11.2 Conductive RF core requirements [NR\_repeaters-Core] 568

11.11.2.1 Transmitted power related requirements [NR\_repeaters-Core] 568

11.11.2.2 Emission requirements [NR\_repeaters-Core] 569

11.11.2.3 Others [NR\_repeaters-Core] 569

11.11.3 Radiated RF core requirements 570

11.11.3.1 Transmitted power related requirements [NR\_repeaters-Core] 570

11.11.3.2 Emission requirements [NR\_repeaters-Core] 571

11.11.3.3 Others [NR\_repeaters-Core] 571

11.11.4 EMC core requirements [NR\_repeaters-Core] 571

12 Rel-17 Study Items for NR 573

12.1 Study on enhanced test methods for FR2 in NR [FS\_FR2\_enhTestMethods] 573

12.1.1 General [FS\_FR2\_enhTestMethods] 573

12.1.2 Test methodology for high DL power and low UL power test cases [FS\_FR2\_enhTestMethods] 573

12.1.3 Polarization basis mismatch [FS\_FR2\_enhTestMethods] 574

12.1.4 Enhanced test methods for inter-band (FR2+FR2) CA [FS\_FR2\_enhTestMethods] 575

12.1.5 Extreme temperature conditions [FS\_FR2\_enhTestMethods] 576

12.1.6 Enhanced test methods for FR2 DL 256QAM RF [FS\_FR2\_enhTestMethods] 577

12.1.7 Test time reduction [FS\_FR2\_enhTestMethods] 577

12.1.8 Testability for band n262 [FS\_FR2\_enhTestMethods] 579

12.1.8.1 Extension of frequency applicability of permitted methods in 38.810 [FS\_FR2\_enhTestMethods] 579

12.1.8.2 Extension of frequency applicability of enhancement objectives 1-6 [FS\_FR2\_enhTestMethods] 579

12.2 Study on supporting NR from 52.6 GHz to 71 GHz [FS\_NR\_52\_to\_71GHz] 579

12.2.1 Numerology, Channel BW [FS\_NR\_52\_to\_71GHz] 579

12.2.1.1 General [FS\_NR\_52\_to\_71GHz] 580

12.2.1.2 General [FS\_NR\_52\_to\_71GHz] 581

12.2.1.3 Phase noise [FS\_NR\_52\_to\_71GHz] 582

12.2.2 BS aspect [FS\_NR\_52\_to\_71GHz] 583

12.2.3 UE aspect [FS\_NR\_52\_to\_71GHz] 584

12.2.4 Others [FS\_NR\_52\_to\_71GHz] 585

12.3 Study on Efficient utilization of licensed spectrum that is not aligned with existing NR channel bandwidths [FS\_NR\_eff\_BW\_util] 587

12.3.1 General and work plan [FS\_NR\_eff\_BW\_util] 587

12.3.2 Input on operator licensed channel bandwidths in FR1 that do not align with existing NR channel bandwidths [FS\_NR\_eff\_BW\_util] 587

12.3.3 Evaluation of use of larger channel bandwidths than operator licensed bandwidth [FS\_NR\_eff\_BW\_util] 587

12.3.4 Evaluation of use of overlapping UE channel bandwidths (from both UE and network perspective) [FS\_NR\_eff\_BW\_util] 588

12.3.4.1 UE perspective [FS\_NR\_eff\_BW\_util] 588

12.3.4.2 Network perspective [FS\_NR\_eff\_BW\_util] 589

12.3.5 Others [FS\_NR\_eff\_BW\_util] 589

12.4 Study on extended 600MHz NR band [FS\_NR\_600MHz\_ext] 589

12.4.1 General 589

12.4.2 Regulatory study 590

12.4.3 Coexistence study 590

12.4.4 Study on frequency arrangements (such as options B1 and B2) 591

12.4.5 Others 594

12.5 Study on high power UE (power class 2) for one NR FDD band [FS\_NR\_PC2\_UE\_FDD] 594

12.5.1 General 594

12.5.2 Scheme(s) to comply with the SAR limits 595

12.5.3 Interference issues 596

12.5.4 UE implementation issues 596

12.5.5 System performance evaluations 596

13 Rel-17 Work Items for LTE 597

13.1 LTE inter-band Carrier Aggregation for 2 bands DL with 1 band UL [LTE\_CA\_R17\_2BDL\_1BUL] 597

13.1.1 Rapporteur Input (WID/TR/CR) [LTE\_CA\_R17\_2BDL\_1BUL-Core/Perf] 597

13.1.2 UE RF with harmonic, close proximity and isolation issues [LTE\_CA\_R17\_2BDL\_1BUL-Core] 598

13.1.3 UE RF without specific issues [LTE\_CA\_R17\_2BDL\_1BUL-Core] 598

13.2 LTE inter-band Carrier Aggregation for 3 bands DL with 1 band UL [LTE\_CA\_R17\_3BDL\_1BUL] 599

13.2.1 Rapporteur Input (WID/TR/CR) [LTE\_CA\_R17\_3BDL\_1BUL-Core/Perf] 599

13.2.2 UE RF with harmonic, close proximity and isolation issues [LTE\_CA\_R17\_3BDL\_1BUL-Core] 600

13.2.3 UE RF without specific issues [LTE\_CA\_R17\_3BDL\_1BUL-Core] 601

13.3 LTE inter-band Carrier Aggregation for x bands DL (x=4, 5) with 1 band UL [LTE\_CA\_R17\_xBDL\_1BUL] 602

13.3.1 Rapporteur Input (WID/TR/CR) [LTE\_CA\_R17\_xBDL\_1BUL-Core] 603

13.3.2 UE RF with 4 LTE bands CA [LTE\_CA\_R17\_xBDL\_1BUL-Core] 603

13.3.3 UE RF with 5 LTE bands CA [LTE\_CA\_R17\_xBDL\_1BUL-Core] 607

13.4 LTE inter-band Carrier Aggregation for 2 bands DL with 2 band UL [LTE\_CA\_R17\_2BDL\_2BUL] 608

13.4.1 Rapporteur Input (WID/TR/CR) [LTE\_CA\_R17\_2BDL\_2BUL-Core] 608

13.4.2 UE RF with harmonic, close proximity and isolation issues [LTE\_CA\_R17\_2BDL\_2BUL-Core] 609

13.4.3 UE RF without specific issues [LTE\_CA\_R17\_2BDL\_2BUL-Core] 609

13.5 LTE inter-band Carrier Aggregation for x bands DL (x= 3, 4, 5) with 2 band UL [LTE\_CA\_R17\_xBDL\_2BUL] 609

13.5.1 Rapporteur Input (WID/TR/CR) [LTE\_CA\_R17\_xBDL\_2BUL-Core] 609

13.5.2 UE RF with MSD [LTE\_CA\_R17\_xBDL\_2BUL-Core] 610

13.5.3 UE RF without MSD [LTE\_CA\_R17\_xBDL\_2BUL-Core] 610

13.6 RRM for LTE CA basket WIs [LTE\_CA\_R17\_xxxx] 611

13.6.1 RRM Core (36.133) [LTE\_CA\_R17\_xxxx-Core] 611

13.6.2 RRM Perf (36.133) [LTE\_CA\_R17\_xxxx-Perf] 611

13.7 New WID on Additional LTE bands for UE category M1&M2 and/or NB1&NB2 in Rel-17 [LTE\_bands\_R17\_M1\_M2\_NB1\_NB2] 611

13.7.1 Rapporteur Input (WID/TR/CR) [LTE\_bands\_R17\_M1\_M2\_NB1\_NB2-Core] 611

13.7.2 RF [LTE\_bands\_R17\_M1\_M2\_NB1\_NB2-Core] 614

13.7.3 Others [LTE\_bands\_R17\_M1\_M2\_NB1\_NB2-Perf] 614

13.8 Modification of LTE Band 24 specifications to comply with updated regulatory emission limits [LTE\_B24\_mod] 615

13.8.1 General and rapporteur input [LTE\_B24\_mod-Core] 615

13.8.2 UE RF [LTE\_B24\_mod-Core] 615

13.8.3 BS RF [LTE\_B24\_mod-Core] 617

13.8.4 RRM and others [LTE\_B24\_mod-Core/Perf] 621

14 Rel-17 Study Items for LTE 626

14.1 High-power UE operation for fixed-wireless/vehicle-mounted use cases in LTE bands 5 and 12 and NR band n71 [FS\_LTE\_NR\_HPUE\_FWVM] 626

14.1.1 General 626

14.1.2 Coexistence study 627

14.1.3 UE RF 627

15 Liaison and output to other groups 628

15.1 R17 related 628

15.2 Others 631

16 Revision of the Work Plan 631

16.1 Simplification of band combinations in RAN4 specifications 631

16.2 R17 new proposals 633

16.2.1 Spectrum related 633

16.2.2 Non-spectrum related 635

16.3 Others 637

17 Any other business 637

18 Close of the E-meeting 638

## 1 Opening of the E-meeting

The Chairman Steven Chen (Apple) opened the meeting on RAN4 reflector on 25/01/2021.

**Intellectual Property Rights Policy**

The attention of the delegates to the meeting of this Technical Specification Group was drawn to the fact that 3GPP Individual Members have the obligation under the IPR Policies of their respective Organizational Partners to inform their respective Organizational Partners of Essential IPRs they become aware of.

The delegates were asked to take note that they were thereby invited:

- to investigate whether their organization or any other organization owns IPRs which were, or were likely to become Essential in respect of the work of 3GPP.

- to notify their respective Organizational Partners of all potential IPRs, e.g., for ETSI, by means of the IPR Information Statement and the Licensing declaration forms.

**Statement regarding competition law**

The attention of the delegates to the meeting was drawn to the fact that 3GPP activities were subject to all applicable antitrust and competition laws and that compliance with said laws was therefore required by any participant of the meeting, including the Chairman and Vice-Chairmen and were invited to seek any clarification needed with their legal counsel. The leadership would conduct the present meeting with impartiality and in the interests of 3GPP. Delegates were reminded that timely submission of work items in advance of TSG/WG meetings was important to allow for full and fair consideration of such matters.

**Meeting Arrangements**

The meeting was conducted on three parallel sessions; Main session, RRM session and BS RF Test Demod session. The Main session was chaired by RAN4 Chairman Steven Chen (Apple), RRM session was chaired by RAN4 Vice Chairman Andrey Chervyakov (Intel) and BS RF Test Demod session was chaired by RAN4 ViceChairman Haijie Qiu (Samsung). The sessions were further broken down into separate email threads to address specific technical topics lead by assigned discussion moderators. Webinar sessions were used to summarize progress, resolve controversial issues and decide way forward.

## 2 Approval of the agenda

**R4-2100001 Agenda for RAN4 #98-e**

*Type: agenda For: Approval  
 Source: RAN4 Chairman (Apple)*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100002 RAN4#98-e E-meeting Arrangements and Guidelines**

*Type: other For: Approval  
 Source: RAN4 Chairman (Apple)*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100003 RAN4#97-e Meeting Report**

*Type: report For: Approval  
 Source: ETSI MCC*

**Discussion:**

[report of discussion]

**Decision: Approved.**

## 3 Letters / reports from other groups / meetings

**R4-2100004 Test methods for over-the-air TRP field measurements of unwanted emissions from IMT radio equipment utilizing active antennas**

*Type: LS in For: Information  
 Original outgoing LS: -, to -, cc -  
 Source: ITU Radiocommunication Study Groups Working Party 1C*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100005 LS on updated Rel-16 RAN1 UE features lists for LTE**

*Type: LS in For: Information  
 Original outgoing LS: R1-2009351, to RAN2, cc RAN4  
 Source: RAN1*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100006 Reply LS on definition of NR V2X con-current operation**

*Type: LS in For: Information  
 Original outgoing LS: R1-2009491, to RAN4, cc RAN2  
 Source: RAN1*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100007 LS reply on cell-grouping UE capability for synchronous NR-DC**

*Type: LS in For: Information  
 Original outgoing LS: R1-2009570, to RAN2, cc RAN4  
 Source: RAN1*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100008 Reply LS on DCI-based multiple BWP switch simultaneously**

*Type: LS in For: Information  
 Original outgoing LS: R1-2009575, to RAN4, cc -  
 Source: RAN1*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100009 Reply LS on UE capability xDD differentiation for SUL/SDL bands**

*Type: LS in For: Information  
 Original outgoing LS: R1-2009576, to RAN2, cc -  
 Source: RAN1*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100010 LS on updated Rel-16 RAN1 UE features lists for NR**

*Type: LS in For: Information  
 Original outgoing LS: R1-2009586, to RAN2, RAN4, cc -  
 Source: RAN1*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100011 Reply LS on UE capability for V2X**

*Type: LS in For: Information  
 Original outgoing LS: R1-2009635, to RAN2, cc RAN4  
 Source: RAN1*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100012 LS on uplink Tx switching**

*Type: LS in For: Information  
 Original outgoing LS: R1-2009676, to RAN2, cc RAN4  
 Source: RAN1*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100013 Reply LS on Clarification of UE behavior after receiving the MAC CE deactivation command for semi-persistent CSI reporting in NR-U**

*Type: LS in For: Information  
 Original outgoing LS: R1-2009689, to RAN4, cc -  
 Source: RAN1*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100014 LS on PUCCH and PUSCH repetition**

*Type: LS in For: Information  
 Original outgoing LS: R1-2009784, to RAN4, cc -  
 Source: RAN1*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100015 LS on temporary RS for efficient SCell activation in NR CA**

*Type: LS in For: Information  
 Original outgoing LS: R1-2009798, to RAN4, cc -  
 Source: RAN1*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100016 LS on Beam switching gaps for Multi-TRP UL transmission**

*Type: LS in For: Information  
 Original outgoing LS: R1-2009807, to RAN4, cc -  
 Source: RAN1*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100017 Reply LS on power control for NR-DC**

*Type: LS in For: Information  
 Original outgoing LS: R2-2011246, to RAN4, cc RAN1  
 Source: RAN2*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100018 LS on support of NUL and SUL during DAPS handover**

*Type: LS in For: Information  
 Original outgoing LS: R1-2009682, to RAN2, cc RAN4  
 Source: RAN1*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100019 Reply LS on IAB-MT feature list**

*Type: LS in For: Information  
 Original outgoing LS: R2-2011273, to RAN4, cc -  
 Source: RAN2*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100020 LS on ambiguity in deciding TL,C**

*Type: LS in For: Information  
 Original outgoing LS: R5-206676, to RAN4, cc -  
 Source: RAN5*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100021 LS on Frequency Bands for testing of A-GNSS Sensitivity requirements in NR and LTE**

*Type: LS in For: Information  
 Original outgoing LS: R5-206900, to RAN4, cc PTCRB, PVG, GCF CAG, CTIA OTA Working Group  
 Source: RAN5*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100022 Use of the 252-296 GHz frequency range by land-mobile service applications**

*Type: LS in For: Information  
 Original outgoing LS: -, to RAN4, cc -  
 Source: ITU-R WP 5A*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100023 LS on single UL operation**

*Type: LS in For: Information  
 Original outgoing LS: RP-202932, to RAN2. RAN4, cc -  
 Source: RAN*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100024 Reply LS to APT\_LS200918 = RP-202143 on Frequency Arrangements for IMT in the Band 470- 703 MHz**

*Type: LS in For: Information  
 Original outgoing LS: RP-202934, to Asia-Pacific Telecommunity (APT) Wireless Group, cc RAN4  
 Source: RAN*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100025 LS on BCS reporting and support for intra-band EN-DC band combinations**

*Type: LS in For: Information  
 Original outgoing LS: RP-202935, to RAN2, RAN4, cc -  
 Source: RAN*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100026 LS on Use of Inclusive Language in 3GPP**

*Type: LS in For: Information  
 Original outgoing LS: SP-201143, to RAN4, cc -  
 Source: SA*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100027 LS on OTA LTE UE TRP and TRS Requirements**

*Type: LS in For: Information  
 Original outgoing LS: -, to RAN, GCF Steering Group (SG), GSMA, NGMN, PTCRB, CTIA, cc RAN5, RAN4, GCF Conformance Agreement Group (CAG), GCF Performance Agreement Group (PAG), GSMA Terminal Steering Group (TSG), GSMA Networks Group (NG)  
 Source: MSG TFES*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100028 Reply LS on questions to RAN WGs on dual Radio UE (2Rx/2Tx or 2Rx/1Tx) support for simultaneous communication with both SNPN and PLMN**

*Type: other For: Information  
 Source: RAN2*

**Discussion:**

[report of discussion]

**Decision: Noted.**

## 4 Rel-15 New radio access technology

### 4.1 System Parameters Maintenance [NR\_newRAT-Core]

**R4-2102949 Email discussion summary for [98e][101] NR\_NewRAT\_SysParameters**

*Type: other For: Information  
 Source: Moderator (ZTE)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103291.**

**R4-2103291 Email discussion summary for [98e][101] NR\_NewRAT\_SysParameters**

*Type: other For: Information  
 Source: Moderator (ZTE)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2102197 CR to TS38.101-1: Correction on the Aggregated Channel Bandwidth**

*Type: CR For: Agreement  
 38.101-1 v15.12.0 CR-0675 Cat: F (Rel-15)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103116.**

**R4-2103116 CR to TS38.101-1: Correction on the Aggregated Channel Bandwidth**

*Type: CR For: Agreement  
 38.101-1 v15.12.0 CR-0675 Cat: F (Rel-15)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102198 CR to TS38.101-1: Correction on the Aggregated Channel Bandwidth**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0676 Cat: A (Rel-16)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102199 CR to TS38.101-1: Correction on the Aggregated Channel Bandwidth**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0677 Cat: A (Rel-17)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102200 CR to TS38.104: Correction on the Aggregated Channel Bandwidth**

*Type: CR For: Agreement  
 38.104 v15.12.0 CR-0292 Cat: F (Rel-15)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103117.**

**R4-2103117 CR to TS38.104: Correction on the Aggregated Channel Bandwidth**

*Type: CR For: Agreement  
 38.104 v15.12.0 CR-0292 Cat: F (Rel-15)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102201 CR to TS38.104: Correction on the Aggregated Channel Bandwidth**

*Type: CR For: Agreement  
 38.104 v16.6.0 CR-0293 Cat: A (Rel-16)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102202 CR to TS38.104: Correction on the Aggregated Channel Bandwidth**

*Type: CR For: Agreement  
 38.104 v17.0.0 CR-0294 Cat: A (Rel-17)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

### 4.2 UE RF requirements maintenance [NR\_newRAT]

#### 4.2.1 [FR1] Maintenance for 38.101-1 [NR\_newRAT-Core]

**R4-2102950 Email discussion summary for [98e][102] NR\_NewRAT\_UE\_RF\_Part\_1**

*Type: other For: Information  
 Source: Moderator (Nokia)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103292.**

**R4-2103292 Email discussion summary for [98e][102] NR\_NewRAT\_UE\_RF\_Part\_1**

*Type: other For: Information  
 Source: Moderator (Nokia)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103118 LS on further clarification of simultaneous Rx/Tx capability**

*Type: LS out For: Approval  
 Source: Apple*

**Abstract:**

**Discussion:**

**Decision: Withdrawn.**

**R4-2103120 Way forward on applicability of additional emission requirement to CA/DC**

*Type: other For: Approval  
 Source: SoftBank*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103121 Way forward on WF on Improvement of UL RMC tables**

*Type: other For: Approval  
 Source: Rohde & Schwarz*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2100138 Reply LS on ambiguity in deciding TL,C**

*Type: other For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100139 CR REL15 on ambiguity in deciding TL,C**

*Type: CR For: Agreement  
 38.101-1 v15.12.0 CR-0595 Cat: F (Rel-15)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2100140 CR REL16 on ambiguity in deciding TL,C**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0596 Cat: A (Rel-16)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100141 CR REL17 on ambiguity in deciding TL,C**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0597 Cat: A (Rel-17)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100164 IBE\_mask\_almost\_contiguous\_CR\_rel15**

*Type: CR For: Agreement  
 38.101-1 v15.12.0 CR-0602 Cat: F (Rel-15)  
  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2100165 IBE\_mask\_almost\_contiguous\_CR\_rel16-mirror**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0603 Cat: A (Rel-16)  
  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102510 IBE requirement for almost contiguous allocations**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0693 Cat: A (Rel-17)  
  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100392 CR for TS38 101-1 Rel-15 Correction for definition of P-MPR**

*Type: CR For: Agreement  
 38.101-1 v15.12.0 CR-0610 Cat: F (Rel-15)  
  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100393 CR for TS38 101-1 Rel-16 Correction for definition of P-MPR**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0611 Cat: A (Rel-16)  
  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100394 CR for TS38 101-1 Rel-17 Correction for definition of P-MPR**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0612 Cat: A (Rel-17)  
  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100395 CR for TS38 101-1 Rel-16 Correction of condition for MPR and delta MPR**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0613 Cat: F (Rel-16)  
  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103122.**

**R4-2103122 CR for TS38 101-1 Rel-16 Correction of condition for MPR and delta MPR**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0613 Cat: F (Rel-16)  
  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103389.**

**R4-2103389 CR for TS38 101-1 Rel-16 Correction of condition for MPR and delta MPR**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0613 Cat: F (Rel-16)  
  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100396 CR for TS38 101-1 Rel-17 Correction of condition for MPR and delta MPR**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0614 Cat: A (Rel-17)  
  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100524 On simultaneous TxRx for NR-DC**

*Type: discussion For: Discussion  
 Source: Apple Inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101005 On applicability of additional emission requirement to CA/DC**

*Type: other For: Approval  
 38.101-1 v..  
 Source: SoftBank Corp.*

**Abstract:**

This contribution is intended to propose how to handle additional emission requirements in CA/DC context. Note that a part of proposals is related to 38.101-3

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101174 IBE mask for almost contiguous allocations**

*Type: other For: Approval  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101713 Correction to applicability of simultaneous RX/TX**

*Type: CR For: Agreement  
 38.101-1 v15.12.0 CR-0643 Cat: F (Rel-15)  
  
 Source: Ericsson*

**Abstract:**

CR to correct the applicability of simultaneous RxTx for inter-band CA

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103119.**

**R4-2103119 Correction to applicability of simultaneous RX/TX**

*Type: CR For: Agreement  
 38.101-1 v15.12.0 CR-0643 Cat: F (Rel-15)  
  
 Source: Ericsson*

**Abstract:**

CR to correct the applicability of simultaneous RxTx for inter-band CA

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2101714 Correction to applicability of simultaneous RX/TX**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0644 Cat: A (Rel-16)  
  
 Source: Ericsson*

**Abstract:**

CR to correct the applicability of simultaneous RxTx for inter-band CA

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2101715 Correction to the lower limit of Pumax**

*Type: CR For: Agreement  
 38.101-1 v15.12.0 CR-0645 Cat: F (Rel-15)  
  
 Source: Ericsson*

**Abstract:**

CR to correct the lower limit (tolerance) of Pumax

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2101716 Correction to the lower limit of Pumax**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0646 Cat: A (Rel-16)  
  
 Source: Ericsson*

**Abstract:**

CR to correct the lower limit (tolerance) of Pumax

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2101717 Draft Reply LS on ambiguity in deciding TL,C**

*Type: LS out For: Approval  
 to RAN5  
 Source: Ericsson*

**Abstract:**

Draft Reply LS to RAN5 with proposals to modify the lower limit of the Pumax

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101743 CR on simultaneous Tx-Rx for CA and SUL**

*Type: CR For: Agreement  
 38.101-1 v15.12.0 CR-0649 Cat: F (Rel-15)  
  
 Source: OPPO*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2101744 CR on simultaneous Tx-Rx for CA and SUL (R16 mirror CR)**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0650 Cat: A (Rel-16)  
  
 Source: OPPO*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2101745 CR on simultaneous Tx-Rx for CA and SUL (R17 mirror CR)**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0651 Cat: A (Rel-17)  
  
 Source: OPPO*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2101811 Discussion and reply draft LS on ambiguity in deciding TL,C**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101947 Simplification of n70**

*Type: CR For: Agreement  
 38.101-1 v15.12.0 CR-0661 Cat: F (Rel-15)  
  
 Source: Dish Network*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101988 Simplification of n70**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0664 Cat: A (Rel-16)  
  
 Source: Dish Network*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101992 Simplification of n70**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0665 Cat: A (Rel-17)  
  
 Source: Dish Network*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101989 CR for 38.307 to delete the redundant information "duplex mode" for band combinations(Rel-15)**

*Type: CR For: Agreement  
 38.307 v15.7.0 CR-0052 Cat: F (Rel-15)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2101990 CR for 38.307 to delete the redundant information "duplex mode" for band combinations(Rel-16)**

*Type: CR For: Agreement  
 38.307 v16.5.0 CR-0053 Cat: A (Rel-16)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2101991 CR for 38.307 to delete the redundant information "duplex mode" for band combinations(Rel-17)**

*Type: CR For: Agreement  
 38.307 v17.0.0 CR-0054 Cat: A (Rel-17)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102091 Improvement of UL RMC tables**

*Type: discussion For: Approval  
 Source: Rohde & Schwarz*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102143 CR to TS38.101-1: Correction on applicability of minimum requirements**

*Type: CR For: Agreement  
 38.101-1 v15.12.0 CR-0667 Cat: F (Rel-15)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision:** The document was **withdrawn**.

**R4-2102194 CR to TS38.101-1: Correction on applicability of minimum requirements**

*Type: CR For: Agreement  
 38.101-1 v15.12.0 CR-0672 Cat: F (Rel-15)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102195 CR to TS38.101-1: Correction on applicability of minimum requirements**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0673 Cat: A (Rel-16)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102196 CR to TS38.101-1: Correction on applicability of minimum requirements**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0674 Cat: A (Rel-17)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102376 CR for TS 38.101-1 correction CR for simultaneous TxRx operation (R15)**

*Type: CR For: Agreement  
 38.101-1 v15.12.0 CR-0682 Cat: F (Rel-15)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2102377 CR for TS 38.101-1: correction CR for simultaneous Tx/Rx operation (R16)**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0683 Cat: A (Rel-16)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102703 CR for TS 38.101-1: correction CR for simultaneous Tx/Rx operation (R17)**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0712 Cat: A (Rel-17)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102595 CR for TS 38.101-1: Cleanup for spurious emissions for UE co-existence table**

*Type: CR For: Agreement  
 38.101-1 v15.12.0 CR-0696 Cat: F (Rel-15)  
  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102597 CR for TS 38.101-1: Correction to FR1 time mask for SRS antenna switching**

*Type: CR For: Agreement  
 38.101-1 v15.12.0 CR-0697 Cat: F (Rel-15)  
  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103123.**

**R4-2103123 CR for TS 38.101-1: Correction to FR1 time mask for SRS antenna switching**

*Type: CR For: Agreement  
 38.101-1 v15.12.0 CR-0697 Cat: F (Rel-15)  
  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103388.**

**R4-2103388 CR for TS 38.101-1: Correction to FR1 time mask for SRS antenna switching**

*Type: CR For: Agreement  
 38.101-1 v15.12.0 CR-0697 Cat: F (Rel-15)  
  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102598 CR for TS 38.101-1: Correction to FR1 time mask for SRS antenna switching**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0698 Cat: A (Rel-16)  
  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102599 CR for TS 38.101-1: Correction to FR1 time mask for SRS antenna switching**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0699 Cat: A (Rel-17)  
  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102658 CR to 38.101-1: UL MIMO requirements update**

*Type: CR For: Agreement  
 38.101-1 v15.12.0 CR-0705 Cat: F (Rel-15)  
  
 Source: Qualcomm Incorporated, Lenovo, Motorola Mobility*

**Abstract:**

Make 2L EVM requirement consistent with RAN1

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103355.**

**R4-2103355 CR to 38.101-1: UL MIMO requirements update**

*Type: CR For: Agreement  
 38.101-1 v15.12.0 CR-0705 Cat: F (Rel-15)  
  
 Source: Qualcomm Incorporated, Lenovo, Motorola Mobility*

**Abstract:**

Make 2L EVM requirement consistent with RAN1

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2102659 CR to 38.101-1: UL MIMO requirements update**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0706 Cat: A (Rel-16)  
  
 Source: Qualcomm Incorporated, Lenovo, Motorola Mobility*

**Abstract:**

Make 2L EVM requirement consistent with RAN1

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102660 CR to 38.101-1: UL MIMO requirements update**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0707 Cat: A (Rel-17)  
  
 Source: Qualcomm Incorporated, Lenovo, Motorola Mobility*

**Abstract:**

Make 2L EVM requirement consistent with RAN1

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102661 On FR1 2L UL EVM Requirement**

*Type: discussion For: Agreement  
 Source: Qualcomm Incorporated, Lenovo, Motorola Mobility*

**Abstract:**

2L EVM calculation detail, impact to other tests in transmit modulation quality section

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 4.2.2 [FR2] Maintenance for 38.101-2 [NR\_newRAT-Core]

**R4-2102951 Email discussion summary for [98e][103] NR\_NewRAT\_UE\_RF\_Part\_2**

*Type: other For: Information  
 Source: Moderator (Apple)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103293.**

**R4-2103293 Email discussion summary for [98e][103] NR\_NewRAT\_UE\_RF\_Part\_2**

*Type: other For: Information  
 Source: Moderator (Apple)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103124 LS on SCell dropping**

*Type: LS out For: Approval  
 Source: OPPO*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103410.**

**R4-2103410 LS on SCell dropping**

*Type: LS out For: Approval  
 Source: OPPO*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2100085 Clarification on NS\_203 support by n258**

*Type: CR For: Agreement  
 38.101-2 v15.12.0 CR-0313 Cat: F (Rel-15)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

Clarification on NS\_203 support by n258

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103125.**

**R4-2103125 Removal of a remaining NS\_201 related requirement**

*Type: CR For: Agreement  
 38.101-2 v15.12.0 CR-0313 Cat: F (Rel-15)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103370.**

**R4-2103370 Removal of a remaining NS\_201 related requirement**

*Type: CR For: Agreement  
 38.101-2 v15.12.0 CR-0313 Cat: F (Rel-15)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100086 Removal of a remaining NS\_201 related requirement**

*Type: CR For: Agreement  
 38.101-2 v16.6.0 CR-0314 Cat: A (Rel-16)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100087 Removal of a remaining NS\_201 related requirement**

*Type: CR For: Agreement  
 38.101-2 v17.0.0 CR-0315 Cat: A (Rel-17)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100109 On NS\_203/CA\_NS\_203 for n258**

*Type: other For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

This contribution discusses necessity of explicitly describing this information in the specification.

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100586 P\_min correction and P\_cmax CA correction to apply from all cells**

*Type: CR For: Agreement  
 38.101-2 v15.12.0 CR-0320 Cat: F (Rel-15)  
  
 Source: Qualcomm Incorporated*

**Abstract:**

Change "each cell" to "all cells" since pcmax is calculated based on all simultaneous grants from all allocated CC's.

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103127.**

**R4-2103127 P\_min correction and P\_cmax CA correction to apply from all cells**

*Type: CR For: Agreement  
 38.101-2 v15.12.0 CR-0320 Cat: F (Rel-15)  
  
 Source: Qualcomm Incorporated*

**Abstract:**

Change "each cell" to "all cells" since pcmax is calculated based on all simultaneous grants from all allocated CC's.

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2100587 P\_min correction and P\_cmax CA correction to apply from all cells**

*Type: CR For: Agreement  
 38.101-2 v16.6.0 CR-0321 Cat: A (Rel-16)  
  
 Source: Qualcomm Incorporated*

**Abstract:**

Change "each cell" to "all cells" since pcmax is calculated based on all simultaneous grants from all allocated CC's.

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100588 P\_min correction and P\_cmax CA correction to apply from all cells**

*Type: CR For: Agreement  
 38.101-2 v17.0.0 CR-0322 Cat: A (Rel-17)  
  
 Source: Qualcomm Incorporated*

**Abstract:**

Change "each cell" to "all cells" since pcmax is calculated based on all simultaneous grants from all allocated CC's.

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2101201 Further discussion on EESS protection**

*Type: other For: Approval  
 Source: NTT DOCOMO INC.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101523 Discussion on WRC-19 remaining issues**

*Type: discussion For: Approval  
 Source: OPPO*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101738 Discussion on FR2 equal PSD in CA and draft LS**

*Type: discussion For: Approval  
 Source: OPPO*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101739 CR on FR2 equal PSD in UL CA**

*Type: CR For: Agreement  
 38.101-2 v15.12.0 CR-0329 Cat: F (Rel-15)  
  
 Source: OPPO*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2101740 CR on FR2 equal PSD in UL CA (R16 mirror CR)**

*Type: CR For: Agreement  
 38.101-2 v16.6.0 CR-0330 Cat: A (Rel-16)  
  
 Source: OPPO*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2101741 CR on FR2 equal PSD in UL CA (R17 mirror CR)**

*Type: CR For: Agreement  
 38.101-2 v17.0.0 CR-0331 Cat: A (Rel-17)  
  
 Source: OPPO*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102662 Discussion on FR2 UE Min. Output Power Requirement**

*Type: discussion For: Agreement  
 Source: Qualcomm Finland RFFE Oy*

**Abstract:**

Establish consistency in Pmin specs across single CC, CA and UL MIMO configurations

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102663 Completion of beam correspondence requirements for all power classes**

*Type: discussion For: Agreement  
 Source: Qualcomm Finland RFFE Oy*

**Abstract:**

The beam correspondence requirement for partial beam correspondence UEs (‘bit 0 UE’) was completed for PC3 UEs as part of Rel-15 work. We propose completing the requirement by addressing the other power classes

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102664 CR to 38.101-2 on beam correspondence**

*Type: CR For: Agreement  
 38.101-2 v15.12.0 CR-0335 Cat: F (Rel-15)  
  
 Source: Qualcomm, Nokia, Nokia Shanghai Bell, Samsung, Verizon, NTT Docomo, Sony, Ericsson*

**Abstract:**

Completion of missing requirements

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103126.**

**R4-2103126 CR to 38.101-2 on beam correspondence**

*Type: CR For: Agreement  
 38.101-2 v15.12.0 CR-0335 Cat: F (Rel-15)  
  
 Source: Qualcomm, Nokia, Nokia Shanghai Bell, Samsung, Verizon, NTT Docomo, Sony, Ericsson*

**Abstract:**

Completion of missing requirements

**Discussion:**

Chair: The wording in the CR does not preclude future PC-specific requirements, i.e. bit-0 for PC1/2/4.

**Decision: Agreed.**

**R4-2102665 CR to 38.101-2 on beam correspondence**

*Type: CR For: Agreement  
 38.101-2 v16.6.0 CR-0336 Cat: A (Rel-16)  
  
 Source: Qualcomm, Nokia, Nokia Shanghai Bell, Samsung, Verizon, NTT Docomo, Sony, Ericsson*

**Abstract:**

Completion of missing requirements

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102666 CR to 38.101-2 on beam correspondence**

*Type: CR For: Agreement  
 38.101-2 v17.0.0 CR-0337 Cat: A (Rel-17)  
  
 Source: Qualcomm, Nokia, Nokia Shanghai Bell, Samsung, Verizon, NTT Docomo, Sony, Ericsson*

**Abstract:**

Completion of missing requirements

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102677 Frequency separation class clarification**

*Type: CR For: Agreement  
 38.101-2 v16.6.0 CR-0341 Cat: F (Rel-16)  
  
 Source: Ericsson*

**Abstract:**

This paper is an alignement with the Freq separation class signalling in TS38.331

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2102678 Frequency separation class clarification**

*Type: CR For: Agreement  
 38.101-2 v17.0.0 CR-0342 Cat: A (Rel-17)  
  
 Source: Ericsson*

**Abstract:**

This paper is an alignement with the Freq separation class signalling in TS38.331

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102716 CR on FR2 intra-band UL CA**

*Type: CR For: Agreement  
 38.101-2 v15.12.0 CR-0343 Cat: F (Rel-15)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103348.**

**R4-2103348 CR on FR2 intra-band UL CA**

*Type: CR For: Agreement  
 38.101-2 v15.12.0 CR-0343 Cat: F (Rel-15)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102815 CR on FR2 intra-band UL CA**

*Type: CR For: Agreement  
 38.101-2 v16.6.0 CR-0345 Cat: A (Rel-16)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2103391 CR on FR2 intra-band UL CA**

*Type: CR For: Agreement  
 38.101-2 v17.0.0 CR-0346 Cat: A (Rel-17)  
  
 Source: Huawei, HiSilicon*

**Abstract:**

**Discussion:**

**Decision: Agreed.**

**R4-2102924 Discussion on FR2 UE Min. Output Power Requirement**

*Type: discussion For: Agreement  
 Source: Qualcomm Incorporated*

**Abstract:**

Establish consistency in Pmin specs across single CC, CA and UL MIMO configurations

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102925 Completion of beam correspondence requirements for all power classes**

*Type: discussion For: Agreement  
 Source: Qualcomm Incorporated*

**Abstract:**

The beam correspondence requirement for partial beam correspondence UEs (‘bit 0 UE’) was completed for PC3 UEs as part of Rel-15 work. We propose completing the requirement by addressing the other power classes

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

#### 4.2.3 Maintenance for 38.101-3 [NR\_newRAT-Core]

**R4-2102952 Email discussion summary for [98e][104] NR\_NewRAT\_UE\_RF\_Part\_3**

*Type: other For: Information  
 Source: Moderator (Huawei)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103294.**

**R4-2103294 Email discussion summary for [98e][104] NR\_NewRAT\_UE\_RF\_Part\_3**

*Type: other For: Information  
 Source: Moderator (Huawei)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103115 Way forward on BCS reporting and support for intra-band EN-DC band combinations**

*Type: other For: Approval  
 Source: T-Mobile USA*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103349 Way forward on BCS reporting and support for intra-band EN-DC band combinations**

*Type: other For: Approval  
 Source: Bell Mobility*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103130 Way forward on UE capability on intraBandENDC-Support**

*Type: other For: Approval  
 Source: Huawei*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2101111 Discussion and reply draft LS on BCS reporting and support for intra-band EN-DC band combinations**

*Type: discussion For: Approval  
 Source: Xiaomi*

**Discussion:**

[report of discussion]

**Decision:** The document was **revised to R4-2102937**.

**R4-2102937 Discussion and reply draft LS on BCS reporting and support for intra-band EN-DC band combinations**

*Type: discussion For: Approval  
 Source: Xiaomi*

(Replaces R4-2101111)

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101143 Discussion on the reply to LS on BCS for intra-band EN-DC band combinations**

*Type: discussion For: Discussion  
 Source: MediaTek inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101718 Correction to applicability of simultaneous RX/TX and single-UL transmission**

*Type: CR For: Agreement  
 38.101-3 v15.12.0 CR-0461 Cat: F (Rel-15)  
  
 Source: Ericsson*

**Abstract:**

CR to correct the applicability of simultaneous RxTx for inter-band EN-DC and single-UL

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2101719 Correction to applicability of simultaneous RX/TX and single-UL transmission**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0462 Cat: A (Rel-16)  
  
 Source: Ericsson*

**Abstract:**

CR to correct the applicability of simultaneous RxTx for inter-band EN-DC and single-UL

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2101742 Discussion on simultaneous Tx-Rx**

*Type: discussion For: Approval  
 Source: OPPO*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101746 CR on simultaneous Tx-Rx for EN-DC**

*Type: CR For: Agreement  
 38.101-3 v15.12.0 CR-0464 Cat: F (Rel-15)  
  
 Source: OPPO*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103128.**

**R4-2103128 CR on simultaneous Tx-Rx for EN-DC**

*Type: CR For: Agreement  
 38.101-3 v15.12.0 CR-0464 Cat: F (Rel-15)  
  
 Source: OPPO*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2101747 CR on simultaneous Tx-Rx for EN-DC (R16 CR)**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0465 Cat: F (Rel-16)  
  
 Source: OPPO*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103129.**

**R4-2103129 CR on simultaneous Tx-Rx for EN-DC (R16 CR)**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0465 Cat: F (Rel-16)  
  
 Source: OPPO*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2101748 CR on simultaneous Tx-Rx for EN-DC (R17 mirror CR)**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0466 Cat: A (Rel-17)  
  
 Source: OPPO*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2101750 Discussion on BCS for intra-band EN-DC and draft reply LS**

*Type: discussion For: Approval  
 Source: OPPO*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101853 Draft reply LS on on BCS reporting and support for intra-band EN-DC band combinations**

*Type: LS out For: Approval  
 to RAN2, cc RANP  
 Source: ZTE Wistron Telecom AB*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102094 CR for 38.101-3 to introduce a new MSD due to the counter intermodulation interference(Rel-15)**

*Type: CR For: Agreement  
 38.101-3 v15.12.0 CR-0474 Cat: F (Rel-15)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103357.**

**R4-2103357 CR for 38.101-3 to introduce a new MSD due to the counter intermodulation interference(Rel-15)**

*Type: CR For: Agreement  
 38.101-3 v15.12.0 CR-0474 Cat: F (Rel-15)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102095 CR for 38.101-3 to introduce a new MSD due to the counter intermodulation interference(Rel-16)**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0475 Cat: A (Rel-16)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102096 CR for 38.101-3 to introduce a new MSD due to the counter intermodulation interference(Rel-17)**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0476 Cat: A (Rel-17)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102375 Further consideration on simultaneous RxTx UE capability**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102378 CR for TS 38.101-3 correction CR for simultaneous TxRx operation (R15)**

*Type: CR For: Agreement  
 38.101-1 v15.12.0 CR-0684 Cat: F (Rel-15)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2102379 CR for TS 38.101-3: correction CR for simultaneous Tx/Rx operation (R16)**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0481 Cat: A (Rel-16)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102717 CR for TS 38.101-3: correction CR for simultaneous Tx/Rx operation (R17)**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0494 Cat: A (Rel-17)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102504 BCS reporting and support for intra-band EN-DC band combination**

*Type: discussion For: (not specified)  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102505 CR for 38.101-3 on applicability of minimum requirements for EN-DC (Rel-15)**

*Type: CR For: Agreement  
 38.101-3 v15.12.0 CR-0489 Cat: F (Rel-15)  
  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2102506 CR for 38.101-3 on applicability of minimum requirements for EN-DC (Rel-16)**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0490 Cat: A (Rel-16)  
  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102507 CR for 38.101-3 on applicability of minimum requirements for EN-DC (Rel-17)**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0491 Cat: A (Rel-17)  
  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102559 Clarification of intra-bandENDC-Support**

*Type: other For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102593 CR for bug fixing of band combination tables for 38101-3 Rel17**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0492 Cat: F (Rel-17)  
  
 Source: Apple*

**Discussion:**

Chair: Please use “TEI17, NR\_newRAT-Core” in the WI code field in the CR coversheet.

**Decision: Revised to R4-2103345.**

**R4-2103345 CR for bug fixing of band combination tables for 38101-3 Rel17**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0492 Cat: F (Rel-17)  
  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102594 CR for bug fixing of band combination tables for 38101-3 Rel16**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0493 Cat: F (Rel-16)  
  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103346.**

**R4-2103346 CR for bug fixing of band combination tables for 38101-3 Rel16**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0493 Cat: F (Rel-16)  
  
 Source: Apple*

**Discussion:**

Chair: Please use “TEI16, NR\_newRAT-Core” in the WI code field in the CR coversheet.

**Decision: Agreed.**

**R4-2102628 on UE capability for intra-band ENDC**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102388 On BCS reporting and support for intra-band EN-DC band combinations**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102148 Discussion on LS RP-202935 BCS reporting and support for intra-band EN-DC band combinations**

*Type: discussion For: Approval  
 Source: T-Mobile USA, Bell Mobility, TELUS, Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102149 Draft Reply LS to RP-202935 on BCS reporting and support for intra-band EN-DC band combinations (to: RAN, RAN2; cc: -; contact: T-Mobile USA)**

*Type: LS out For: Approval  
 to RAN, RAN2  
 Source: T-Mobile USA, Bell Mobility, TELUS*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2103401 Second Reply LS to RP-202935 = R4-2100025 on BCS reporting and support for intra-band EN-DC band combinations (to: RAN, RAN2; cc: -; contact: T-Mobile USA)**

*Type: LS out For: Approval  
 to RAN, RAN2  
 Source: T-Mobile USA, Bell Mobility*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2103402 CR for 38.101-3: clarification of intra-band EN-DC BCS applicability**

*Type: CR For: Agreement  
 38.101-3 v15.12.0 CR-0502 Cat: F (Rel-15)  
  
 Source: : T-Mobile USA*

**Abstract:**

**Discussion:**

**Decision: Agreed.**

**R4-2103403 CR for 38.101-3: clarification of intra-band EN-DC BCS applicability**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0503 Cat: A (Rel-16)  
  
 Source: : T-Mobile USA*

**Abstract:**

**Discussion:**

**Decision: Agreed.**

**R4-2103404 CR for 38.101-3: clarification of intra-band EN-DC BCS applicability**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0504 Cat: A (Rel-17)  
  
 Source: : T-Mobile USA*

**Abstract:**

**Discussion:**

**Decision: Agreed.**

### 4.10 Positioning specs maintenance (36.171, 37.171 and 38.171) [NR\_newRAT-Perf or TEI]

**R4-2103002 Email discussion summary for [98e][154] NR\_reply\_LS\_Part\_1**

*Type: other For: Information  
 Source: Moderator (Xiaomi)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103340.**

**R4-2103340 Email discussion summary for [98e][154] NR\_reply\_LS\_Part\_1**

*Type: other For: Information  
 Source: Moderator (Xiaomi)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103287 Way forward on frequency Bands for testing of A-GNSS Sensitivity requirements in NR and LTE**

*Type: LS out For: Approval  
 Source: Apple*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2100196 Analysis of RF interferences to A-GNSS Sensitivity requirements in NR and LTE**

*Type: discussion For: Discussion  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101923 Frequency Bands for testing of A-GNSS Sensitivity in EN-DC**

*Type: discussion For: (not specified)  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

## 5 LTE maintenance (up to Rel15) [WI code or TEI]

### 5.2 UE RF requirements [WI code or TEI]

**R4-2102953 Email discussion summary for [98e][105] LTE\_Maintenance**

*Type: other For: Information  
 Source: Moderator (Skyworks)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103295.**

**R4-2103295 Email discussion summary for [98e][105] LTE\_Maintenance**

*Type: other For: Information  
 Source: Moderator (Skyworks)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103131 Way forward on LTE band 41 NS04 A-MPR for UL 256 QAM**

*Type: other For: Approval  
 Source: T-Mobile USA, Huawei, HiSilicon, T-mobile USA, Qualcomm Inc*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2100053 CR for missing B48 references in a table and note**

*Type: CR For: Agreement  
 36.101 v14.17.0 CR-5713 Cat: F (Rel-14)  
  
 Source: C Spire Wireless*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100244 CR for missing B48 references in a table and note**

*Type: CR For: Agreement  
 36.101 v15.13.0 CR-5713 rev 1 Cat: A (Rel-15)  
  
 Source: C Spire Wireless*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100645 CR for missing B48 references in a table and note**

*Type: CR For: Agreement  
 36.101 v15.13.0 CR-5717 Cat: A (Rel-15)  
  
 Source: C Spire Wireless*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100648 CR for missing B48 references in a table and note**

*Type: CR For: Agreement  
 36.101 v16.8.0 CR-5718 Cat: A (Rel-16)  
  
 Source: C Spire Wireless*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100651 CR for missing B48 references in a table and note**

*Type: CR For: Agreement  
 36.101 v17.0.0 CR-5719 Cat: A (Rel-17)  
  
 Source: C Spire Wireless*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101197 Addition of UE co-existence requirements for 40 and n40**

*Type: other For: Approval  
 Source: NTT DOCOMO, INC., SoftBank Corp., KDDI Corporation, Rakuten Mobile, Inc*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103134.**

**R4-2103134 Addition of UE co-existence requirements for 40 and n40**

*Type: other For: Approval  
 Source: NTT DOCOMO, INC., SoftBank Corp., KDDI Corporation, Rakuten Mobile, Inc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101802 CR for 36.101 to add missing spurious emissions for band 38 UE co-existence (Rel-16)**

*Type: CR For: Agreement  
 36.101 v16.8.0 CR-5721 Cat: F (Rel-16)  
  
 Source: Huawei, HiSilicon, DT*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101803 CR for 36.101 to add missing spurious emissions for band 38 UE co-existence (Rel-17)**

*Type: CR For: Agreement  
 36.101 v17.0.0 CR-5722 Cat: A (Rel-17)  
  
 Source: Huawei, HiSilicon, DT*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102098 Test frequencies for NB-IOT UE in standalone operation**

*Type: other For: Discussion  
 Source: Sony*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102437 A-MPR for LTE CA\_NS\_04 256QAM PC2**

*Type: discussion For: Approval  
 Source: Huawei, HiSilicon*

**Abstract:**

A-MPR values are proposed for LTE CA\_NS\_04 256QAM PC2 based on simulation results.

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102596 CR for TS 36.101: Cleanup for spurious emissions for UE co-existence table**

*Type: CR For: Agreement  
 36.101 v15.13.0 CR-5724 Cat: F (Rel-15)  
  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103132.**

**R4-2103132 CR for TS 36.101: Cleanup for spurious emissions for UE co-existence table**

*Type: CR For: Agreement  
 36.101 v15.13.0 CR-5724 Cat: F (Rel-15)  
  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

## 6 Rel-16 Work Items for LTE

### 6.4 R16 LTE maintenance [WI code]

#### 6.4.2 UE RF requirements [WI code]

**R4-2102604 CR for TS 36.101: Cleanup for spurious emissions for UE co-existence table**

*Type: CR For: Agreement  
 36.101 v16.8.0 CR-5725 Cat: F (Rel-16)  
  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103133.**

**R4-2103133 CR for TS 36.101: Cleanup for spurious emissions for UE co-existence table**

*Type: CR For: Agreement  
 36.101 v16.8.0 CR-5725 Cat: F (Rel-16)  
  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102605 CR for TS 36.101: Cleanup for spurious emissions for UE co-existence table**

*Type: CR For: Agreement  
 36.101 v17.0.0 CR-5726 Cat: A (Rel-17)  
  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

## 7 Rel-16 non-spectrum related work items for NR

### 7.1 NR-based access to unlicensed spectrum [NR\_unlic]

#### 7.1.1 System parameters maintenance [NR\_unlic-Core]

**R4-2102954 Email discussion summary for [98e][106] NR\_unlic\_Maintenance**

*Type: other For: Information  
 Source: Moderator (Qualcomm)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103296.**

**R4-2103296 Email discussion summary for [98e][106] NR\_unlic\_Maintenance**

*Type: other For: Information  
 Source: Moderator (Qualcomm)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2100511 NR-U wideband operation and intra-carrier guard bands**

*Type: discussion For: Decision  
 Source: Apple Inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100512 Corrections of NR-U wideband operation intra-carrier guard bands**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0619 Cat: F (Rel-16)  
  
 Source: Apple Inc.*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2100513 Corrections of NR-U wideband operation intra-carrier guard bands**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0620 Cat: A (Rel-17)  
  
 Source: Apple Inc.*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2101720 Applicability of minimum requirements for shared spectrum access**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0647 Cat: F (Rel-16)  
  
 Source: Ericsson*

**Abstract:**

CR to add the applicability of minimum requirements for DL (Mode 1) and UL

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103135.**

**R4-2103135 Applicability of minimum requirements for shared spectrum access**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0647 Cat: F (Rel-16)  
  
 Source: Ericsson*

**Abstract:**

CR to add the applicability of minimum requirements for DL (Mode 1) and UL

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2103136 Applicability of minimum requirements for shared spectrum access**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR- Cat: A (Rel-17)  
  
 Source: Ericsson*

**Abstract:**

CR to add the applicability of minimum requirements for DL (Mode 1) and UL

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2101968 CR to TS 38.104: system parameters maintenance for NR-U**

*Type: CR For: Agreement  
 38.104 v16.6.0 CR-0281 Cat: F (Rel-16)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103137.**

**R4-2103137 CR to TS 38.104: system parameters maintenance for NR-U**

*Type: CR For: Agreement  
 38.104 v16.6.0 CR-0281 Cat: F (Rel-16)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101969 CR to TS 38.104: system parameters maintenance for NR-U**

*Type: CR For: Agreement  
 38.104 v17.0.0 CR-0282 Cat: A (Rel-17)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101970 CR to TS 38.101-1: system parameters maintenance for NR-U**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0662 Cat: F (Rel-16)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103138.**

**R4-2103138 CR to TS 38.101-1: system parameters maintenance for NR-U**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0662 Cat: F (Rel-16)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101971 CR to TS 38.101-1: system parameters maintenance for NR-U**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0663 Cat: A (Rel-17)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 7.1.2 UE RF requirements maintenance [NR\_unlic-Core]

##### 7.1.2.1 Transmitter characteristics [NR\_unlic-Core]

**R4-2101932 NR-U - On Intra-cell guardbands**

*Type: discussion For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 7.1.2.2 Receiver characteristics [NR\_unlic-Core]

### 7.3 5G V2X with NR sidelink [5G\_V2X\_NRSL]

#### 7.3.1 System parameters maintenance [5G\_V2X\_NRSL-Core]

#### 7.3.2 UE RF requirements maintenance [5G\_V2X\_NRSL-Core]

**R4-2102955 Email discussion summary for [98e][107] 5G\_V2X\_NRSL\_UE\_RF**

*Type: other For: Information  
 Source: Moderator (LG Electronics)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103297.**

**R4-2103297 Email discussion summary for [98e][107] 5G\_V2X\_NRSL\_UE\_RF**

*Type: other For: Information  
 Source: Moderator (LG Electronics)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103139 LS on the clarification on the name of parameters for 5G V2X UE**

*Type: LS out For: Approval  
 Source: Qualcomm*

**Abstract:**

**Discussion:**

**Decision: Withdrawn.**

##### 7.3.2.1 Transmitter characteristics [5G\_V2X\_NRSL-Core]

**R4-2100280 CR on editorial correction on V2X operation in TS38.101-1 in Rel-16**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0605 Cat: F (Rel-16)  
  
 Source: LG Electronics France*

**Abstract:**

Propovide CR to correct editorial correction for 5G V2X RF requirements in TS38.101-1

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103140.**

**R4-2103140 CR on editorial correction on V2X operation in TS38.101-1 in Rel-16**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0605 Cat: F (Rel-16)  
  
 Source: LG Electronics France*

**Abstract:**

Propovide CR to correct editorial correction for 5G V2X RF requirements in TS38.101-1

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100281 CR on editorial correction on V2X operation in TS38.101-1 in Rel-17**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0606 Cat: A (Rel-17)  
  
 Source: LG Electronics France*

**Abstract:**

shadowing CR from R4-2100280

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100404 CR for TS 38.101-1, General corrections for NR V2X**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0615 Cat: F (Rel-16)  
  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2100499 CR for TS 38.101-1, General corrections for NR V2X**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0618 Cat: A (Rel-17)  
  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100405 CR for TS 38.101-3, General corrections for NR V2X**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0440 Cat: F (Rel-16)  
  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103141.**

**R4-2103141 CR for TS 38.101-3, General corrections for NR V2X**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0440 Cat: F (Rel-16)  
  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100500 CR for TS 38.101-3, General corrections for NR V2X**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0445 Cat: A (Rel-17)  
  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100406 CR for 38.886, General corrections for NR V2X**

*Type: CR For: Agreement  
 38.886 v16.2.0 CR-0006 Cat: F (Rel-16)  
  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102382 CR for 38.101-1 correction of NR V2X FRC parameter**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0685 Cat: F (Rel-16)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

##### 7.3.2.2 Receiver characteristics [5G\_V2X\_NRSL-Core]

#### 7.3.3 Concurrent operation maintenance (scenarios, requirements, etc) [5G\_V2X\_NRSL-Core]

**R4-2100403 Discussion on switching period position in ITS band**

*Type: discussion For: Approval  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 7.3.3.1 Transmitter characteristics [5G\_V2X\_NRSL-Core]

**R4-2100783 Further discussion on switching period in the ITS band**

*Type: discussion For: Approval  
 Source: vivo*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101870 CR for TS 38.101-3 switching period for V2X con-current operation Rel-16**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0469 Cat: F (Rel-16)  
  
 Source: Xiaomi*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2101871 CR for TS 38.101-3 switching period for V2X con-current operation Rel-17**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0470 Cat: A (Rel-17)  
  
 Source: Xiaomi*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2101876 on switching period**

*Type: discussion For: (not specified)  
 Source: Xiaomi*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102380 On SL switching period**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102381 CR for TS 38.101-3 NR V2X switching period**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0482 Cat: B (Rel-16)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

##### 7.3.3.2 Receiver characteristics [5G\_V2X\_NRSL-Core]

### 7.5 Multi-RAT Dual-Connectivity and Carrier Aggregation enhancements [LTE\_NR\_DC\_CA\_enh]

#### 7.5.1 RF requirements maintenance [LTE\_NR\_DC\_CA\_enh-Core]

**R4-2102956 Email discussion summary for [98e][108] LTE\_NR\_DC\_CA\_enh\_RF**

*Type: other For: Information  
 Source: Moderator (Ericsson)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103298.**

**R4-2103298 Email discussion summary for [98e][108] LTE\_NR\_DC\_CA\_enh\_RF**

*Type: other For: Information  
 Source: Moderator (Ericsson)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103144 LS to RAN2 on single-uplink operation in more than one band pair of a band combination**

*Type: LS out For: Approval  
 Source: MediaTek*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103145 LS to RAN2 on single-uplink operation**

*Type: LS out For: Approval  
 Source: Huawei*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103365.**

**R4-2103365 LS to RAN2 on single-uplink operation**

*Type: LS out For: Approval  
 Source: Huawei*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2100798 MSD due to wider BW evaluation for DC\_28\_n5**

*Type: discussion For: Approval  
 38.101-3 v..  
 Source: MediaTek Inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100844 CR for 38.101-3 Correction on EN-DC MSD due to cross band isolation for DC\_28\_n5 (R16)**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0449 Cat: F (Rel-16)  
  
 Source: MediaTek Inc.*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2101820 Further discussion on RF requirements about Multi-RAT Dual-Connectivity**

*Type: discussion For: Discussion  
 Source: Huawei, HiSilicon*

**Abstract:**

ENDC TDM when roaming

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102044 LS reply to RAN2 on power control for NR-DC**

*Type: LS out For: Approval  
 to RAN2  
 Source: Ericsson*

**Abstract:**

LS reply to RAN2 on power control for NR-DC

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102207 CR to TS 38.307 on the definition of the duplex-mode for the band configurations**

*Type: CR For: Agreement  
 38.307 v15.7.0 CR-0055 Cat: F (Rel-15)  
  
 Source: ZTE Corporation, CHTTL*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2102208 CR to TS 38.307 on the definition of the duplex-mode for the band configurations**

*Type: CR For: Agreement  
 38.307 v16.5.0 CR-0056 Cat: A (Rel-16)  
  
 Source: ZTE Corporation, CHTTL*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102209 CR to TS 38.307 on the definition of the duplex-mode for the band configurations**

*Type: CR For: Agreement  
 38.307 v17.0.0 CR-0057 Cat: A (Rel-17)  
  
 Source: ZTE Corporation, CHTTL*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102408 Missing parent clause for NR-DC PCMAX**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0689 Cat: D (Rel-16)  
  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103142.**

**R4-2103142 Missing parent clause for NR-DC PCMAX**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0689 Cat: D (Rel-16)  
  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102409 Missing parent clause for NR-DC PCMAX**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0690 Cat: A (Rel-17)  
  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102711 Discussion and reply LS on p-NR-FR2**

*Type: discussion For: Discussion  
 Source: vivo*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103143.**

**R4-2103143 Discussion and reply LS on p-NR-FR2**

*Type: discussion For: Discussion  
 Source: vivo*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2103373 Further Reply LS on power control for NR-DC**

*Type: LS out For: Approval  
 Source: vivo*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102387 On SUO for intra-band EN-DC**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101144 Discussion on the reply to LS on single UL operation**

*Type: discussion For: Discussion  
 Source: MediaTek inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

### 7.9 Enhancements on MIMO for NR [NR\_eMIMO]

#### 7.9.1 UE RF core requirements maintenance (38.101) [NR\_eMIMO-Core]

**R4-2102386 CR for TS 38.101-1: correction of Pi/2 BPSK**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0687 Cat: F (Rel-16)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

### 7.11 RF requirements for NR frequency range 1 (FR1) [NR\_RF\_FR1]

#### 7.11.1 RF core requirements maintenance [NR\_RF\_FR1-Core]

**R4-2102957 Email discussion summary for [98e][109] NR\_RF\_FR1\_Part\_1**

*Type: other For: Information  
 Source: Moderator (Huawei)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103299.**

**R4-2103299 Email discussion summary for [98e][109] NR\_RF\_FR1\_Part\_1**

*Type: other For: Information  
 Source: Moderator (Huawei)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103146 Way forward on intra-band UL CA Pcmax**

*Type: other For: Approval  
 Source: Huawei*

**Abstract:**

**Discussion:**

**Decision: Approved.**

##### 7.11.1.1 Intra-band UL CA for FR1 power class 3 [NR\_RF\_FR1-Core]

**R4-2100162 CA\_n7B\_REFSENS\_CatF\_CR**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0600 Cat: F (Rel-16)  
  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102588 CR CA\_n7B REFSENS – Cat A**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0695 Cat: A (Rel-17)  
  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101178 Intra-band contiguous ULCA Pcmax Issues**

*Type: other For: Approval  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102600 CR for TS 38.101-1: Corrections to intra-band UL NC CA requirements**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0700 Cat: F (Rel-16)  
  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103149.**

**R4-2103149 CR for TS 38.101-1: Corrections to intra-band UL NC CA requirements**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0700 Cat: F (Rel-16)  
  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102601 CR for TS 38.101-1: Corrections to intra-band UL NC CA requirements**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0701 Cat: A (Rel-17)  
  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102626 on FR1 intra-band CA separation class**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 7.11.1.2 Others [NR\_RF\_FR1-Core]

**R4-2100160 Introduction of specific Pcmax requirements for inter-band CA category A-B combos**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0599 Cat: C (Rel-16)  
  
 Source: InterDigital Communications*

**Abstract:**

Introduction of specific Pcmax requirements for inter-band CA category A-B combos.

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2103147 Introduction of specific Pcmax requirements for inter-band CA category A-B combos**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0717 Cat: B (Rel-17)  
  
 Source: InterDigital Communications, Charter Communications*

**Abstract:**

Introduction of specific Pcmax requirements for inter-band CA category A-B combos.

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100596 UL Switching and coherent UL MIMO Cat-F CR 38.101-1**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0623 Cat: F (Rel-16)  
  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2100597 UL Switching and coherent UL MIMO Cat-A CR 38.101-1**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0624 Cat: A (Rel-17)  
  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100792 CR for TS 38.101-1: Correction on 1Tx-2Tx switching between two uplink carriers (Rel-16)**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0629 Cat: F (Rel-16)  
  
 Source: China Telecom*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100793 CR for TS 38.101-1: Correction on 1Tx-2Tx switching between two uplink carriers (Rel-17)**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0630 Cat: F (Rel-17)  
  
 Source: China Telecom*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100794 CR for TS 38.101-3: Correction on 1Tx-2Tx switching between two uplink carriers (Rel-16)**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0447 Cat: F (Rel-16)  
  
 Source: China Telecom*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100795 CR for TS 38.101-3: Correction on 1Tx-2Tx switching between two uplink carriers (Rel-17)**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0448 Cat: A (Rel-17)  
  
 Source: China Telecom*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101145 Clarification on timing difference for Tx switching in EN-DC R16**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0456 Cat: F (Rel-16)  
  
 Source: MediaTek inc.*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103353.**

**R4-2103353 Clarification on timing difference for Tx switching in EN-DC R16**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0456 Cat: F (Rel-16)  
  
 Source: MediaTek inc.*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101146 Clarification on timing difference for Tx switching in EN-DC R17**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0457 Cat: A (Rel-17)  
  
 Source: MediaTek inc.*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101285 CR to 38.101-1 (Rel-16) fall back behaviors**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0639 Cat: F (Rel-16)  
  
 Source: Intel Corporation*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2101286 CR to 38.101-1 (Rel-17) fall back behaviors**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0640 Cat: A (Rel-17)  
  
 Source: Intel Corporation*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2103350 Corrections to PCMAX for UL CA**

*Type: CR For: Agreement  
 38.101-1 v15.12.0 CR- Cat: F (Rel-15)  
  
 Source: Qualcomm Incorporated*

**Abstract:**

**Discussion:**

**Decision: Agreed.**

**R4-2102410 Corrections to PCMAX for UL CA**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0691 Cat: F (Rel-16)  
  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103148.**

**R4-2103148 Corrections to PCMAX for UL CA**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0691 Cat: F (Rel-16)  
  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102411 Corrections to PCMAX for UL CA**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0692 Cat: A (Rel-17)  
  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102682 on FR1 intra-band UL CA Pcmax**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2103097 Way forward on introduction of NR intra-band UL CA as UL configuration in an inter-band combination**

*Type: other For: Approval  
 Source: Skyworks*

**Abstract:**

**Discussion:**

**Decision: Approved.**

### 7.12 NR RF requirement enhancements for frequency range 2 (FR2) [NR\_RF\_FR2\_req\_enh]

#### 7.12.1 RF core requirements maintenance [NR\_RF\_FR2\_req\_enh-Core]

**R4-2102958 Email discussion summary for [98e][110] NR\_RF\_FR2\_req\_enh\_Part\_4**

*Type: other For: Information  
 Source: Moderator (Nokia)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103300.**

**R4-2103300 Email discussion summary for [98e][110] NR\_RF\_FR2\_req\_enh\_Part\_4**

*Type: other For: Information  
 Source: Moderator (Nokia)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103150 Way forward on addition of new frequency FR2 frequency separation classes**

*Type: other For: Approval  
 Source: Qualcomm, Huawei, Nokia*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2100589 P\_cmax P\_IBE wording refinement and terminology improvement**

*Type: CR For: Agreement  
 38.101-2 v16.6.0 CR-0323 Cat: F (Rel-16)  
  
 Source: Qualcomm Incorporated*

**Abstract:**

Clarify P\_IBE applicability and add A-MPR = 0 condition

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103358.**

**R4-2103358 P\_cmax P\_IBE wording refinement and terminology improvement**

*Type: CR For: Agreement  
 38.101-2 v16.6.0 CR-0323 Cat: F (Rel-16)  
  
 Source: Qualcomm Incorporated*

**Abstract:**

Clarify P\_IBE applicability and add A-MPR = 0 condition

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100590 P\_cmax P\_IBE wording refinement and termonology improvement**

*Type: CR For: Agreement  
 38.101-2 v17.0.0 CR-0324 Cat: A (Rel-17)  
  
 Source: Qualcomm Incorporated*

**Abstract:**

Clarify P\_IBE applicability and add A-MPR = 0 condition

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100591 Inter-band + intra-band CA FR2 frequency separation class**

*Type: other For: Approval  
 Source: Qualcomm Incorporated*

**Abstract:**

Add 400 and 600 MHz to Fs

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101287 CR to 38.101-2 (Rel-16) SSB based beam correspondence side condition**

*Type: CR For: Agreement  
 38.101-2 v16.6.0 CR-0326 Cat: F (Rel-16)  
  
 Source: Intel Corporation*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2101288 CR to 38.101-2 (Rel-17) SSB based beam correspondence side condition**

*Type: CR For: Agreement  
 38.101-2 v17.0.0 CR-0327 Cat: A (Rel-17)  
  
 Source: Intel Corporation*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102132 Discussion on frequency separation class**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102183 Discussion on frequency separation class**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102718 CR on FR2 inter-band DL CA CBM and IBM**

*Type: CR For: Agreement  
 38.101-2 v16.6.0 CR-0344 Cat: F (Rel-16)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103369.**

**R4-2103369 CR on FR2 inter-band DL CA CBM and IBM**

*Type: CR For: Agreement  
 38.101-2 v16.6.0 CR-0344 Cat: F (Rel-16)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103405.**

**R4-2103405 CR on FR2 inter-band DL CA CBM and IBM**

*Type: CR For: Agreement  
 38.101-2 v16.6.0 CR-0344 Cat: F (Rel-16)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

### 7.19 R16 NR maintenance [WI code or TEI16]

#### 7.19.1 UE transient period capability [TEI16]

**R4-2102959 Email discussion summary for [98e][111] NR\_transient\_period**

*Type: other For: Information  
 Source: Moderator (CMCC)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103301.**

**R4-2103301 Email discussion summary for [98e][111] NR\_transient\_period**

*Type: other For: Information  
 Source: Moderator (CMCC)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103362.**

**R4-2103362 Email discussion summary for [98e][111] NR\_transient\_period**

*Type: other For: Information  
 Source: Moderator (CMCC)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103151 Way forward on transient period**

*Type: other For: Approval  
 Source: CMCC*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103361.**

**R4-2103361 Way forward on transient period**

*Type: other For: Approval  
 Source: CMCC*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2101460 Short Transient Period Testing**

*Type: other For: Approval  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101484 CR on introduction of shorter Transient Period Capability**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0641 Cat: B (Rel-16)  
  
 Source: Qualcomm Incorporated*

**Abstract:**

Resubmission of endorsed Draft CR R4-2011766

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103152.**

**R4-2103152 CR on introduction of shorter Transient Period Capability**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0641 Cat: B (Rel-16)  
  
 Source: Qualcomm Incorporated*

**Abstract:**

Resubmission of endorsed Draft CR R4-2011766

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101487 CR on introduction of shorter Transient Period Capability**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0642 Cat: A (Rel-17)  
  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102629 on transient period UE capability**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102684 CR on TS 38.101-1 time mask for shorter transient**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0709 Cat: F (Rel-16)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

**Decision: Not pursued.**

**R4-2103153 CR on TS 38.101-1 time mask for shorter transient**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0709 Cat: F (Rel-16)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

**Decision: Withdrawn.**

#### 7.19.2 Transmit diversity and power class related to UL MIMO [TEI16]

**R4-2102960 Email discussion summary for [98e][112] NR\_TxD**

*Type: other For: Information  
 Source: Moderator (vivo)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103302.**

**R4-2103302 Email discussion summary for [98e][112] NR\_TxD**

*Type: other For: Information  
 Source: Moderator (vivo)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103154 Way forward on NR TxD & Power Class**

*Type: other For: Approval  
 Source: vivo*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103390.**

**R4-2103390 Way forward on NR TxD & Power Class**

*Type: other For: Approval  
 Source: vivo*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103155 LS on Signaling scheme of Transparent TxD**

*Type: LS out For: Approval  
 Source: vivo*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103360.**

**R4-2103360 LS on Signaling scheme of Transparent TxD**

*Type: LS out For: Approval  
 Source: vivo*

**Abstract:**

**Discussion:**

**Decision: Approved.**

##### 7.19.2.1 R16 support of transmit diversity [TEI16]

**R4-2100095 Remaining items on transparent Tx diversity**

*Type: discussion For: Approval  
 Source: Anritsu corporation*

**Abstract:**

In this contribution we show our views on the following remaining issues.

(1) UE Behavior under Conformance Testing

(2) Signaling for Transparent TxD

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100523 On Tx diversity**

*Type: discussion For: Decision  
 Source: Apple Inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100592 TxD open items for Rel-16**

*Type: other For: Approval  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100594 Introduction of Tx diversity in tor 38101-1 Cat-B CR 38.101-1**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0621 Cat: B (Rel-16)  
  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100595 Introduction of Tx diversity in tor 38101-1 Cat-F CR 38.101-1**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0622 Cat: A (Rel-17)  
  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100914 On the Support of Transparent Tx Diversity in Rel-16**

*Type: discussion For: Discussion  
 Source: Samsung*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101108 Discussion on Tx diversity open issues**

*Type: other For: Approval  
 Source: Xiaomi*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101289 Remaining Issues on Transparent TxD**

*Type: discussion For: Approval  
 Source: Intel Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101721 Support of transparent TxD and the associated EVM requirements**

*Type: other For: Approval  
 Source: Ericsson*

**Abstract:**

In this contribution we propose capabilities for TX diversity and EVM measurements. CDD is also discussed.

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101749 Discussion on UE power class high limit**

*Type: discussion For: Approval  
 Source: OPPO*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101751 Discussion on Rel-16 TxD**

*Type: discussion For: Approval  
 Source: OPPO*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101850 EVM for transparent TxD**

*Type: discussion For: Discussion  
 Source: ZTE Wistron Telecom AB*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102089 Discussion on FR1 EVM measurements**

*Type: discussion For: Approval  
 Source: Rohde & Schwarz*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102383 On TxD RF requirements**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102384 CR for TS 38.101-1: TxD requirements**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0686 Cat: B (Rel-16)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103156.**

**R4-2103156 CR for TS 38.101-1: TxD requirements**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0686 Cat: B (Rel-16)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

Chair: the main issues to be sorted out for the next week: 1)MPR 2) EVM 3) the clarification of “Dual Tx” 4)A-MPR

**Decision: Endorsed.**

**R4-2102683 CR for TS 38.101-1 Tx diversity requirements**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0708 Cat: B (Rel-17)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102704 Remaining issues in Transparent Tx Diversity**

*Type: discussion For: Discussion  
 Source: vivo*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102917 On the EVM Definition for Transmit Diversity and Antenna Ports**

*Type: discussion For: Approval  
 Source: Lenovo, Motorola Mobility*

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 7.19.2.2 Power class related to UL MIMO and other related req. (MPR, SEM, etc) [TEI16 or NR\_newRAT-Core]

**R4-2100593 Power class due to TxD in Rel-15**

*Type: discussion For: (not specified)  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102385 Discussion on Reply LS to RAN5 On EN-DC power class**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102705 Remaining issues in Power class & UL MIMO related requirments**

*Type: discussion For: Discussion  
 Source: vivo*

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 7.19.3 Other UE RF [WI code or TEI16]

**R4-2102961 Email discussion summary for [98e][113] NR\_R16\_Maintenance**

*Type: other For: Information  
 Source: Moderator (OPPO)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103303.**

**R4-2103303 Email discussion summary for [98e][113] NR\_R16\_Maintenance**

*Type: other For: Information  
 Source: Moderator (OPPO)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103157 Way forward on UE co-existence between n40 and n41**

*Type: other For: Approval  
 Source: Huawei*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103158 Way forward on non-default RX-TX Frequency Separation**

*Type: other For: Approval  
 Source: Qualcomm*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103166 Way forward on requirements for Type 2 UEs supporting inter-band MRDC with overlapping DL**

*Type: other For: Approval  
 Source: Ericsson*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2100112 PC1 and PC3 Updates for Band n14**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0588 Cat: F (Rel-16)  
  
 Source: AT&T*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103400.**

**R4-2103400 PC1 and PC3 Updates for Band n14**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0588 Cat: F (Rel-16)  
  
 Source: AT&T*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103409.**

**R4-2103409 PC1 and PC3 Updates for Band n14**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0588 Cat: F (Rel-16)  
  
 Source: AT&T*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100119 PC1 and PC3 Updates for Band n14**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0589 Cat: A (Rel-17)  
  
 Source: AT&T*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100127 CR to TS 38.101-2 on correction to intra-band non-contiguous CA configurations (Rel-16)**

*Type: CR For: Agreement  
 38.101-2 v16.6.0 CR-0318 Cat: F (Rel-16)  
  
 Source: ZTE Corporation*

**Abstract:**

This CR is for correction to intra-band non-contiguous CA configurations

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100128 CR to TS 38.101-2 on correction to intra-band non-contiguous CA configurations (Rel-17)**

*Type: CR For: Agreement  
 38.101-2 v17.0.0 CR-0319 Cat: A (Rel-17)  
  
 Source: ZTE Corporation*

**Abstract:**

This CR is for correction to intra-band non-contiguous CA configurations

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100129 CR to TS 38.101-3 on correction to hanging paragraph in the spec (Rel-16)**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0435 Cat: F (Rel-16)  
  
 Source: ZTE Corporation*

**Abstract:**

This CR is to correct the issues of hanging paragraphs in the spec

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103161.**

**R4-2103161 CR to TS 38.101-3 on correction to hanging paragraph in the spec (Rel-16)**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0435 Cat: F (Rel-16)  
  
 Source: ZTE Corporation*

**Abstract:**

This CR is to correct the issues of hanging paragraphs in the spec

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100130 CR to TS 38.101-3 on correction to hanging paragraph in the spec (Rel-17)**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0436 Cat: A (Rel-17)  
  
 Source: ZTE Corporation*

**Abstract:**

This CR is to correct the issues of hanging paragraphs in the spec

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100136 38.101 Void clean up R16**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0593 Cat: F (Rel-16)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103343.**

**R4-2103343 38.101 Void clean up R16**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0593 Cat: F (Rel-16)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

Chair: Please use “TEI16, NR\_newRAT-Core” in the WI code field in the CR coversheet.

**Decision: Agreed.**

**R4-2100137 38.101 Void clean up R17**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0594 Cat: A (Rel-17)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103344.**

**R4-2103344 38.101 Void clean up R17**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0594 Cat: A (Rel-17)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

Chair: Please use “TEI16, NR\_newRAT-Core” in the WI code field in the CR coversheet.

**Decision: Agreed.**

**R4-2100148 TS 38.101-3: Addition of missing lower order fallbacks R16**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0437 Cat: B (Rel-16)  
  
 Source: Nokia, AT&T*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103162.**

**R4-2103162 TS 38.101-3: Addition of missing lower order fallbacks R16**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0437 Cat: B (Rel-16)  
  
 Source: Nokia, AT&T*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2103395 TS 38.101-3: Addition of missing lower order fallbacks R16**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR- Cat: A (Rel-17)  
  
 Source: Nokia, AT&T*

**Abstract:**

**Discussion:**

**Decision: Agreed.**

**R4-2100149 TS 38.101-3: Addition of missing lower order fallbacks R17**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0598 Cat: A (Rel-17)  
  
 Source: Nokia, AT&T*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100150 TR 37.716-21-11: Addition of missing lower order fallbacks**

*Type: CR For: Agreement  
 37.716-21-11 v16.0.0 CR-0001 Cat: B (Rel-16)  
  
 Source: Nokia, AT&T*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100163 CR\_CatF\_n47\_AMPR\_correction**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0601 Cat: F (Rel-16)  
  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2102557 CR for n47 AMPR - Cat A**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0694 Cat: A (Rel-17)  
  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100797 Discussion on requirement for LTE/NR spectrum sharing and dual connectivity (DSS EN-DC) in band 1/n1**

*Type: discussion For: Discussion  
 Source: China Telecom*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100846 CR for 38.101-1: Update of missing fallback NR-DC combinations Rel-16**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0632 Cat: F (Rel-16)  
  
 Source: SoftBank Corp., ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100847 CR for 38.101-1: Update of missing fallback NR-DC combinations Rel-17**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0633 Cat: A (Rel-17)  
  
 Source: SoftBank Corp., ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100876 CR for 38.101-1: Update of simultaneous Rx/Tx capability for some NR CA band combinations Rel-16**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0634 Cat: F (Rel-16)  
  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2100877 CR for 38.101-1: Update of simultaneous Rx/Tx capability for some NR CA band combinations Rel-17**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0635 Cat: A (Rel-17)  
  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100878 CR for 38.101-3: Update of simultaneous Rx/Tx capability for some EN-DC band combinations Rel-16**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0450 Cat: F (Rel-16)  
  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2100879 CR for 38.101-3: Update of simultaneous Rx/Tx capability for some EN-DC band combinations Rel-17**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0451 Cat: A (Rel-17)  
  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2101106 CR for 38.101-1 Rel16 corrections on exception requirements on out-of-band blocking for inter-band CA**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0637 Cat: F (Rel-16)  
  
 Source: Xiaomi*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103347.**

**R4-2103347 CR for 38.101-1 Rel16 corrections on exception requirements on out-of-band blocking for inter-band CA**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0637 Cat: F (Rel-16)  
  
 Source: Xiaomi*

**Discussion:**

Chair: Please use “TEI16, NR\_newRAT-Core” in the WI code field in the CR coversheet.

**Decision: Agreed.**

**R4-2101107 CR for 38.101-1 Rel17 corrections on exception requirements on out-of-band blocking for inter-band CA**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0638 Cat: A (Rel-17)  
  
 Source: Xiaomi*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2101175 n40-n41 Coexistence**

*Type: other For: Approval  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101176 CR to TS 38.101-3 clarification on the single uplink allowance for DC\_3A\_n3A**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0458 Cat: F (Rel-16)  
  
 Source: CHTTL*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103163.**

**R4-2103163 CR to TS 38.101-3 clarification on the single uplink allowance for DC\_3A\_n3A**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0458 Cat: F (Rel-16)  
  
 Source: CHTTL*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101179 CR to TS 38.101-3 clarification on the single uplink allowance for DC\_3A\_n3A**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0459 Cat: A (Rel-17)  
  
 Source: CHTTL*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101722 LS to RAN5 on SCell dropping behavior and verification thereof**

*Type: LS out For: Approval  
 to RAN5  
 Source: Ericsson*

**Abstract:**

LS to RAN5 on the verification of CA MOP and make proposals on the Scell dropping behaviour

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101723 Modification of Pcmax for UL CA with uplink Tx switching capability**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0648 Cat: F (Rel-16)  
  
 Source: Ericsson*

**Abstract:**

CR to modify the Pcmax for CA to accommodate power boosting for switched TX

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103159.**

**R4-2103159 Modification of Pcmax for UL CA with uplink Tx switching capability**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0648 Cat: F (Rel-16)  
  
 Source: Ericsson*

**Abstract:**

CR to modify the Pcmax for CA to accommodate power boosting for switched TX

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2101724 Correction to modified MPR behaviour**

*Type: CR For: Agreement  
 38.101-2 v16.6.0 CR-0328 Cat: F (Rel-16)  
  
 Source: Ericsson*

**Abstract:**

CR to correct modified MPR behaviour

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103167.**

**R4-2103167 Correction to modified MPR behaviour**

*Type: CR For: Agreement  
 38.101-2 v16.6.0 CR-0328 Cat: F (Rel-16)  
  
 Source: Ericsson*

**Abstract:**

CR to correct modified MPR behaviour

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2101725 Requirements Type 2 UEs supporting inter-band MRDC with overlapping DL**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0463 Cat: F (Rel-16)  
  
 Source: Ericsson*

**Abstract:**

CR to add requirements for Type 2 UE and add applicability for Type 1

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103164.**

**R4-2103164 Requirements Type 2 UEs supporting inter-band MRDC with overlapping DL**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0463 Cat: F (Rel-16)  
  
 Source: Ericsson*

**Abstract:**

CR to add requirements for Type 2 UE and add applicability for Type 1

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101804 CR for 38.101-3 to add the missing Tib Rib for DC\_2-7-7-66\_n78/ DC\_2-7-66-66\_n78/ DC\_2-7-7-66-66\_n78 (Rel-16)**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0467 Cat: F (Rel-16)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101805 CR for 38.101-3 to add the missing Tib Rib for DC\_2-7-7-66\_n78/ DC\_2-7-66-66\_n78/ DC\_2-7-7-66-66\_n78 (Rel-17)**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0468 Cat: A (Rel-17)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101806 Discussion on spurious emission about UE co-existence between band n40 and n41**

*Type: other For: Approval  
 Source: Huawei, HiSilicon, CMCC*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101807 CR on spurious emission about UE co-existence between band n40 and n41(Rel-16)**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0652 Cat: F (Rel-16)  
  
 Source: Huawei, HiSilicon, CMCC*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2101808 CR on spurious emission about UE co-existence between band n40 and n41(Rel-17)**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0653 Cat: A (Rel-17)  
  
 Source: Huawei, HiSilicon, CMCC*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2101809 CR for 38.101-1 to introduce PC2 for n40 UL MIMO(Rel-16)**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0654 Cat: F (Rel-16)  
  
 Source: Huawei, HiSilicon, Reliance Jio*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2101810 CR for 38.101-1 to introduce PC2 for n40 UL MIMO(Rel-17)**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0655 Cat: A (Rel-17)  
  
 Source: Huawei, HiSilicon, Reliance Jio*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2101852 CR to TS 38.101-1 Operating bands for DC**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0656 Cat: F (Rel-16)  
  
 Source: ZTE Wistron Telecom AB*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2101939 CR for 38.101-1 to add missing spurious emissions for band n38 UE co-existence (Rel-16)**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0659 Cat: F (Rel-16)  
  
 Source: Huawei, HiSilicon, DT*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101940 CR for 38.101-1 to add missing spurious emissions for band n38 UE co-existence (Rel-17)**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0660 Cat: A (Rel-17)  
  
 Source: Huawei, HiSilicon, DT*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102146 CR for 38.101-3: Correction for CA\_n66A-n260**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0477 Cat: F (Rel-16)  
  
 Source: T-Mobile USA*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102147 CR for 38.101-3: Correction for CA\_n66A-n260A**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0478 Cat: A (Rel-17)  
  
 Source: T-Mobile USA*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102152 CR for 38.101-1: Add CA\_n25A-n41(2A)-n71A which was missing in the CR implementation**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0668 Cat: F (Rel-16)  
  
 Source: T-Mobile USA*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102153 CR for 38.101-1: Add CA\_n25A-n41(2A)-n71A which was missing in the CR implementation**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0669 Cat: A (Rel-17)  
  
 Source: T-Mobile USA*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102203 CR to TS38.101-1: Correction on configured transmitted power requirement**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0678 Cat: F (Rel-16)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102204 CR to TS38.101-1: Correction on configured transmitted power requirement**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0679 Cat: A (Rel-17)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102205 CR to TS38.101-3: Correction on duty cycle signalling terminology for PC2 inter-band ENDC**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0479 Cat: F (Rel-16)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102206 CR to TS38.101-3: Correction on duty cycle signalling terminology for PC2 inter-band ENDC**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0480 Cat: A (Rel-17)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102395 CR for TS 38.101-3 correction of intra-band contiguous EN-DC for DC\_(n)66\_R16**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0483 Cat: F (Rel-16)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2102396 CR for TS 38.101-3 correction of intra-band contiguous EN-DC for DC\_(n)66\_R17**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0484 Cat: A (Rel-17)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102402 CR for TS 38.101-3: Adding delta TIB and RIB requirement for DC\_2-7-7-66\_n78 (R16)**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0485 Cat: F (Rel-16)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102403 draft CR for TS 38.101-3: Adding delta TIB and RIB requirement for DC\_2-7-7-66\_n78 (R17)**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0486 Cat: A (Rel-17)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102562 CR to 38.101-2: correction on UL MIMO**

*Type: CR For: Agreement  
 38.101-2 v16.6.0 CR-0333 Cat: F (Rel-16)  
  
 Source: Google Inc.*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102582 CR to 38.101-2: correction on UL MIMO**

*Type: CR For: Agreement  
 38.101-2 v17.0.0 CR-0334 Cat: A (Rel-17)  
  
 Source: Google Inc.*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102602 CR for TS 38.101-1: Cleanup for spurious emissions for UE co-existence table**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0702 Cat: F (Rel-16)  
  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103160.**

**R4-2103160 CR for TS 38.101-1: Cleanup for spurious emissions for UE co-existence table**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0702 Cat: F (Rel-16)  
  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102603 CR for TS 38.101-1: Cleanup for spurious emissions for UE co-existence table**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0703 Cat: A (Rel-17)  
  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102685 CR on TS 38.101-1 NS\_49**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0710 Cat: F (Rel-16)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102816 CR on TS 38.101-1 NS\_49**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0713 Cat: A (Rel-17)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102903 CR on split band duplexer exceptions to non-default TX-RX separation**

*Type: CR For: Agreement  
 38.101-1 v15.12.0 CR-0714 Cat: F (Rel-15)  
  
 Source: Qualcomm Incorporated*

**Abstract:**

Proposes that only default TX-RX separation with the deviation of ?FTX-RX = | (BWDL – BWUL)/2 | for asymmetric BW case is permitted for n28 and n74

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2102904 Non-default RX-TX Frequency Separation Values and split band duplexers**

*Type: other For: Approval  
 38.101-1 v..  
 Source: Qualcomm Incorporated*

**Abstract:**

Proposes to add a note to table 5.4.4-1: For bands n28 and n74 UE that may support only the default TX-RX frequency separation value with the deviation of ?FTX-RX = | (BWDL – BWUL)/2 | for asymmetric BW case.

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102412 Notational amendment and correction to PCMAX for EN-DC**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0487 Cat: F (Rel-16)  
  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103165.**

**R4-2103165 Notational amendment and correction to PCMAX for EN-DC**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0487 Cat: F (Rel-16)  
  
 Source: Qualcomm Incorporated*

**Discussion:**

Chair: Please use “TEI16, NR\_newRAT-Core” in the WI code field in the CR coversheet.

**Decision: Agreed.**

**R4-2102413 Notational amendment and correction to PCMAX for EN-DC**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0488 Cat: A (Rel-17)  
  
 Source: Qualcomm Incorporated*

**Discussion:**

Chair: Please use “TEI16, NR\_newRAT-Core” in the WI code field in the CR coversheet.

**Decision: Agreed.**

**R4-2102826 CR for correction of Rel-16 Dual Connectivity of 1LTE band (1DL/1UL) and 1NR band (1DL/1UL) with FR1**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0495 Cat: F (Rel-16)  
  
 Source: Verizon Denmark*

**Discussion:**

[report of discussion]

**Decision: Postponed.**

## 8 Rel-16 UE feature list

**R4-2102962 Email discussion summary for [98e][114] R16\_UE\_ feature**

*Type: other For: Information  
 Source: Moderator (CMCC)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103304.**

**R4-2103304 Email discussion summary for [98e][114] R16\_UE\_ feature**

*Type: other For: Information  
 Source: Moderator (CMCC)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103168 Way forward on new per BC indication of the per-FR gap**

*Type: other For: Approval  
 Source: CMCC*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103366.**

**R4-2103366 Way forward on new per BC indication of the per-FR gap**

*Type: other For: Approval  
 Source: CMCC*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103367 Updated RAN4 UE features list for Rel-16**

*Type: other For: Approval  
 Source: CMCC*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103368 LS on updated Rel-16 RAN4 UE features lists for NR and LTE**

*Type: LS out For: Approval  
 Source: CMCC*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2101155 Discussion on UE feature list**

*Type: discussion For: Discussion  
 Source: MediaTek inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101659 Discussion on per-FR gap capability**

*Type: discussion For: Discussion  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102891 UE feature on Simultaneous dormant BWP switching**

*Type: discussion For: Discussion  
 38.306 v..  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

## 9 Rel-17 spectrum related Work Items for NR

### 9.1 NR intra band Carrier Aggregation for xCC DL/yCC UL including contiguous and non-contiguous spectrum (x>=y) [NR\_CA\_R17\_intra]

**R4-2102963 Email discussion summary for [98e][115] NR\_Baskets\_Part\_1**

*Type: other For: Information  
 Source: Moderator (Nokia)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

#### 9.1.1 Rapporteur Input (WID/TR/CR) [NR\_CA\_R17\_intra-Core /Perf]

**R4-2101883 Revised WID NR Intra-band Rel-17**

*Type: WID revised For: Endorsement  
 Source: Ericsson*

**Abstract:**

Revised WID NR Intra-band Rel-17

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101886 CR introduction completed band combinations Rel-17 NR Intra-band -> 38.101-1**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0657 Cat: B (Rel-17)  
  
 Source: Ericsson*

**Abstract:**

CR introduction completed band combinations Rel-17 NR Intra-band -> 38.101-1

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101887 CR introduction completed band combinations Rel-17 NR Intra-band -> 38.101-2**

*Type: CR For: Agreement  
 38.101-2 v17.0.0 CR-0332 Cat: B (Rel-17)  
  
 Source: Ericsson*

**Abstract:**

CR introduction completed band combinations Rel-17 NR Intra-band -> 38.101-2

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2101891 TR 38.717-01-01 v0.3.0 Rel-17 NR Intra-band**

*Type: draft TR For: Agreement  
 38.717-01-01 v0.2.0  
 Source: Ericsson*

**Abstract:**

TR 38.717-01-01 v0.3.0 Rel-17 NR Intra-band

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 9.1.2 UE RF for FR1 [NR\_CA\_R17\_intra-Core]

**R4-2100152 Draft CR addition of BCS2 for CA\_71B**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: Nokia, T-Mobile USA*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100707 Discussion on DL CA\_n77(3A) support**

*Type: discussion For: Discussion  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100708 TP for TR 38.717-01-01: CA\_3DL\_n77(3A)\_1UL\_n77A**

*Type: pCR For: Approval  
 38.717-01-01 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102319 Rel-17 CR 38.101-1 for improvements Intra-band tables**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0680 Cat: B (Rel-17)  
  
 Source: Ericsson*

**Abstract:**

Rel-17 CR 38.101-1 for improvements Intra-band tables

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103033.**

**R4-2103033 Rel-17 CR 38.101-1 for improvements Intra-band tables**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0680 Cat: B (Rel-17)  
  
 Source: Ericsson*

**Abstract:**

Rel-17 CR 38.101-1 for improvements Intra-band tables

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 9.1.3 UE RF for FR2 [NR\_CA\_R17\_intra-Core]

### 9.2 NR inter-band Carrier Aggregation/Dual Connectivity for 2 bands DL with x bands UL (x=1, 2) [NR\_CADC\_R17\_2BDL\_xBUL]

**R4-2102964 Email discussion summary for [98e][116] NR\_Baskets\_Part\_2**

*Type: other For: Information  
 Source: Moderator (Nokia)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

#### 9.2.1 Rapporteur Input (WID/TR/CR) [NR\_CADC\_R17\_2BDL\_xBUL-Core/Perf]

**R4-2102210 TP for TR38.717-02-01\_Removal of the sub-clauses under clause 7**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102222 Revised WID on Rel-17 NR Inter-band CA\_DC xUL\_2DL (x=1,2)**

*Type: WID revised For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2102223 CR to reflect the completed NR inter band CA DC combinations for 2 bands DL with up to 2 bands UL into TS 38.101-1**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102943 CR to reflect the completed NR inter band CA DC combinations for 2 bands DL with up to 2 bands UL into TS 38.101-1**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0715 Cat: B (Rel-17)  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102224 CR to reflect the completed NR inter band CA DC combinations for 2 bands DL with up to 2 bands UL into TS 38.101-3**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102944 CR to reflect the completed NR inter band CA DC combinations for 2 bands DL with up to 2 bands UL into TS 38.101-3**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0500 Cat: B (Rel-17)  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102304 TR 38.717-02-01 v0.3.0**

*Type: draft TR For: Agreement  
 38.717-02-01 v0.3.0  
 Source: ZTE Wistron Telecom AB*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 9.2.2 NR inter band CA without any FR2 band(s) [NR\_CADC\_R17\_2BDL\_xBUL-Core]

**R4-2100091 Draft CR on CA\_n1-n3, CA\_n1-n78, CA\_n3-n78**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: China Unicom*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2103034 Draft CR on CA\_n1-n3, CA\_n1-n78, CA\_n3-n78**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: China Unicom*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100155 Draft CR addition of CA\_n41-n71 configurations**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: Nokia, T-Mobile USA*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100156 Draft CR addition of CA\_n25A-n41(2A)-n71A**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: Nokia, T-Mobile USA*

**Discussion:**

[report of discussion]

**Decision:** The document was **withdrawn**.

**R4-2100259 draftCR for Rel-17 NR inter band CA DC combinations for 2 bands DL with up to 2 bands UL within FR1**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: Verizon Denmark*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103035.**

**R4-2103035 draftCR for Rel-17 NR inter band CA DC combinations for 2 bands DL with up to 2 bands UL within FR1**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: Verizon Denmark*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100694 Draft CR for TS 38.101-1: Support of n77(2A) for DC\_n28-n77**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100743 Introduction of new BCS to CA\_n5A-n66A and CA\_n5A-78A**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

CA\_n5A-n66A BCS1 and CA\_n5A-78A BCS1 are added.

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100942 Draft CR for 38.101-1 to introduce CA\_n3A-n78(2A) and CA\_n41-n78(2A)**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103036.**

**R4-2103036 Draft CR for 38.101-1 to introduce CA\_n3A-n78(2A) and CA\_n41-n78(2A)**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100943 TP for TR 38.717-02-01: CA\_n3-n18**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103037.**

**R4-2103037 TP for TR 38.717-02-01: CA\_n3-n18**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100944 TP for TR 38.717-02-01: CA\_n18-n41**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103038.**

**R4-2103038 TP for TR 38.717-02-01: CA\_n18-n41**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100945 TP for TR 38.717-02-01: CA\_n41-n77**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100947 TP for TR 38.717-02-01: DC\_n3-n41**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103039.**

**R4-2103039 TP for TR 38.717-02-01: DC\_n3-n41**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100948 TP for TR 38.717-02-01: DC\_n28-n41**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100949 TP for TR 38.717-02-01: DC\_n41-n77**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100950 TP for TR 38.717-02-01: DC\_n41-n78**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100973 TP for TR 38.717-02-01: CA\_n25-n29**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Samsung, TELUS, Bell mobility*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100974 TP for TR 38.717-02-01: CA\_n25-n71**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Samsung, TELUS, Bell mobility*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103102.**

**R4-2103102 TP for TR 38.717-02-01: CA\_n25-n71**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Samsung, TELUS, Bell mobility*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100975 TP for TR 38.717-02-01: CA\_n25-n77**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Samsung, TELUS, Bell mobility*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103040.**

**R4-2103040 TP for TR 38.717-02-01: CA\_n25-n77**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Samsung, TELUS, Bell mobility*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100976 TP for TR 38.717-02-01: CA\_n71-n77**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Samsung, TELUS, Bell mobility*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103041.**

**R4-2103041 TP for TR 38.717-02-01: CA\_n71-n77**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Samsung, TELUS, Bell mobility*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100977 TP for TR 38.717-02-01: CA\_n13-n25**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Samsung, TELUS, Bell mobility*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103042.**

**R4-2103042 TP for TR 38.717-02-01: CA\_n13-n25**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Samsung, TELUS, Bell mobility*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100978 TP for TR 38.717-02-01: CA\_n13-n66**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Samsung, TELUS, Bell mobility*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103043.**

**R4-2103043 TP for TR 38.717-02-01: CA\_n13-n66**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Samsung, TELUS, Bell mobility*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101512 DraftCR for 38.101-1 to add BCS1 for CA\_n41A-n66A and BCS0 for CA\_n41A-n66(2A)**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: Huawei, HiSilicon, Bell Mobility, Telus*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101599 TP for TR 38.717-02-01: CA\_n8A-n20A**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101600 TP for TR 38.717-02-01: CA\_n3A-n39A**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2103044 TP for TR 38.717-02-01: CA\_n3A-n39A**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2101601 DraftCR for 38.101-1 to add BCS1 for CA\_n1A-n7A**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101602 DraftCR for 38.101-1 to add BCS1 for CA\_n1A-n3A**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103045.**

**R4-2103045 DraftCR for 38.101-1 to add BCS1 for CA\_n1A-n3A**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103377.**

**R4-2103377 DraftCR for 38.101-1 to add BCS1 for CA\_n1A-n3A**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101894 draft CR for CA\_n46-n48 and DC\_n46-n48 configurations**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: Ericsson, Charter Communication*

**Abstract:**

draft CR for CA\_n46-n48 and DC\_n46-n48 configurations

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103046.**

**R4-2103046 draft CR for CA\_n46-n48 and DC\_n46-n48 configurations**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: Ericsson, Charter Communication*

**Abstract:**

draft CR for CA\_n46-n48 and DC\_n46-n48 configurations

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2102211 draft CR to TS38.101-3: Adding CA\_n39A-n258A**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2102212 TP for TR 38.716-02-00:CA\_n34A-n40A**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102314 TP for TR 38.717-02-01 to include CA\_n7-n77**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Ericsson, Bell Mobility*

**Abstract:**

TP for TR 38.717-02-01 to include CA\_n7-n77

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103047.**

**R4-2103047 TP for TR 38.717-02-01 to include CA\_n7-n77**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Ericsson, Bell Mobility*

**Abstract:**

TP for TR 38.717-02-01 to include CA\_n7-n77

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102315 draft CR to include CA\_n7-n78, CA\_n25-n41, CA\_n41-n77 BCS's**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Ericsson, Bell Mobility*

**Abstract:**

draft CR to include CA\_n7-n78, CA\_n25-n41, CA\_n41-n77 BCS's

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2102320 Rel-17 CR 38.101-1 for corrections NR CA 2, 3 and 4 band configuration tables**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0681 Cat: F (Rel-17)  
  
 Source: Ericsson*

**Abstract:**

Rel-17 CR 38.101-1 for corrections NR CA 2, 3 and 4 band configuration tables

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 9.2.3 NR inter band CA with at least one FR2 band [NR\_CADC\_R17\_2BDL\_xBUL-Core]

**R4-2100092 Draft CR on CA\_n1-n258, CA\_n3-n258, CA\_n78-n258**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: China Unicom*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2103048 Draft CR on CA\_n1-n258, CA\_n3-n258, CA\_n78-n258**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: China Unicom*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100154 Draft CR addition of CA\_n77-n258 configurations**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: Nokia, T-Mobile USA*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100263 draftCR for Rel-17 NR inter-band CA DC combination for 2 bands DL with up to 2 bands UL between FR1 and FR2**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Verizon Denmark*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100350 Draft CR for 38.101-3 to add n78-n257 inter-band CA configurations**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: SK Telecom*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100351 Draft CR for 38.101-3 to add n78C in DC\_n78-n257**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: SK Telecom*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100946 TP for TR 38.717-02-01: CA\_n41-n257**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103049.**

**R4-2103049 TP for TR 38.717-02-01: CA\_n41-n257**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100951 TP for TR 38.717-02-01: DC\_n41-n257**

*Type: pCR For: Approval  
 38.717-02-01 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Noted.**

### 9.3 DC of 1 LTE band and 1 NR band [DC\_R17\_1BLTE\_1BNR\_2DL2UL]

#### 9.3.1 Rapporteur Input (WID/TR/CR) [DC\_R17\_1BLTE\_1BNR\_2DL2UL-Core/Perf]

**R4-2101097 TR 37.717-11-11 v0.3.0 Rel-17 Dual Connectivity (DC) of 1 LTE band (1DL/1UL) and 1 NR band (1DL/1UL)**

*Type: draft TR For: Agreement  
 37.717-11-11 v0.1.0  
 Source: CHTTL*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101098 Revised WID: Rel-17 Dual Connectivity (DC) of 1 band LTE (1DL/1UL) and 1 NR band (1DL/1UL)**

*Type: WID revised For: Approval  
 Source: CHTTL*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101099 Big CR for Rel-17 Dual Connectivity (DC) of 1 LTE band (1DL/1UL) and 1 NR band (1DL/1UL)**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0455 Cat: B (Rel-17)  
  
 Source: CHTTL*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 9.3.2 EN-DC without FR2 band [DC\_R17\_1BLTE\_1BNR\_2DL2UL-Core]

**R4-2100258 Requirement of band 46 reference sensitivity measurement for NR EN-DC band combinations**

*Type: discussion For: Decision  
 Source: Verizon Denmark*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103009.**

**R4-2103009 Requirement of band 46 reference sensitivity measurement for NR EN-DC band combinations**

*Type: discussion For: Approval  
 Source: Verizon Denmark*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100260 draftCR for Rel-17Dual Connectivity of 1LTE band (1DL/1UL) and 1NR band (1DL/1UL) within FR1**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Verizon Denmark*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100261 draftCR for Rel-16 Dual Connectivity of 1LTE band (1DL/1UL) and 1NR band (1DL/1UL) with FR1**

*Type: draftCR For: Endorsement  
 38.101-3 v16.6.0  
 Source: Verizon Denmark*

**Discussion:**

[report of discussion]

**Decision:** The document was **withdrawn**.

**R4-2100301 Draft CR for 38.101-3 to introduce new inter-band EN-DC (1NR band +1LTE band) within FR1 DC\_40A\_n78(2A)/DC\_40C\_n78(2A)**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100302 Draft CR for 38.101-3 to introduce new inter-band EN-DC (1NR band +1LTE band) within FR1 DC\_8A\_n78(2A)**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100352 TP for DC\_21\_n28 for TR 37.717-11-11**

*Type: pCR For: Approval  
 37.717-11-11 v0.1.0  
 Source: NTT DOCOMO INC.*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100732 TP to TR 37.717-11-11 DC\_25\_n77**

*Type: other For: Approval  
 37.717-11-11 v..  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

In this contribution, a text proposal to complete 2DL/2UL EN-DC configurations, DC\_25A\_n77A and DC\_25A-25A\_n77A, is provided.

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103012.**

**R4-2103012 TP to TR 37.717-11-11 DC\_25\_n77**

*Type: other For: Approval  
 37.717-11-11 v..  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

In this contribution, a text proposal to complete 2DL/2UL EN-DC configurations, DC\_25A\_n77A and DC\_25A-25A\_n77A, is provided.

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100733 TP to TR 37.717-11-11 DC\_25\_n78**

*Type: other For: Approval  
 37.717-11-11 v..  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

In this contribution, a text proposal to complete 2DL/2UL EN-DC configurations, DC\_25A\_n78A and DC\_25A-25A\_n78A, is provided.

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103013.**

**R4-2103013 TP to TR 37.717-11-11 DC\_25\_n78**

*Type: other For: Approval  
 37.717-11-11 v..  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

In this contribution, a text proposal to complete 2DL/2UL EN-DC configurations, DC\_25A\_n78A and DC\_25A-25A\_n78A, is provided.

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101224 TP for DC\_21\_n28 for TR 37.717-11-11**

*Type: pCR For: Approval  
 37.717-11-11 v0.1.0  
 Source: NTT DOCOMO INC.*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103021.**

**R4-2103021 TP for DC\_21\_n28 for TR 37.717-11-11**

*Type: pCR For: Approval  
 37.717-11-11 v0.1.0  
 Source: NTT DOCOMO INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101584 TP for TR 37.717-11-11: DC\_12\_n71**

*Type: pCR For: Approval  
 37.717-11-11 v0.2.0  
 Source: Huawei, HiSilicon, Ericsson, US Cellular*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103026.**

**R4-2103026 TP for TR 37.717-11-11: DC\_12\_n71**

*Type: pCR For: Approval  
 37.717-11-11 v0.2.0  
 Source: Huawei, HiSilicon, Ericsson, US Cellular*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101909 TP for TR 37.717-11-11 to include 71A\_n41A**

*Type: pCR For: Approval  
 37.717-11-11 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-11 to include 71A\_n41A

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103027.**

**R4-2103027 TP for TR 37.717-11-11 to include 71A\_n41A**

*Type: pCR For: Approval  
 37.717-11-11 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-11 to include 71A\_n41A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101910 TP for TR 37.717-11-11 to include 7A\_n2A**

*Type: pCR For: Approval  
 37.717-11-11 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-11 to include 7A\_n2A

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101911 TP for TR 37.717-11-11 to include 71A\_n2A**

*Type: pCR For: Approval  
 37.717-11-11 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-11 to include 71A\_n2A

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103028.**

**R4-2103028 TP for TR 37.717-11-11 to include 71A\_n2A**

*Type: pCR For: Approval  
 37.717-11-11 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-11 to include 71A\_n2A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102045 draft CR 38.101-3 adding CA\_n7B UL configurations for 1 LTE + 1 NR**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Ericsson*

**Abstract:**

draft CR 38.101-3 adding CA\_n7B UL configurations for 1 LTE + 1 NR

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103029.**

**R4-2103029 draft CR 38.101-3 adding CA\_n7B UL configurations for 1 LTE + 1 NR**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Ericsson*

**Abstract:**

draft CR 38.101-3 adding CA\_n7B UL configurations for 1 LTE + 1 NR

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2102213 draft CR to TS38.101-3: Adding DC\_40A\_n41C and DC\_40A\_n41(2A)**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

#### 9.3.3 EN-DC with FR2 band [DC\_R17\_1BLTE\_1BNR\_2DL2UL-Core]

**R4-2100262 draftCR for Rel-17 Dual Connectivity of 1LTE band (1DL/1UL) and 1NR band (1DL/1UL) including FR2**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Verizon Denmark*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101896 draft CR 38.101-3 to include 2\_n258, 5\_n258, 12\_n258, 66\_n258 configurations**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Ericsson, US Cellular*

**Abstract:**

draft CR 38.101-3 to include 2\_n258, 5\_n258, 12\_n258, 66\_n258 configurations

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

### 9.4 DC of 2 LTE band and 1 NR band [DC\_R17\_2BLTE\_1BNR\_3DL2UL]

#### 9.4.1 Rapporteur Input (WID/TR/CR) [DC\_R17\_2BLTE\_1BNR\_3DL2UL-Core/Perf]

**R4-2101508 TR 37.717-21-11 V0.2.0 for DC of 2 LTE band and 1 NR band**

*Type: draft TR For: Agreement  
 37.717-21-11 v0.3.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101509 Revised WID: Dual Connectivity (DC) of 2 bands LTE inter-band CA (2DL/1UL) and 1 NR band (1DL/1UL)**

*Type: WID revised For: Endorsement  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101510 CR on introduction of completed EN-DC of 2 bands LTE and 1 band NR from RAN4#98e into TS 38.101-3**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0460 Cat: B (Rel-17)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 9.4.2 EN-DC without FR2 band [DC\_R17\_2BLTE\_1BNR\_3DL2UL-Core]

**R4-2100145 TP to TR 37.717-21-11: DC\_20-40\_n78**

*Type: pCR For: Approval  
 37.717-21-11 v0.2.0  
 Source: Nokia, Telefonica*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103006.**

**R4-2103006 TP to TR 37.717-21-11: DC\_20-40\_n78**

*Type: pCR For: Approval  
 37.717-21-11 v0.2.0  
 Source: Nokia, Telefonica*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100299 Discussion of MSD for 3DL2UL DC\_1-21\_n28 due to UL IMD3 issue**

*Type: pCR For: Approval  
 37.717-21-11 v0.1.0  
 Source: Mediatek India Technology Pvt.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100303 Draft CR for 38.101-3 to introduce new inter-band EN-DC (1NR band +2LTE band) within FR1 DC\_1A-40A\_n78(2A)/DC\_1A-40C\_n78(2A)**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100304 Draft CR for 38.101-3 to introduce new inter-band EN-DC (1NR band +2LTE band) within FR1 DC\_1A-8A\_n78(2A)**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100305 Draft CR for 38.101-3 to introduce new inter-band EN-DC (1NR band +2LTE band) within FR1 DC\_3A-40A\_n78(2A)/DC\_3A-40C\_n78(2A)**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100306 Draft CR for 38.101-3 to introduce new inter-band EN-DC (1NR band +2LTE band) within FR1 DC\_3A-8A\_n78(2A)**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100307 Draft CR for 38.101-3 to introduce new inter-band EN-DC (1NR band +2LTE band) within FR1 DC\_7A-40A\_n78(2A)/DC\_7A-40C\_n78(2A)**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100308 Draft CR for 38.101-3 to introduce new inter-band EN-DC (1NR band +2LTE band) within FR1 DC\_7A-8A\_n78(2A)**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100309 Draft CR for 38.101-3 to introduce new inter-band EN-DC (1NR band +2LTE band) within FR1 DC\_8A-40A\_n78(2A)/DC\_8A-40C\_n78(2A)**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100345 TP for TR 37.717-21-11: DC\_3-18\_n41**

*Type: pCR For: Approval  
 37.717-21-11 v0.1.0  
 Source: KDDI Corporation*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103010.**

**R4-2103010 TP for TR 37.717-21-11: DC\_3-18\_n41**

*Type: pCR For: Approval  
 37.717-21-11 v0.1.0  
 Source: KDDI Corporation*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100508 TP for DC\_1-21\_n28 for TR 37.717-21-11**

*Type: pCR For: Approval  
 37.717-21-11 v0.1.0  
 Source: NTT DOCOMO, INC. MediaTek Inc., LG Electronics*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100509 TP for DC\_3-21\_n28 for TR 37.717-21-11**

*Type: pCR For: Approval  
 37.717-21-11 v0.1.0  
 Source: NTT DOCOMO, INC.*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100642 TP update for TR 37.717-21-11: EN-DC\_1-11\_n28**

*Type: pCR For: Approval  
 37.717-21-11 v0.1.0  
 Source: SoftBank Corp., LG Electronics*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103011.**

**R4-2103011 TP update for TR 37.717-21-11: EN-DC\_1-11\_n28**

*Type: pCR For: Approval  
 37.717-21-11 v0.1.0  
 Source: SoftBank Corp., LG Electronics*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100734 TP to TR 37.717-21-11 DC\_7-25\_n77**

*Type: other For: Approval  
 37.717-21-11 v..  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

In this contribution, a text proposal to complete 3DL/2UL EN-DC configurations, DC\_7A-25A\_n77A, DC\_7A-7A-25A\_n77A, DC\_7C-25A\_n77A, DC\_7C-25A-25A\_n77A, DC\_7A-25A-25A\_n77A and DC\_7A-7A-25A-25A\_n77A, is provided.

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103014.**

**R4-2103014 TP to TR 37.717-21-11 DC\_7-25\_n77**

*Type: other For: Approval  
 37.717-21-11 v..  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

In this contribution, a text proposal to complete 3DL/2UL EN-DC configurations, DC\_7A-25A\_n77A, DC\_7A-7A-25A\_n77A, DC\_7C-25A\_n77A, DC\_7C-25A-25A\_n77A, DC\_7A-25A-25A\_n77A and DC\_7A-7A-25A-25A\_n77A, is provided.

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100735 TP to TR 37.717-21-11 DC\_7-25\_n78**

*Type: other For: Approval  
 37.717-21-11 v..  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

In this contribution, a text proposal to complete 3DL/2UL EN-DC configurations, DC\_7A-25A\_n78A, DC\_7A-7A-25A\_n78A, DC\_7C-25A\_n78A, DC\_7A-25A-25A\_n78A, DC\_7A-7A-25A-25A\_n78A, and DC\_7C-25A-25A\_n78A, is provided.

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103015.**

**R4-2103015 TP to TR 37.717-21-11 DC\_7-25\_n78**

*Type: other For: Approval  
 37.717-21-11 v..  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

In this contribution, a text proposal to complete 3DL/2UL EN-DC configurations, DC\_7A-25A\_n78A, DC\_7A-7A-25A\_n78A, DC\_7C-25A\_n78A, DC\_7A-25A-25A\_n78A, DC\_7A-7A-25A-25A\_n78A, and DC\_7C-25A-25A\_n78A, is provided.

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100736 TP to TR 37.717-21-11 DC\_25-66\_n77**

*Type: other For: Approval  
 37.717-21-11 v..  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

In this contribution, a text proposal to complete 3DL/2UL EN-DC configurations, DC\_25A-66A\_n77A and DC\_25A-25A-66A\_n77A, is provided.

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103016.**

**R4-2103016 TP to TR 37.717-21-11 DC\_25-66\_n77**

*Type: other For: Approval  
 37.717-21-11 v..  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

In this contribution, a text proposal to complete 3DL/2UL EN-DC configurations, DC\_25A-66A\_n77A and DC\_25A-25A-66A\_n77A, is provided.

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100737 TP to TR 37.717-21-11 DC\_25-66\_n78**

*Type: other For: Approval  
 37.717-21-11 v..  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

In this contribution, a text proposal to complete 3DL/2UL EN-DC configurations, DC\_25A-66A\_n78A and DC\_25A-25A-66A\_n78A, is provided

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103017.**

**R4-2103017 TP to TR 37.717-21-11 DC\_25-66\_n78**

*Type: other For: Approval  
 37.717-21-11 v..  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

In this contribution, a text proposal to complete 3DL/2UL EN-DC configurations, DC\_25A-66A\_n78A and DC\_25A-25A-66A\_n78A, is provided

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100983 TP for TR 37.717-21-11: DC\_2-29\_n78**

*Type: pCR For: Approval  
 37.717-21-11 v0.2.0  
 Source: Samsung, TELUS, Bell mobility*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103018.**

**R4-2103018 TP for TR 37.717-21-11: DC\_2-29\_n78**

*Type: pCR For: Approval  
 37.717-21-11 v0.2.0  
 Source: Samsung, TELUS, Bell mobility*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100984 TP for TR 37.717-21-11: DC\_29-66\_n78**

*Type: pCR For: Approval  
 37.717-21-11 v0.2.0  
 Source: Samsung, TELUS, Bell mobility*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103019.**

**R4-2103019 TP for TR 37.717-21-11: DC\_29-66\_n78**

*Type: pCR For: Approval  
 37.717-21-11 v0.2.0  
 Source: Samsung, TELUS, Bell mobility*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101230 TP for DC\_1-21\_n28 for TR 37.717-21-11**

*Type: pCR For: Approval  
 37.717-21-11 v0.1.0  
 Source: NTT DOCOMO INC. , MediaTek Inc., LG Electronics*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103022.**

**R4-2103022 TP for DC\_1-21\_n28 for TR 37.717-21-11**

*Type: pCR For: Approval  
 37.717-21-11 v0.1.0  
 Source: NTT DOCOMO INC. , MediaTek Inc., LG Electronics*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101231 TP for DC\_3-21\_n28 for TR 37.717-21-11**

*Type: pCR For: Approval  
 37.717-21-11 v0.1.0  
 Source: NTT DOCOMO INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101511 TP for 37.717-21-11: correction of duplicated TPS for some combinations**

*Type: pCR For: Approval  
 37.717-21-11 v17.0.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101520 DC\_2A-66A-66A\_n66A,DC\_7A-66A-66A\_n66A and DC\_7A-7A-66A-66A\_n66A**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei, HiSilicon, Bell Mobility, Telus*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101545 TP for TR 37.717-21-11: DC\_8-20\_n1**

*Type: pCR For: Approval  
 37.717-21-11 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103023.**

**R4-2103023 TP for TR 37.717-21-11: DC\_8-20\_n1**

*Type: pCR For: Approval  
 37.717-21-11 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101546 TP for TR 37.717-21-11: DC\_8-20\_n3**

*Type: pCR For: Approval  
 37.717-21-11 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103024.**

**R4-2103024 TP for TR 37.717-21-11: DC\_8-20\_n3**

*Type: pCR For: Approval  
 37.717-21-11 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101547 TP for TR 37.717-21-11: DC\_8-20\_n28**

*Type: pCR For: Approval  
 37.717-21-11 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101548 TP for TR 37.717-21-11: DC\_8-32\_n1**

*Type: pCR For: Approval  
 37.717-21-11 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101912 draft CR to include DC\_2-7\_n78 configuration**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Ericsson, Rogers*

**Abstract:**

draft CR to include DC\_2-7\_n78 configuration

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101913 TP for TR 37.717-21-11 to include 12A-66A\_n41A**

*Type: pCR For: Approval  
 37.717-21-11 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-21-11 to include 12A-66A\_n41A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101914 TP for TR 37.717-21-11 to include 2A-12A\_n41A, 2A-2A-12A\_n41A**

*Type: pCR For: Approval  
 37.717-21-11 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-21-11 to include 2A-12A\_n41A, 2A-2A-12A\_n41A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101915 TP for TR 37.717-21-11 to include 66A-71A\_n41A**

*Type: pCR For: Approval  
 37.717-21-11 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-21-11 to include 66A-71A\_n41A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101916 TP for TR 37.717-21-11 to include 2A-71A\_n41A, 2A-2A-71A\_n41A**

*Type: pCR For: Approval  
 37.717-21-11 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-21-11 to include 2A-71A\_n41A, 2A-2A-71A\_n41A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101917 TP for TR 37.717-21-11 to include 7A-12A\_n66A**

*Type: pCR For: Approval  
 37.717-21-11 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-21-11 to include 7A-12A\_n66A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101918 TP for TR 37.717-21-11 to include 7A-71A\_n66A**

*Type: pCR For: Approval  
 37.717-21-11 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-21-11 to include 7A-71A\_n66A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101919 TP for TR 37.717-21-11 to include 7A-12A\_n78A**

*Type: pCR For: Approval  
 37.717-21-11 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-21-11 to include 7A-12A\_n78A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101920 TP for TR 37.717-21-11 to include 12A-66A\_n78A**

*Type: pCR For: Approval  
 37.717-21-11 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-21-11 to include 12A-66A\_n78A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101921 TP for TR 37.717-21-11 to include 2A-12A\_78A, 2A-2A-12A\_78A**

*Type: pCR For: Approval  
 37.717-21-11 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-21-11 to include 2A-12A\_78A, 2A-2A-12A\_78A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102046 draft CR 38.101-3 adding CA\_n7B UL configurations for 2 LTE + 1 NR**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Ericsson*

**Abstract:**

draft CR 38.101-3 adding CA\_n7B UL configurations for 2 LTE + 1 NR

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103030.**

**R4-2103030 draft CR 38.101-3 adding CA\_n7B UL configurations for 2 LTE + 1 NR**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Ericsson*

**Abstract:**

draft CR 38.101-3 adding CA\_n7B UL configurations for 2 LTE + 1 NR

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2102050 TP for TR 37.717-21-11 to include 7A-71A\_n78A**

*Type: pCR For: Approval  
 37.717-21-11 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-21-11 to include 7A-71A\_n78A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102318 draft CR to include DC\_2-7\_n66 configuration**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Ericsson, Bell Mobility*

**Abstract:**

draft CR to include DC\_2-7\_n66 configuration

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

#### 9.4.3 DMEN-DC with FR2 band [DC\_R17\_2BLTE\_1BNR\_3DL2UL-Core]

**R4-2100696 Draft CR for TS 38.101-3: Support of DC\_3-11\_n257**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

### 9.5 DC of 3 LTE band and 1 NR band [DC\_R17\_3BLTE\_1BNR\_4DL2UL]

#### 9.5.1 Rapporteur Input (WID/TR/CR) [DC\_R17\_3BLTE\_1BNR\_4DL2UL-Core/Perf]

**R4-2101884 Revised WID LTE 3DL and one NR band Rel-17**

*Type: WID revised For: Endorsement  
 Source: Ericsson*

**Abstract:**

Revised WID LTE 3DL and one NR band Rel-17

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101888 CR introduction completed band combinations LTE 3DL and one NR band -> 38.101-3**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0471 Cat: B (Rel-17)  
  
 Source: Ericsson*

**Abstract:**

CR introduction completed band combinations LTE 3DL and one NR band -> 38.101-3

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101892 TR 37.717-31-11 v0.3.0 Rel-17 DC combinations LTE 3DL and one NR band**

*Type: draft TR For: Agreement  
 37.717-31-11 v0.2.0  
 Source: Ericsson*

**Abstract:**

TR 37.717-31-11 v0.3.0 Rel-17 DC combinations LTE 3DL and one NR band

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 9.5.2 EN-DC without FR2 band [DC\_R17\_3BLTE\_1BNR\_4DL2UL-Core]

**R4-2100146 TP to TR 37.717-31-11: DC\_1-20-40\_n78**

*Type: pCR For: Approval  
 37.717-31-11 v0.2.0  
 Source: Nokia, Telefonica*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103007.**

**R4-2103007 TP to TR 37.717-31-11: DC\_1-20-40\_n78**

*Type: pCR For: Approval  
 37.717-31-11 v0.2.0  
 Source: Nokia, Telefonica*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100310 Draft CR for 38.101-3 to introduce new inter-band EN-DC (1NR band +3LTE band) within FR1 DC\_1A-3A-40A\_n78(2A)/DC\_1A-3A-40C\_n78(2A)**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100311 Draft CR for 38.101-3 to introduce new inter-band EN-DC (1NR band +3LTE band) within FR1 DC\_1A-3A-8A\_n78(2A)**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100312 Draft CR for 38.101-3 to introduce new inter-band EN-DC (1NR band +3LTE band) within FR1 DC\_1A-7A-40A\_n78(2A)/DC\_1A-7A-40C\_n78(2A)**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100313 Draft CR for 38.101-3 to introduce new inter-band EN-DC (1NR band +3LTE band) within FR1 DC\_1A-7A-8A\_n78(2A)**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100314 Draft CR for 38.101-3 to introduce new inter-band EN-DC (1NR band +3LTE band) within FR1 DC\_1A-8A-40A\_n78(2A)/DC\_1A-8A-40C\_n78(2A)**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100315 Draft CR for 38.101-3 to introduce new inter-band EN-DC (1NR band +3LTE band) within FR1 DC\_3A-7A-40A\_n78(2A)/DC\_3A-7A-40C\_n78(2A)**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100316 Draft CR for 38.101-3 to introduce new inter-band EN-DC (1NR band +3LTE band) within FR1 DC\_3A-7A-8A\_n78(2A)**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100317 Draft CR for 38.101-3 to introduce new inter-band EN-DC (1NR band +3LTE band) within FR1 DC\_3A-8A-40A\_n78(2A)/DC\_3A-8A-40C\_n78(2A)**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100318 Draft CR for 38.101-3 to introduce new inter-band EN-DC (1NR band +3LTE band) within FR1 DC\_7A-8A-40A\_n78(2A)/DC\_7A-8A-40C\_n78(2A)**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100652 TP for TR 37.717-31-11: EN-DC\_1-8-42\_n3**

*Type: pCR For: Approval  
 37.717-31-11 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100671 TP for TR 37.717-31-11: EN-DC\_1-3-42\_n28**

*Type: pCR For: Approval  
 37.717-31-11 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100742 Introduction of DC\_7-25-66\_n77 and DC\_7-25-66\_n78**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

Introduce new config of DC bands, DC\_7-25-66\_n77 and D\_7-25-66\_n78

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100985 TP for TR 37.717-31-11: DC\_2-29-66\_n78**

*Type: pCR For: Approval  
 37.717-31-11 v0.2.0  
 Source: Samsung, TELUS, Bell mobility*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2103020 TP for TR 37.717-31-11: DC\_2-29-66\_n78**

*Type: pCR For: Approval  
 37.717-31-11 v0.2.0  
 Source: Samsung, TELUS, Bell mobility*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2101518 DraftCR for 38.101-3 to add DC\_7A-7A-13A-66A\_n66A, DC\_2A-7A-66A-66A\_n66A and DC\_2A-7A-7A-66A-66A\_n66A**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei, HiSilicon, Bell Mobility, Telus*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101549 TP for TR 37.717-31-11: DC\_1-8-20\_n28**

*Type: pCR For: Approval  
 37.717-31-11 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101550 TP for TR 37.717-31-11: DC\_7-8-20\_n1**

*Type: pCR For: Approval  
 37.717-31-11 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101551 TP for TR 37.717-31-11: DC\_7-8-20\_n3**

*Type: pCR For: Approval  
 37.717-31-11 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101552 TP for TR 37.717-31-11: DC\_7-8-32\_n1**

*Type: pCR For: Approval  
 37.717-31-11 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101553 TP for TR 37.717-31-11: DC\_7-20-32\_n78**

*Type: pCR For: Approval  
 37.717-31-11 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101554 TP for TR 37.717-31-11: DC\_8-20-32\_n1**

*Type: pCR For: Approval  
 37.717-31-11 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101895 TP to TR TR 37.717-31-11 to include 3-20-40\_n78**

*Type: pCR For: Approval  
 37.717-31-11 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP to TR TR 37.717-31-11 to include 3-20-40\_n78

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102019 TP to TR TR 37.717-31-11 to include DC\_1A-7A-28A\_n3A**

*Type: pCR For: Approval  
 37.717-31-11 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP to TR TR 37.717-31-11 to include DC\_1A-7A-28A\_n3A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102020 TP to TR 37.717-31-11 to include 2A-12A-66A\_n41A, 2A-2A-12A-66A\_n41A**

*Type: pCR For: Approval  
 37.717-31-11 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP to TR 37.717-31-11 to include 2A-12A-66A\_n41A, 2A-2A-12A-66A\_n41A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102021 TP to TR 37.717-31-11 to include 2A-66A-71A\_n41A, 2A-2A-66A-71A\_n41A**

*Type: pCR For: Approval  
 37.717-31-11 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP to TR 37.717-31-11 to include 2A-66A-71A\_n41A, 2A-2A-66A-71A\_n41A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102022 TP to TR 37.717-31-11 to include 2A-7A-12A\_n66A, 2A-2A-7A-12A\_n66A**

*Type: pCR For: Approval  
 37.717-31-11 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP to TR 37.717-31-11 to include 2A-7A-12A\_n66A, 2A-2A-7A-12A\_n66A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102023 TP to TR 37.717-31-11 to include 2A-2A-5A-7A\_n66A**

*Type: pCR For: Approval  
 37.717-31-11 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP to TR 37.717-31-11 to include 2A-2A-5A-7A\_n66A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102024 TP to TR 37.717-31-11 to include 2A-7A-71A\_n66A, 2A-2A-7A-71A\_n66A**

*Type: pCR For: Approval  
 37.717-31-11 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP to TR 37.717-31-11 to include 2A-7A-71A\_n66A, 2A-2A-7A-71A\_n66A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102025 TP to TR 37.717-31-11 to include 2A-7A-12A\_n78A, 2A-2A-7A-12A\_n78A**

*Type: pCR For: Approval  
 37.717-31-11 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP to TR 37.717-31-11 to include 2A-7A-12A\_n78A, 2A-2A-7A-12A\_n78A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102026 TP to TR 37.717-31-11 to include 2A-12A-66A\_n78A, 2A-2A-12A-66A\_n78A**

*Type: pCR For: Approval  
 37.717-31-11 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP to TR 37.717-31-11 to include 2A-12A-66A\_n78A, 2A-2A-12A-66A\_n78A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102027 TP to TR 37.717-31-11 to include 7A-12A-66A\_n78A**

*Type: pCR For: Approval  
 37.717-31-11 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP to TR 37.717-31-11 to include 7A-12A-66A\_n78A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102028 TP to TR 37.717-31-11 to include 7A-66A-71A\_n78A**

*Type: pCR For: Approval  
 37.717-31-11 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP to TR 37.717-31-11 to include 7A-66A-71A\_n78A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102029 TP to TR 37.717-31-11 to include 2A-7A-71A\_n78A, 2A-2A-7A-71A\_n78A**

*Type: pCR For: Approval  
 37.717-31-11 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP to TR 37.717-31-11 to include 2A-7A-71A\_n78A, 2A-2A-7A-71A\_n78A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102030 TP to TR 37.717-31-11 to include 2A-7A-66A\_n2A**

*Type: pCR For: Approval  
 37.717-31-11 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP to TR 37.717-31-11 to include 2A-7A-66A\_n2A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102031 TP to TR 37.717-31-11 to include 2A-5A-7A\_n2A**

*Type: pCR For: Approval  
 37.717-31-11 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP to TR 37.717-31-11 to include 2A-5A-7A\_n2A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102032 TP to TR 37.717-31-11 to include 5A-7A-66A\_n2A**

*Type: pCR For: Approval  
 37.717-31-11 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP to TR 37.717-31-11 to include 5A-7A-66A\_n2A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102033 TP to TR 37.717-31-11 to include 2A-7A-71A\_n2A**

*Type: pCR For: Approval  
 37.717-31-11 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP to TR 37.717-31-11 to include 2A-7A-71A\_n2A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102034 TP to TR 37.717-31-11 to include 2A-66A-71A\_n2A**

*Type: pCR For: Approval  
 37.717-31-11 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP to TR 37.717-31-11 to include 2A-66A-71A\_n2A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102035 TP to TR 37.717-31-11 to include 2A-7A-12A\_n2A**

*Type: pCR For: Approval  
 37.717-31-11 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP to TR 37.717-31-11 to include 2A-7A-12A\_n2A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102036 TP to TR 37.717-31-11 to include 7A-66A-71A\_n2A**

*Type: pCR For: Approval  
 37.717-31-11 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP to TR 37.717-31-11 to include 7A-66A-71A\_n2A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102037 7TP to TR 37.717-31-11 to include 7A-12A-66A\_n2A**

*Type: pCR For: Approval  
 37.717-31-11 v0.2.0  
 Source: Ericsson*

**Abstract:**

7TP to TR 37.717-31-11 to include 7A-12A-66A\_n2A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102047 draft CR 38.101-3 adding CA\_n7B UL configurations for 3 LTE + 1 NR**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Ericsson*

**Abstract:**

draft CR 38.101-3 adding CA\_n7B UL configurations for 3 LTE + 1 NR

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103032.**

**R4-2103032 draft CR 38.101-3 adding CA\_n7B UL configurations for 3 LTE + 1 NR**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Ericsson*

**Abstract:**

draft CR 38.101-3 adding CA\_n7B UL configurations for 3 LTE + 1 NR

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2102051 draft CR to include DC\_2-7-66\_n71, DC\_2-7-66\_n78 configurations**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Ericsson, Rogers*

**Abstract:**

draft CR to include DC\_2-7-66\_n71, DC\_2-7-66\_n78 configurations

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2102317 draft CR to include DC\_2-7-13\_n66 configurations**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Ericsson, Bell Mobility*

**Abstract:**

draft CR to include DC\_2-7-13\_n66 configurations

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

#### 9.5.3 EN-DC with FR2 band [DC\_R17\_3BLTE\_1BNR\_4DL2UL-Core]

**R4-2100702 Draft CR for TS 38.101-3: Support of DC\_1-3-11\_n257 and DC\_3-8-11\_n257**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

### 9.6 DC of 4 LTE band and 1 NR band [DC\_R17\_4BLTE\_1BNR\_5DL2UL]

#### 9.6.1 Rapporteur Input (WID/TR/CR) [DC\_R17\_4BLTE\_1BNR\_5DL2UL-Core/Perf]

**R4-2101924 Revised Rel-17 WID on DC of 4 bands LTE inter-band CA (4DL1UL) and 1 NR band (1DL1UL)**

*Type: WID revised For: Endorsement  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

Inclusion of requests provided at RAN4#98

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101925 CR to introduce new combinations of LTE 4band + NR 1band for TS 38.101-3**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0473 Cat: B (Rel-17)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

Inclusion of approved combinations provided at RAN4#98

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101926 draft TR 37.717-41-11 v0.3.0**

*Type: draft TR For: Agreement  
 37.717-41-11 v0.2.0  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

Inclusion of TPs provided at RAN4#98

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 9.6.2 EN-DC without FR2 band [DC\_R17\_4BLTE\_1BNR\_5DL2UL-Core]

**R4-2100147 TP to TR 37.717-41-11: DC\_1-3-20-40\_n78**

*Type: pCR For: Approval  
 37.717-41-11 v0.2.0  
 Source: Nokia, Telefonica*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103008.**

**R4-2103008 TP to TR 37.717-41-11: DC\_1-3-20-40\_n78**

*Type: pCR For: Approval  
 37.717-41-11 v0.2.0  
 Source: Nokia, Telefonica*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100319 Draft CR for 38.101-3 to introduce new inter-band EN-DC (1NR band +4LTE band) within FR1 DC\_1A-3A-7A-40A\_n78(2A)/DC\_1A-3A-7A-40C\_n78(2A)**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100320 Draft CR for 38.101-3 to introduce new inter-band EN-DC (1NR band +4LTE band) within FR1 DC\_1A-3A-7A-8A\_n78(2A)**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100321 Draft CR for 38.101-3 to introduce new inter-band EN-DC (1NR band +4LTE band) within FR1 DC\_1A-3A-8A-40A\_n78(2A)/DC\_1A-3A-8A-40C\_n78(2A)**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100322 Draft CR for 38.101-3 to introduce new inter-band EN-DC (1NR band +4LTE band) within FR1 DC\_1A-7A-8A-40A\_n78(2A)/DC\_1A-7A-8A-40C\_n78(2A)**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100323 Draft CR for 38.101-3 to introduce new inter-band EN-DC (1NR band +4LTE band) within FR1 DC\_3A-7A-8A-40A\_n78(2A)/DC\_3A-7A-8A-40C\_n78(2A)**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100672 TP for TR 37.717-41-11: EN-DC\_1-3-8-11\_n28**

*Type: pCR For: Approval  
 37.717-41-11 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100673 TP for TR 37.717-41-11: EN-DC\_1-3-8-11\_n77**

*Type: pCR For: Approval  
 37.717-41-11 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101519 DraftCR for 38.101-3 to add DC\_2A-7A-7A-13A-66A\_N66a and DC\_2A-5A-7A-7A-66A\_n66A**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei, HiSilicon, Bell Mobility, Telus*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101562 TP for TR 37.717-41-11: DC\_1-7-8-20\_n3**

*Type: pCR For: Approval  
 37.717-41-11 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101563 TP for TR 37.717-41-11: DC\_1-7-8-20\_n28**

*Type: pCR For: Approval  
 37.717-41-11 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101573 TP for TR 37.717-41-11: DC\_1-7-8-20\_n78**

*Type: pCR For: Approval  
 37.717-41-11 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101574 TP for TR 37.717-41-11: DC\_7-8-20-32\_n1**

*Type: pCR For: Approval  
 37.717-41-11 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102038 TP to TR 37.717-41-11 to include 2A-7A-12A-66A\_n78A, 2A-2A-7A-12A-66A\_n78A**

*Type: pCR For: Approval  
 37.717-41-11 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP to TR 37.717-41-11 to include 2A-7A-12A-66A\_n78A,2A-2A-7A-12A-66A\_n78A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102039 TP to TR 37.717-41-11 to include 2A-7A-66A-71A\_n78A, 2A-2A-7A-66A-71A\_n78A**

*Type: pCR For: Approval  
 37.717-41-11 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP to TR 37.717-41-11 to include 2A-7A-66A-71A\_n78A, 2A-2A-7A-66A-71A\_n78A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102040 TP to TR 37.717-41-11 to include 2A-5A-7A-66A\_n2A**

*Type: pCR For: Approval  
 37.717-41-11 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP to TR 37.717-41-11 to include 2A-5A-7A-66A\_n2A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102041 TP to TR 37.717-41-11 to include 2A-7A-66A-71A\_n2A**

*Type: pCR For: Approval  
 37.717-41-11 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP to TR 37.717-41-11 to include 2A-7A-66A-71A\_n2A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102042 TP to TR 37.717-41-11 to include 2A-7A-12A-66A\_n2A**

*Type: pCR For: Approval  
 37.717-41-11 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP to TR 37.717-41-11 to include 2A-7A-12A-66A\_n2A

**Discussion:**

[report of discussion]

**Decision: Approved.**

#### 9.6.3 EN-DC with FR2 band [DC\_R17\_4BLTE\_1BNR\_5DL2UL-Core]

**R4-2100704 Draft CR for TS 38.101-3: Support of DC\_1-3-8-11\_n257**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

### 9.7 DC of x bands (x=1,2, 3, 4) LTE inter-band CA and 2 bands NR inter-band CA [DC\_R17\_xBLTE\_2BNR\_yDL2UL]

#### 9.7.1 Rapporteur Input (WID/TR/CR) [DC\_R17\_xBLTE\_2BNR\_yDL2UL-Core/Per]

**R4-2100272 TR 37.717-11-21 v0.3.0 TR update: LTE(xDL/1UL)+ NR(2DL/1UL) DC in Rel-17**

*Type: draft TR For: Agreement  
 37.717-11-21 v0.3.0  
 Source: LG Electronics France*

**Abstract:**

Update TR to capture approved TPs for LTE(xDL/1UL)+ NR(2DL/1UL) DC band combos.

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100275 Revised WID on LTE (xDL/UL x=1.2,3,4) with NR 2 bands (2DL/1UL) DC in Rel-17**

*Type: WID revised For: Endorsement  
 Source: LG Electronics France*

**Abstract:**

Revised WID to capture new NR DC combos and update the status for each DC band combos for LTE (xDL/UL x=1.2,3,4) with NR 2 bands (2DL/1UL) DC band combos

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100277 Introduction CR on new NR DC LTE(xDL/1UL)+ NR(2DL/1UL) band combinations in Rel-17**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0438 Cat: B (Rel-17)  
  
 Source: LG Electronics France*

**Abstract:**

Big CR to add new DC combos in TS38.101-3 in Rel-17

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 9.7.2 EN-DC including NR inter CA without FR2 band [DC\_R17\_xBLTE\_2BNR\_yDL2UL-Core]

**R4-2100278 TP on summary of self-interference analysis for new NR DC LTE(xDL/1UL)+ NR(2DL/1UL) DC in Rel-17**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: LG Electronics France*

**Abstract:**

propose TP to add the self interference analysis results for the new DC band combos

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100279 MSD anlaysis results for new DC band combinations**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: LG Electronics France*

**Abstract:**

Propose MSD levels for the new DC band combos with self interfered problems

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103050.**

**R4-2103050 MSD anlaysis results for new DC band combinations**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: LG Electronics France*

**Abstract:**

Propose MSD levels for the new DC band combos with self interfered problems

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100298 Discussion of MSD for 3DL2UL DC\_21\_n28-n79 due to UL IMD issues**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: Mediatek India Technology Pvt.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100300 TP for TR 37.717-11-21: to update DC\_18\_n3-n41 with IMD3 MSD**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: Mediatek India Technology Pvt.*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103051.**

**R4-2103051 TP for TR 37.717-11-21: to update DC\_18\_n3-n41 with IMD3 MSD**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: Mediatek India Technology Pvt.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100325 TP for TR 37.717-11-21:DC\_3A-40A\_n1A-n78A/DC\_3A-40C\_n1A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103052.**

**R4-2103052 TP for TR 37.717-11-21:DC\_3A-40A\_n1A-n78A/DC\_3A-40C\_n1A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100326 TP for TR 37.717-11-21:DC\_7A-40A\_n1A-n78A/DC\_7A-40C\_n1A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103053.**

**R4-2103053 TP for TR 37.717-11-21:DC\_7A-40A\_n1A-n78A/DC\_7A-40C\_n1A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100327 TP for TR 37.717-11-21:DC\_8A-40A\_n1A-n78A/DC\_8A-40C\_n1A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103054.**

**R4-2103054 TP for TR 37.717-11-21:DC\_8A-40A\_n1A-n78A/DC\_8A-40C\_n1A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100328 TP for TR 37.717-11-21:DC\_3A-7A-40A\_n1A-n78A/DC\_3A-7A-40C\_n1A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103055.**

**R4-2103055 TP for TR 37.717-11-21:DC\_3A-7A-40A\_n1A-n78A/DC\_3A-7A-40C\_n1A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100329 TP for TR 37.717-11-21:DC\_3A-8A-40A\_n1A-n78A/DC\_3A-8A-40C\_n1A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103056.**

**R4-2103056 TP for TR 37.717-11-21:DC\_3A-8A-40A\_n1A-n78A/DC\_3A-8A-40C\_n1A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100330 TP for TR 37.717-11-21:DC\_7A-8A-40A\_n1A-n78A/DC\_7A-8A-40C\_n1A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103057.**

**R4-2103057 TP for TR 37.717-11-21:DC\_7A-8A-40A\_n1A-n78A/DC\_7A-8A-40C\_n1A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100331 TP for TR 37.717-11-21:DC\_3A-7A-8A-40A\_n1A-n78A/DC\_3A-7A-8A-40C\_n1A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103058.**

**R4-2103058 TP for TR 37.717-11-21:DC\_3A-7A-8A-40A\_n1A-n78A/DC\_3A-7A-8A-40C\_n1A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100346 TP for TR 37.717-11-21: DC\_1-3-18\_n3-n41**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: KDDI Corporation*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103059.**

**R4-2103059 TP for TR 37.717-11-21: DC\_1-3-18\_n3-n41**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: KDDI Corporation*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100347 TP for TR 37.717-11-21: DC\_1-3-18\_n28-n41**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: KDDI Corporation*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103060.**

**R4-2103060 TP for TR 37.717-11-21: DC\_1-3-18\_n28-n41**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: KDDI Corporation*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100348 TP for TR 37.717-11-21: DC\_1-3-18\_n41-n77**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: KDDI Corporation*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103061.**

**R4-2103061 TP for TR 37.717-11-21: DC\_1-3-18\_n41-n77**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: KDDI Corporation*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100349 TP for TR 37.717-11-21: DC\_1-3-18\_n41-n78**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: KDDI Corporation*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103062.**

**R4-2103062 TP for TR 37.717-11-21: DC\_1-3-18\_n41-n78**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: KDDI Corporation*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100503 TP for DC\_1\_n28-n79 for TR 37.717-11-21**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: NTT DOCOMO, INC. MediaTek Inc., LG Electronics*

**Discussion:**

[report of discussion]

**Decision:** The document was **withdrawn**.

**R4-2100504 TP for DC\_3\_n28-n79 for TR 37.717-11-21**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: NTT DOCOMO, INC. MediaTek Inc., LG Electronics*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100505 TP for DC\_21\_n28-n77 for TR 37.717-11-21**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: NTT DOCOMO, INC. MediaTek Inc., LG Electronics*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100506 TP for DC\_21\_n28-n78 for TR 37.717-11-21**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: NTT DOCOMO, INC. MediaTek Inc., LG Electronics*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100507 TP for DC\_21\_n28-n79 for TR 37.717-11-21**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: NTT DOCOMO, INC. MediaTek Inc., LG Electronics*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100643 TP update for TR 37.717-11-21: EN-DC\_11\_n3-n77**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100644 TP update for TR 37.717-11-21: EN-DC\_11\_n28-n77**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100649 TP for TR 37.717-11-21: EN-DC\_3-11\_n28-n77**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100650 TP for TR 37.717-11-21: EN-DC\_8-11\_n28-n77**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100653 TP for TR 37.717-11-21: EN-DC\_1-11\_n3-n77**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100654 TP for TR 37.717-11-21: EN-DC\_8-11\_n3-n77**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100660 TP for TR 37.717-11-21: EN-DC\_1-11\_n28-n77**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100663 TP for TR 37.717-11-21: EN-DC\_1-42\_n3-n28**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100666 TP for TR 37.717-11-21: EN-DC\_1-42\_n3-n77**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100667 TP for TR 37.717-11-21: EN-DC\_8-42\_n3-n28**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100668 TP for TR 37.717-11-21: EN-DC\_8-42\_n3-n77**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100674 TP for TR 37.717-11-21: EN-DC\_1-8-11\_n3-n28**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100675 TP for TR 37.717-11-21: EN-DC\_1-8-11\_n3-n77**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100676 TP for TR 37.717-11-21: EN-DC\_1-3-11\_n28-n77**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100677 TP for TR 37.717-11-21: EN-DC\_1-8-11\_n28-n77**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100678 TP for TR 37.717-11-21: EN-DC\_1-8-42\_n3-n28**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100679 TP for TR 37.717-11-21: EN-DC\_1-8-42\_n3-n77**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100680 TP for TR 37.717-11-21: EN-DC\_3-8-11\_n28-n77**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100688 TP for TR 37.717-11-21: EN-DC\_1-3-42\_n28-n77**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100689 TP for TR 37.717-11-21: EN-DC\_1-3-8-11\_n28-n77**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100706 MSD evaluation for TR 37.717-11-21**

*Type: discussion For: Approval  
 37.717-11-21 v..  
 Source: MediaTek Inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101190 TP for DC\_1-21\_n28-n77 for TR 37.717-11-21**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: NTT DOCOMO INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101191 TP for DC\_1-21\_n28-n78 for TR 37.717-11-21**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: NTT DOCOMO INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101192 TP for DC\_1-21\_n28-n79 for TR 37.717-11-21**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: NTT DOCOMO INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101193 TP for DC\_1-3\_n28-n79 for TR 37.717-11-21**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: NTT DOCOMO INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101194 TP for DC\_3-21\_n28-n77 for TR 37.717-11-21**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: NTT DOCOMO INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101195 TP for DC\_3-21\_n28-n78 for TR 37.717-11-21**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: NTT DOCOMO INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101196 TP for DC\_3-21\_n28-n79 for TR 37.717-11-21**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: NTT DOCOMO INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101225 TP for DC\_1\_n28-n79 for TR 37.717-11-21**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: NTT DOCOMO INC., MediaTek Inc., LG Electronics*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101226 TP for DC\_3\_n28-n79 for TR 37.717-11-21**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: NTT DOCOMO INC., MediaTek Inc., LG Electronics*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101227 TP for DC\_21\_n28-n77 for TR 37.717-11-21**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: NTT DOCOMO INC. , MediaTek Inc., LG Electronics*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101228 TP for DC\_21\_n28-n78 for TR 37.717-11-21**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: NTT DOCOMO INC. , MediaTek Inc., LG Electronics*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101229 TP for DC\_21\_n28-n79 for TR 37.717-11-21**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: NTT DOCOMO INC. , MediaTek Inc., LG Electronics*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103063.**

**R4-2103063 TP for DC\_21\_n28-n79 for TR 37.717-11-21**

*Type: pCR For: Approval  
 37.717-11-21 v0.1.0  
 Source: NTT DOCOMO INC. , MediaTek Inc., LG Electronics*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101585 TP for TR 37.717-11-21:DC\_8A\_n28A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103064.**

**R4-2103064 TP for TR 37.717-11-21:DC\_8A\_n28A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101586 TP for TR 37.717-11-21:DC\_1A-8A\_n28A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101587 TP for TR 37.717-11-21:DC\_3A-8A\_n28A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101588 TP for TR 37.717-11-21:DC\_7A-8A\_n28A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101589 TP for TR 37.717-11-21:DC\_1A-3A-8A\_n28A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103065.**

**R4-2103065 TP for TR 37.717-11-21:DC\_1A-3A-8A\_n28A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101590 TP for TR 37.717-11-21:DC\_1A-7A-8A\_n28A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101591 TP for TR 37.717-11-21:DC\_3A-7A-8A\_n28A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101592 TP for TR 37.717-11-21:DC\_1A-3A-7A-8A\_n28A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101593 Updated TP for TR 37.717-11-21:DC\_3C-20A\_n1A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101594 Updated TP for TR 37.717-11-21:DC\_3C-7A-20A\_n1A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101897 TP for TR 37.717-11-21 to include DC\_3A-28A\_n1A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP for TR 37.717-11-21 to include DC\_3A-28A\_n1A-n78A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101898 TP for TR 37.717-11-21 to include DC\_7A-28A\_n1A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP for TR 37.717-11-21 to include DC\_7A-28A\_n1A-n78A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101899 TP for TR 37.717-11-21 to include DC\_3A-7A-28A\_n1A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP for TR 37.717-11-21 to include DC\_3A-7A-28A\_n1A-n78A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101900 TP for TR 37.717-11-21 to include DC\_1A-7A-28A\_n3A-n78A**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP for TR 37.717-11-21 to include DC\_1A-7A-28A\_n3A-n78A

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102048 draft CR 38.101-3 adding CA\_n7B UL configurations for x LTE + 2 NR**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Ericsson*

**Abstract:**

draft CR 38.101-3 adding CA\_n7B UL configurations for x LTE + 2 NR

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103066.**

**R4-2103066 draft CR 38.101-3 adding CA\_n7B UL configurations for x LTE + 2 NR**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Ericsson*

**Abstract:**

draft CR 38.101-3 adding CA\_n7B UL configurations for x LTE + 2 NR

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2102052 TP for TR 37.717-11-21 to include 2A\_n71a-n78a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 2A\_n71a-n78a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102053 TP for TR 37.717-11-21 to include 7A\_n71a-n78a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 7A\_n71a-n78a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102054 TP for TR 37.717-11-21 to include 66A\_n71a-n78a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 66A\_n71a-n78a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102055 TP for TR 37.717-11-21 to include 2A\_n38a-n71a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 2A\_n38a-n71a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102056 TP for TR 37.717-11-21 to include 66A\_n38a-n71a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 66A\_n38a-n71a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102057 TP for TR 37.717-11-21 to include 71A\_n38a-n78a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 71A\_n38a-n78a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102058 TP for TR 37.717-11-21 to include 5A\_n66a-n78a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 5A\_n66a-n78a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102059 TP for TR 37.717-11-21 to include 71A\_n66a-n78a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 71A\_n66a-n78a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102060 TP for TR 37.717-11-21 to include 5A\_n38a-n66a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 5A\_n38a-n66a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102061 TP for TR 37.717-11-21 to include 71A\_n38a-n66a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 71A\_n38a-n66a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102062 TP for TR 37.717-11-21 to include 2A\_n2a-n38a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 2A\_n2a-n38a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102063 TP for TR 37.717-11-21 to include 66A\_n2a-n38a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 66A\_n2a-n38a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102064 TP for TR 37.717-11-21 to include 12A\_n2a-n38a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 12A\_n2a-n38a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102065 TP for TR 37.717-11-21 to include 2A\_n2a-n41a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 2A\_n2a-n41a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102066 TP for TR 37.717-11-21 to include 12A\_n2a-n41a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 12A\_n2a-n41a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102067 TP for TR 37.717-11-21 to include 71A\_n2a-n41a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 71A\_n2a-n41a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102068 TP for TR 37.717-11-21 to include 2A\_n2a-n78a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 2A\_n2a-n78a

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103067.**

**R4-2103067 TP for TR 37.717-11-21 to include 2A\_n2a-n78a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 2A\_n2a-n78a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102069 TP for TR 37.717-11-21 to include 7A\_n2a-n78a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 7A\_n2a-n78a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102070 TP for TR 37.717-11-21 to include 71A\_n2a-n78a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 71A\_n2a-n78a

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103068.**

**R4-2103068 TP for TR 37.717-11-21 to include 71A\_n2a-n78a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 71A\_n2a-n78a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102071 TP for TR 37.717-11-21 to include 2A\_n66a-n71a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 2A\_n66a-n71a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102072 TP for TR 37.717-11-21 to include 7A\_n66a-n71a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 7A\_n66a-n71a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102073 TP for TR 37.717-11-21 to include 66A\_n66a-n71a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 66A\_n66a-n71a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102074 TP for TR 37.717-11-21 to include 2A\_n2a-n71a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 2A\_n2a-n71a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102075 TP for TR 37.717-11-21 to include 7A\_n2a-n71a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 7A\_n2a-n71a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102076 TP for TR 37.717-11-21 to include 66A\_n2a-n71a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 66A\_n2a-n71a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102077 TP for TR 37.717-11-21 to include 2A\_n2a-n66a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 2A\_n2a-n66a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102078 TP for TR 37.717-11-21 to include 7A\_n2a-n66a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 7A\_n2a-n66a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102079 TP for TR 37.717-11-21 to include 66A\_n2a-n66a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 66A\_n2a-n66a

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103069.**

**R4-2103069 TP for TR 37.717-11-21 to include 66A\_n2a-n66a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 66A\_n2a-n66a

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102080 TP for TR 37.717-11-21 to include 71A\_n2a-n66a**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson, Rogers*

**Abstract:**

TP for TR 37.717-11-21 to include 71A\_n2a-n66a

**Discussion:**

[report of discussion]

**Decision: Approved.**

#### 9.7.3 EN-DC including NR inter CA with FR2 band [DC\_R17\_xBLTE\_2BNR\_yDL2UL-Core]

**R4-2101901 TP for TR 37.717-11-21 to include DC\_1A-3A-7A-28A\_n78A-n257A/G/H/I**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: Ericsson*

**Abstract:**

TP for TR 37.717-11-21 to include DC\_1A-3A-7A-28A\_n78A-n257A/G/H/I

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102214 TP for 37.717-11-21\_ DC\_39\_n40-n258**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102215 TP for 37.717-11-21\_ DC\_39\_n41-n258**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102216 TP for 37.717-11-21\_ DC\_39\_n79-n258**

*Type: pCR For: Approval  
 37.717-11-21 v0.2.0  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Approved.**

### 9.8 Band combinations for SA NR supplementary uplink (SUL)

#### 9.8.1 Rapporteur Input (WID/TR/CR) [NR\_SUL\_combos\_R17-Core/Per]

**R4-2100291 Revised WID on Band combinations for SA NR Supplementary uplink (SUL), NSA NR SUL, NSA NR SUL with UL sharing from the UE perspective (ULSUP)**

*Type: WID revised For: Endorsement  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100292 TR 37.717-00-00 v0.3.0**

*Type: draft TR For: Agreement  
 37.717-00-00 v0.2.0  
 Source: Huawei, HiSilicon*

**Abstract:**

To capture the approved TPs in this meeting

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100293 CR on Introduction of completed SUL band combinations into TS 38.101-1**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0607 Cat: B (Rel-17)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100294 CR on Introduction of completed SUL band combinations into TS 38.101-3**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0439 Cat: B (Rel-17)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

#### 9.8.2 UE RF [NR\_SUL\_combos\_R17-Core]

**R4-2101603 TP for TR 37.717-00-00 for CA\_n3A\_SUL\_n78A-n80A**

*Type: pCR For: Approval  
 37.717-00-00 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103070.**

**R4-2103070 TP for TR 37.717-00-00 for CA\_n3A\_SUL\_n78A-n80A**

*Type: pCR For: Approval  
 37.717-00-00 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101604 TP for TR 37.717-00-00 for CA\_n41A\_SUL\_n79A-n83A**

*Type: pCR For: Approval  
 37.717-00-00 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103071.**

**R4-2103071 TP for TR 37.717-00-00 for CA\_n41A\_SUL\_n79A-n83A**

*Type: pCR For: Approval  
 37.717-00-00 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101605 TP for TR 37.717-00-00 for CA\_n79A\_SUL\_n41A-n83A**

*Type: pCR For: Approval  
 37.717-00-00 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103072.**

**R4-2103072 TP for TR 37.717-00-00 for CA\_n79A\_SUL\_n41A-n83A**

*Type: pCR For: Approval  
 37.717-00-00 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101606 DraftCR for 38.101-1 to add configuration for SUL\_n41C-n95A**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101607 DraftCR for 38.101-1 to add configuration for SUL\_n79C-n95A**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101608 TP for TR 37.717-00-00 for SUL\_n41A-n97A**

*Type: pCR For: Approval  
 37.717-00-00 v0.2.0  
 Source: Huawei, HiSilicon, CMCC*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2103073 TP for TR 37.717-00-00 for SUL\_n41A-n97A**

*Type: pCR For: Approval  
 37.717-00-00 v0.2.0  
 Source: Huawei, HiSilicon, CMCC*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2101609 TP for TR 37.717-00-00 for SUL\_n79A-n97A**

*Type: pCR For: Approval  
 37.717-00-00 v0.2.0  
 Source: Huawei, HiSilicon, CMCC*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103074.**

**R4-2103074 TP for TR 37.717-00-00 for SUL\_n79A-n97A**

*Type: pCR For: Approval  
 37.717-00-00 v0.2.0  
 Source: Huawei, HiSilicon, CMCC*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101610 TP for TR 37.717-00-00 for SUL\_n41A-n98A**

*Type: pCR For: Approval  
 37.717-00-00 v0.2.0  
 Source: Huawei, HiSilicon, CMCC*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103075.**

**R4-2103075 TP for TR 37.717-00-00 for SUL\_n41A-n98A**

*Type: pCR For: Approval  
 37.717-00-00 v0.2.0  
 Source: Huawei, HiSilicon, CMCC*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101611 TP for TR 37.717-00-00 for SUL\_n79A-n98A**

*Type: pCR For: Approval  
 37.717-00-00 v0.2.0  
 Source: Huawei, HiSilicon, CMCC*

**Discussion:**

[report of discussion]

**Decision: Approved.**

### 9.9 NR Inter-band Carrier Aggregation for 3 bands DL with 1 band UL [NR\_CA\_R17\_3BDL\_1BUL]

#### 9.9.1 Rapporteur Input (WID/TR/CR) [NR\_CA\_R17\_3BDL\_1BUL-Core/Per]

**R4-2100492 TR 38.717-03-01 on Rel-17 NR inter-band Carrier Aggregation (CA) for 3 Down Link (DL) / 1 Up Link (UL)**

*Type: draft TR For: Agreement  
 38.717-03-01 v0.2.0  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100493 Revised WID on Rel-17 NR inter-band CA of 3DL bands and 1UL band**

*Type: WID revised For: Approval  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

#### 9.9.2 UE RF [NR\_CA\_R17\_3BDL\_1BUL-Core]

**R4-2100093 Draft CR on CA\_n1-n3-n78**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: China Unicom*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2103076 Draft CR on CA\_n1-n3-n78**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: China Unicom*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100494 CR on Introducing NR inter-band CA for 3DL Bands and 1UL band for 38.101-1**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0617 Cat: B (Rel-17)  
  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100495 CR on Introducing NR inter-band CA for 3DL Bands and 1UL band for 38.101-3**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0442 Cat: B (Rel-17)  
  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100497 Correction on supported channel bandwidth for n79**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0443 Cat: F (Rel-16)  
  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100498 Correction on supported channel bandwidth for n79**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0444 Cat: A (Rel-17)  
  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100683 Correction on supported channel bandwidth for CA\_n39-n41-n79**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0626 Cat: F (Rel-16)  
  
 Source: CATT, CMCC*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100684 Correction on supported channel bandwidth for CA\_n39-n41-n79**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0627 Cat: A (Rel-17)  
  
 Source: CATT, CMCC*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100738 TP to TR 38.717-03-01 CA\_n5-n25-n77**

*Type: other For: Approval  
 38.717-03-01 v..  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

In this contribution, a text proposal to complete 3DL/1UL NR CA configuration CA\_n5A-n25A-n77A is provided.

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103077.**

**R4-2103077 TP to TR 38.717-03-01 CA\_n5-n25-n77**

*Type: other For: Approval  
 38.717-03-01 v..  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

In this contribution, a text proposal to complete 3DL/1UL NR CA configuration CA\_n5A-n25A-n77A is provided.

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100739 TP to TR 38.717-03-01 CA\_n25-n66-n77**

*Type: other For: Approval  
 38.717-03-01 v..  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

In this contribution, a text proposal to complete 3DL/1UL NR CA configuration CA\_n25A-n66A-n77A is provided.

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103078.**

**R4-2103078 TP to TR 38.717-03-01 CA\_n25-n66-n77**

*Type: other For: Approval  
 38.717-03-01 v..  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

In this contribution, a text proposal to complete 3DL/1UL NR CA configuration CA\_n25A-n66A-n77A is provided.

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100952 TP for TR 38.717-03-01: CA\_n3-n18-n41**

*Type: pCR For: Approval  
 38.717-03-01 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100953 TP for TR 38.717-03-01: CA\_n3A-n28A-n77(2A)**

*Type: pCR For: Approval  
 38.717-03-01 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103079.**

**R4-2103079 TP for TR 38.717-03-01: CA\_n3A-n28A-n77(2A)**

*Type: pCR For: Approval  
 38.717-03-01 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100954 TP for TR 38.717-03-01: CA\_n3A-n28A-n78(2A)**

*Type: pCR For: Approval  
 38.717-03-01 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103080.**

**R4-2103080 TP for TR 38.717-03-01: CA\_n3A-n28A-n78(2A)**

*Type: pCR For: Approval  
 38.717-03-01 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100955 TP for TR 38.717-03-01: CA\_n3A-n41A-n77(2A)**

*Type: pCR For: Approval  
 38.717-03-01 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100956 TP for TR 38.717-03-01: CA\_n3A-n41A-n78(2A)**

*Type: pCR For: Approval  
 38.717-03-01 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100957 TP for TR 38.717-03-01: CA\_n28A-n41A-n77(2A)**

*Type: pCR For: Approval  
 38.717-03-01 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100958 TP for TR 38.717-03-01: CA\_n28A-n41A-n78(2A)**

*Type: pCR For: Approval  
 38.717-03-01 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100979 TP for TR 38.717-03-01: CA\_n13-n25-n66**

*Type: pCR For: Approval  
 38.717-03-01 v0.2.0  
 Source: Samsung, TELUS, Bell mobility*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103081.**

**R4-2103081 TP for TR 38.717-03-01: CA\_n13-n25-n66**

*Type: pCR For: Approval  
 38.717-03-01 v0.2.0  
 Source: Samsung, TELUS, Bell mobility*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100980 TP for TR 38.717-03-01: CA\_n25A-n29A-n66A**

*Type: pCR For: Approval  
 38.717-03-01 v0.2.0  
 Source: Samsung, TELUS, Bell mobility*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101113 TP for TR 38.717-03-01: support of CA\_n1-n78-n257**

*Type: pCR For: Approval  
 38.717-03-01 v0.1.0  
 Source: CHTTL*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101188 TP for CA\_n28-n77-n79 for TR 38.717-03-01**

*Type: pCR For: Approval  
 38.717-03-01 v0.1.0  
 Source: NTT DOCOMO INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101189 TP for CA\_n28-n78-n79 for TR 38.717-03-01**

*Type: pCR For: Approval  
 38.717-03-01 v0.1.0  
 Source: NTT DOCOMO INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101595 DraftCR for 38.101-1 to add BCS1 for CA\_n1A-n8A-n78A**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101596 TP for TR 38.717-03-01: CA\_n1A-n8A-n79A**

*Type: pCR For: Approval  
 38.717-03-01 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101597 Updated TP for TR 38.717-03-01: to add configuration CA\_n1A-n78(2A)-n79A and CA\_n1A-n78A-n79A\_BCS1**

*Type: pCR For: Approval  
 38.717-03-01 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101598 TP for TR 38.717-03-01: CA\_n8A-n78A-n79A/CA\_n8A-n78(2A)-n79A**

*Type: pCR For: Approval  
 38.717-03-01 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102217 TP for TR38.717-03-01\_ CA\_n8A-n39A-n41A**

*Type: pCR For: Approval  
 38.717-03-01 v0.2.0  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Approved.**

### 9.10 NR Inter-band Carrier Aggregation for 4 bands DL with 1 band UL [NR\_CA\_R17\_4BDL\_1BUL]

#### 9.10.1 Rapporteur Input (WID/TR/CR) [NR\_CA\_R17\_4BDL\_1BUL-Core/Per]

**R4-2101885 Revised WID 4 bands NR CA Rel-17**

*Type: WID revised For: Endorsement  
 Source: Ericsson*

**Abstract:**

Revised WID 4 bands NR CA Rel-17

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101889 CR introduction completed band combinations NR Inter-band 4 bands CA -> 38.101-1**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0658 Cat: B (Rel-17)  
  
 Source: Ericsson*

**Abstract:**

CR introduction completed band combinations NR Inter-band 4 bands CA -> 38.101-1

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2101890 CR introduction completed band combinations NR Inter-band 4 bands CA -> 38.101-3**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0472 Cat: B (Rel-17)  
  
 Source: Ericsson*

**Abstract:**

CR introduction completed band combinations NR Inter-band 4 bands CA -> 38.101-3

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101893 TR 38.717-04-01 v0.3.0 Rel-17 NR Inter-band 4 bands CA**

*Type: draft TR For: Agreement  
 38.717-04-01 v0.2.0  
 Source: Ericsson*

**Abstract:**

TR 38.717-04-01 v0.3.0 Rel-17 NR Inter-band 4 bands CA

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 9.10.2 UE RF [NR\_CA\_R17\_4BDL\_1BUL-Core]

**R4-2101904 TP for TR 38.717-04-01 to include CA\_n41-n66-n71-n77**

*Type: pCR For: Approval  
 38.717-04-01 v0.2.0  
 Source: Ericsson, T-Mobile US*

**Abstract:**

TP for TR 38.717-04-01 to include CA\_n41-n66-n71-n77

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103082.**

**R4-2103082 TP for TR 38.717-04-01 to include CA\_n41-n66-n71-n77**

*Type: pCR For: Approval  
 38.717-04-01 v0.2.0  
 Source: Ericsson, T-Mobile US*

**Abstract:**

TP for TR 38.717-04-01 to include CA\_n41-n66-n71-n77

**Discussion:**

[report of discussion]

**Decision: Approved.**

### 9.11 NR Inter-band Carrier Aggregation/Dual connectivity for 3 bands DL with 2 bands UL [NR\_CADC\_R17\_3BDL\_2BUL]

#### 9.11.1 Rapporteur Input (WID/TR/CR) [NR\_CADC\_R17\_3BDL\_2BUL-Core/Per]

**R4-2102225 Revised WID on Rel-17 NR Inter-band Carrier AggregationDual Connectivity for 3 bands DL with 2 bands UL**

*Type: WID revised For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2102226 CR to reflect the completed NR inter band CA DC combinations for 3 bands DL with 2 bands UL into TS 38.101-1**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102945 CR to reflect the completed NR inter band CA DC combinations for 3 bands DL with 2 bands UL into TS 38.101-1**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0716 Cat: B (Rel-17)  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102227 CR to reflect the completed NR inter band CA DC combinations for 3 bands DL with 2 bands UL into TS 38.101-3**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102946 CR to reflect the completed NR inter band CA DC combinations for 3 bands DL with 2 bands UL into TS 38.101-3**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0497 Cat: B (Rel-17)  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102305 TR 38.717-03-02 v0.3.0**

*Type: draft TR For: Agreement  
 38.717-03-02 v0.3.0  
 Source: ZTE Wistron Telecom AB*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 9.11.2 UE RF [NR\_CADC\_R17\_3BDL\_2BUL-Core]

**R4-2100153 Draft CR Addition of BCS1 for CA\_n25A-n71(2A), CA\_n41(2A)-n66A and CA\_n66A-n71(2A)**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: Nokia, T-Mobile USA*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2103083 Draft CR Addition of BCS1 for CA\_n25A-n71(2A), CA\_n41(2A)-n66A and CA\_n66A-n71(2A)**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: Nokia, T-Mobile USA*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100157 TP to TR 38.717-03-02: CA\_n25-n41-n66**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Nokia, T-Mobile USA*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100158 TP to TR 38.717-03-02: CA\_n25-n41-n71**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Nokia, T-Mobile USA*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103084.**

**R4-2103084 TP to TR 38.717-03-02: CA\_n25-n41-n71**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Nokia, T-Mobile USA*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100698 Draft CR for TS 38.101-1: Support of DC\_ n3-n28-n77**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100700 Draft CR for TS 38.101-3: Support of n77(2A) in DC\_ n28-n77-n257**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100740 TP to TR 38.717-03-02 CA\_n5-n25-n77**

*Type: other For: Approval  
 38.717-03-02 v..  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

In this contribution, a text proposal to complete 3DL/2UL NR CA configuration CA\_n5A-n25A-n77A is provided.

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103085.**

**R4-2103085 TP to TR 38.717-03-02 CA\_n5-n25-n77**

*Type: other For: Approval  
 38.717-03-02 v..  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

In this contribution, a text proposal to complete 3DL/2UL NR CA configuration CA\_n5A-n25A-n77A is provided.

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100741 TP to TR 38.717-03-02 CA\_n25-n66-n77**

*Type: other For: Approval  
 38.717-03-02 v..  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

In this contribution, a text proposal to complete 3DL/2UL NR CA configuration CA\_n25A-n66A-n77A is provided.

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103100.**

**R4-2103100 TP to TR 38.717-03-02 CA\_n25-n66-n77**

*Type: other For: Approval  
 38.717-03-02 v..  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

In this contribution, a text proposal to complete 3DL/2UL NR CA configuration CA\_n25A-n66A-n77A is provided.

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100959 TP for TR 38.717-03-02: CA\_n3-n28-n78**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103101.**

**R4-2103101 TP for TR 38.717-03-02: CA\_n3-n28-n78**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100960 TP for TR 38.717-03-02: DC\_n3-n41-n257**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103086.**

**R4-2103086 TP for TR 38.717-03-02: DC\_n3-n41-n257**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100961 TP for TR 38.717-03-02: DC\_n28-n41-n257**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100962 TP for TR 38.717-03-02: DC\_n41-n77-n257**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100963 TP for TR 38.717-03-02: DC\_n41-n78-n257**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100964 TP for TR 38.717-03-02: CA\_n3-n18-n41**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103087.**

**R4-2103087 TP for TR 38.717-03-02: CA\_n3-n18-n41**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100965 TP for TR 38.717-03-02: CA\_n3-n28-n41**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100966 TP for TR 38.717-03-02: CA\_n3-n28-n77**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100967 TP for TR 38.717-03-02: CA\_n3-n41-n77**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103088.**

**R4-2103088 TP for TR 38.717-03-02: CA\_n3-n41-n77**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100968 TP for TR 38.717-03-02: CA\_n3-n41-n78**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103089.**

**R4-2103089 TP for TR 38.717-03-02: CA\_n3-n41-n78**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100969 TP for TR 38.717-03-02: CA\_n28-n41-n77**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103090.**

**R4-2103090 TP for TR 38.717-03-02: CA\_n28-n41-n77**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100970 TP for TR 38.717-03-02: CA\_n28-n41-n78**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103091.**

**R4-2103091 TP for TR 38.717-03-02: CA\_n28-n41-n78**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100981 TP for TR 38.717-03-02: CA\_n25-n29-n66**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Samsung, TELUS, Bell mobility*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103092.**

**R4-2103092 TP for TR 38.717-03-02: CA\_n25-n29-n66**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Samsung, TELUS, Bell mobility*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100982 TP for TR 38.717-03-02: CA\_n13-n25-n66**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Samsung, TELUS, Bell mobility*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103093.**

**R4-2103093 TP for TR 38.717-03-02: CA\_n13-n25-n66**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Samsung, TELUS, Bell mobility*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101158 MSD evaluation for CA 3DL2UL n1-n77-n79 for TR 38.717-03-02**

*Type: other For: Approval  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101198 draft CR to TS 38.101-1 Modification of MSD values for n1-n77-n79 and n1-n78-n79**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: NTT DOCOMO INC.*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101513 TP for TR 38.717-03-02: CA\_n66-n71-n78**

*Type: pCR For: Approval  
 38.717-03-01 v0.3.0  
 Source: Huawei, HiSilicon, Bell Mobility, Telus*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101514 TP for TR 38.717-03-02: CA\_n38A-n66A-n78A**

*Type: pCR For: Approval  
 38.717-03-01 v0.3.0  
 Source: Huawei, HiSilicon, Bell Mobility, Telus*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103094.**

**R4-2103094 TP for TR 38.717-03-02: CA\_n38A-n66A-n78A**

*Type: pCR For: Approval  
 38.717-03-01 v0.3.0  
 Source: Huawei, HiSilicon, Bell Mobility, Telus*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101515 TP for TR 38.717-03-02: CA\_n25A-n38A-n78A**

*Type: pCR For: Approval  
 38.717-03-01 v0.3.0  
 Source: Huawei, HiSilicon, Bell Mobility, Telus*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101902 TP for 38.717-03-02 to include n25-n66-n71**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Ericsson, T-Mobile US*

**Abstract:**

TP for 38.717-03-02 to include n25-n66-n71

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103095.**

**R4-2103095 TP for 38.717-03-02 to include n25-n66-n71**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Ericsson, T-Mobile US*

**Abstract:**

TP for 38.717-03-02 to include n25-n66-n71

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101903 TP for 38.717-03-02 to include n41-n66-n71**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Ericsson, T-Mobile US*

**Abstract:**

TP for 38.717-03-02 to include n41-n66-n71

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102316 TP for 38.717-03-02 to include n25-n41-n66**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Ericsson, Bell Mobility*

**Abstract:**

TP for 38.717-03-02 to include n25-n41-n66

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103099.**

**R4-2103099 TP for 38.717-03-02 to include n25-n41-n66**

*Type: pCR For: Approval  
 38.717-03-02 v0.2.0  
 Source: Ericsson, Bell Mobility*

**Abstract:**

TP for 38.717-03-02 to include n25-n41-n66

**Discussion:**

[report of discussion]

**Decision: Approved.**

### 9.12 DC of x bands (x=1,2) LTE inter-band CA (xDL/xUL) and y bands (y=3-x) NR inter-band CA [DC\_R17\_xBLTE\_yBNR\_3DL3UL]

#### 9.12.1 Rapporteur Input (WID/TR/CR) [DC\_R17\_xBLTE\_yBNR\_3DL3UL-Core/Per]

**R4-2102228 Revised WID on Rel-17 Dual Connectivity (DC) x bands (x=1,2) LTE inter-band CA (xDL/xUL) and y bands (y=3-x) NR inter-band CA**

*Type: WID revised For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2102229 CR to reflect the completed ENDC combinations for 3 bands DL with 3 bands UL into TS 38.101-3**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102947 CR to reflect the completed ENDC combinations for 3 bands DL with 3 bands UL into TS 38.101-3**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0498 Cat: B (Rel-17)  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102230 TR 37.717-33 v0.2.0**

*Type: draft TR For: Agreement  
 37.717-33 v0.1.0  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 9.12.2 UE RF [DC\_R17\_xBLTE\_yBNR\_3DL3UL-Core]

**R4-2102218 TP for TR 37.717-33\_DC\_40A\_n41A-n258A**

*Type: pCR For: Approval  
 37.717-33 v0.1.0  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Approved.**

### 9.13 DC of x bands (x=1,2,3) LTE inter-band CA (xDL/1UL) and 3 bands NR inter-band CA (3DL/1UL) [DC\_R17\_xBLTE\_3BNR\_yDL2UL]

#### 9.13.1 Rapporteur Input (WID/TR/CR) [DC\_R17\_xBLTE\_3BNR\_yDL2UL -Core/Per]

**R4-2102231 Revised WID on Rel-17 Dual Connectivity (DC) of x bands (x=1,2,3) LTE inter-band CA (xDL1UL) and 3 bands NR inter-band CA (3DL1UL)**

*Type: WID revised For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2102232 TR 37.717-11-31\_v0.3.0**

*Type: draft TR For: Agreement  
 37.717-11-31 v0.2.0  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102948 CR to reflect the completed Dual Connectivity (DC) of x bands (x=1,2,3) LTE inter-band CA (xDL1UL) and 3 bands NR inter-band CA (3DL1UL) into TS38.101-3**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0499 Cat: B (Rel-17)  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 9.13.2 UE RF [DC\_R17\_xBLTE\_3BNR\_yDL2UL-Core]

**R4-2100669 TP for TR 37.717-11-31: EN-DC\_11\_n3-n28-n77**

*Type: pCR For: Approval  
 37.717-11-31 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100670 TP for TR 37.717-11-31: EN-DC\_42\_n3-n28-n77**

*Type: pCR For: Approval  
 37.717-11-31 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100681 TP for TR 37.717-11-31: EN-DC\_1-8\_n3-n28-n77**

*Type: pCR For: Approval  
 37.717-11-31 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100682 TP for TR 37.717-11-31: EN-DC\_1-11\_n3-n28-n77**

*Type: pCR For: Approval  
 37.717-11-31 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100685 TP for TR 37.717-11-31: EN-DC\_1-42\_n3-n28-n77**

*Type: pCR For: Approval  
 37.717-11-31 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100686 TP for TR 37.717-11-31: EN-DC\_8-11\_n3-n28-n77**

*Type: pCR For: Approval  
 37.717-11-31 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100687 TP for TR 37.717-11-31: EN-DC\_8-42\_n3-n28-n77**

*Type: pCR For: Approval  
 37.717-11-31 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100690 TP for TR 37.717-11-31: EN-DC\_1-8-11\_n3-n28-n77**

*Type: pCR For: Approval  
 37.717-11-31 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100691 TP for TR 37.717-11-31: EN-DC\_1-8-42\_n3-n28-n77**

*Type: pCR For: Approval  
 37.717-11-31 v0.1.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101019 TP for DC\_1A\_n28A-n77A-n79A for TR37.717-11-31**

*Type: pCR For: Approval  
 37.717-11-31 v0.2.0  
 Source: NTT DOCOMO, INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101020 TP for DC\_1A\_n28A-n78A-n79A for TR37.717-11-31**

*Type: pCR For: Approval  
 37.717-11-31 v0.2.0  
 Source: NTT DOCOMO, INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101021 TP for DC\_3A\_n1A-n77A-n79A for TR37.717-11-31**

*Type: pCR For: Approval  
 37.717-11-31 v0.2.0  
 Source: NTT DOCOMO, INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101022 TP for DC\_3A\_n1A-n78A-n79A for TR37.717-11-31**

*Type: pCR For: Approval  
 37.717-11-31 v0.2.0  
 Source: NTT DOCOMO, INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101023 TP for DC\_3A\_n28A-n77A-n79A for TR37.717-11-31**

*Type: pCR For: Approval  
 37.717-11-31 v0.2.0  
 Source: NTT DOCOMO, INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101024 TP for DC\_3A\_n28A-n78A-n79A for TR37.717-11-31**

*Type: pCR For: Approval  
 37.717-11-31 v0.2.0  
 Source: NTT DOCOMO, INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101025 TP for DC\_19A\_n1A-n77A-n79A for TR37.717-11-31**

*Type: pCR For: Approval  
 37.717-11-31 v0.2.0  
 Source: NTT DOCOMO, INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101026 TP for DC\_19A\_n1A-n78A-n79A for TR37.717-11-31**

*Type: pCR For: Approval  
 37.717-11-31 v0.2.0  
 Source: NTT DOCOMO, INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101027 TP for DC\_21A\_n1A-n77A-n79A for TR37.717-11-31**

*Type: pCR For: Approval  
 37.717-11-31 v0.2.0  
 Source: NTT DOCOMO, INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101028 TP for DC\_21A\_n1A-n78A-n79A for TR37.717-11-31**

*Type: pCR For: Approval  
 37.717-11-31 v0.2.0  
 Source: NTT DOCOMO, INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101029 TP for DC\_21A\_n28A-n77A-n79A for TR37.717-11-31**

*Type: pCR For: Approval  
 37.717-11-31 v0.2.0  
 Source: NTT DOCOMO, INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101030 TP for DC\_21A\_n28A-n78A-n79A for TR37.717-11-31**

*Type: pCR For: Approval  
 37.717-11-31 v0.2.0  
 Source: NTT DOCOMO, INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101031 TP for DC\_1A-3A\_n28A-n77A-n79A for TR37.717-11-31**

*Type: pCR For: Approval  
 37.717-11-31 v0.2.0  
 Source: NTT DOCOMO, INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101032 TP for DC\_1A-3A\_n28A-n78A-n79A for TR37.717-11-31**

*Type: pCR For: Approval  
 37.717-11-31 v0.2.0  
 Source: NTT DOCOMO, INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101033 TP for DC\_1A-21A\_n28A-n77A-n79A for TR37.717-11-31**

*Type: pCR For: Approval  
 37.717-11-31 v0.2.0  
 Source: NTT DOCOMO, INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101034 TP for DC\_1A-21A\_n28A-n78A-n79A for TR37.717-11-31**

*Type: pCR For: Approval  
 37.717-11-31 v0.2.0  
 Source: NTT DOCOMO, INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101035 TP for DC\_3A-21A\_n1A-n77A-n79A for TR37.717-11-31**

*Type: pCR For: Approval  
 37.717-11-31 v0.2.0  
 Source: NTT DOCOMO, INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101036 TP for DC\_3A-21A\_n1A-n78A-n79A for TR37.717-11-31**

*Type: pCR For: Approval  
 37.717-11-31 v0.2.0  
 Source: NTT DOCOMO, INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101037 TP for DC\_3A-21A\_n28A-n77A-n79A for TR37.717-11-31**

*Type: pCR For: Approval  
 37.717-11-31 v0.2.0  
 Source: NTT DOCOMO, INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101038 TP for DC\_3A-21A\_n28A-n78A-n79A for TR37.717-11-31**

*Type: pCR For: Approval  
 37.717-11-31 v0.2.0  
 Source: NTT DOCOMO, INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101039 TP for DC\_19A-42A\_n1A-n77A-n79A for TR37.717-11-31**

*Type: pCR For: Approval  
 37.717-11-31 v0.2.0  
 Source: NTT DOCOMO, INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101040 TP for DC\_19A-42A\_n1A-n78A-n79A for TR37.717-11-31**

*Type: pCR For: Approval  
 37.717-11-31 v0.2.0  
 Source: NTT DOCOMO, INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101186 TP for DC\_42A\_n1A-n77A-n79A for TR37.717-11-31**

*Type: pCR For: Approval  
 37.717-11-31 v0.1.0  
 Source: NTT DOCOMO INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101187 TP for DC\_42A\_n1A-n78A-n79A for TR37.717-11-31**

*Type: pCR For: Approval  
 37.717-11-31 v0.1.0  
 Source: NTT DOCOMO INC.*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102219 TP for 37.717-11-31\_ DC\_8A\_n39A-n40A-n41A**

*Type: pCR For: Approval  
 37.717-11-31 v0.2.0  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Approved.**

### 9.14 NR inter-band Carrier Aggregation and Dual connectivity for DL 4 bands and 2UL bands [NR\_CADC\_R17\_4BDL\_2BUL]

#### 9.14.1 Rapporteur Input (WID/TR/CR) [NR\_CADC\_R17\_4BDL\_2BUL -Core/Per]

**R4-2100990 CR on introduction of completed NR CA/DC combs with 4DL/2UL within FR1**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0636 Cat: B (Rel-17)  
  
 Source: Samsung*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103255.**

**R4-2103255 CR on introduction of completed NR CA/DC combs with 4DL/2UL within FR1**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0636 Cat: B (Rel-17)  
  
 Source: Samsung*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100991 CR on introduction of completed NR CA/DC combs with 4DL/2UL including FR2**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0454 Cat: B (Rel-17)  
  
 Source: Samsung*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103407.**

**R4-2103407 CR on introduction of completed NR CA/DC combs with 4DL/2UL including FR2**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0454 Cat: B (Rel-17)  
  
 Source: Samsung*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100992 Revised WID on NR CA/DC with 4DL/2UL**

*Type: WID revised For: Information  
 Source: Samsung*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101482 TR38.717-04-02 update version 0.3.0**

*Type: draft TR For: Agreement  
 38.717-04-02 v0.2.0  
 Source: Samsung R&D Institute India*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 9.14.2 UE RF [NR\_CADC\_R17\_4BDL\_2BUL -Core]

**R4-2100701 Draft CR for TS 38.101-3: Support of UL CA in CA\_n3-n28-n77-n257**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100971 TP for TR 38.717-04-02: CA\_n3-n28-n41-n77**

*Type: pCR For: Approval  
 38.717-04-02 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100972 TP for TR 38.717-04-02: CA\_n3-n28-n41-n78**

*Type: pCR For: Approval  
 38.717-04-02 v0.2.0  
 Source: Samsung, KDDI*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101905 TP for TR 38.717-04-02 to include CA\_n41-n66-n71-n77**

*Type: pCR For: Approval  
 38.717-04-02 v0.2.0  
 Source: Ericsson, T-Mobile US*

**Abstract:**

TP for TR 38.717-04-02 to include CA\_n41-n66-n71-n77

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101906 TP for TR 38.717-04-02 to include CA\_n25-n41-n66-n71**

*Type: pCR For: Approval  
 38.717-04-02 v0.2.0  
 Source: Ericsson, T-Mobile US*

**Abstract:**

TP for TR 38.717-04-02 to include CA\_n25-n41-n66-n71

**Discussion:**

[report of discussion]

**Decision: Approved.**

### 9.15 NR inter-band CA for 5 bands DL with x bands UL (x=1, 2) [NR\_CADC\_R17\_5BDL\_xBUL\_3DL3UL]

#### 9.15.1 Rapporteur Input (WID/TR/CR) [NR\_CADC\_R17\_5BDL\_xBUL -Core/Per]

**R4-2100295 Revised WID on NR inter-band CA for 5 bands DL with x bands UL (x=1, 2)**

*Type: WID revised For: Endorsement  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100296 TR 38.717-05-01 v0.2.0**

*Type: draft TR For: Agreement  
 38.717-05-01 v0.1.0  
 Source: Huawei, HiSilicon*

**Abstract:**

To capture the approved TPs in this meeting

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100297 CR on Introduction of completed 5 bands inter-band CA into TS 38.101-1**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0608 Cat: B (Rel-17)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

#### 9.15.2 UE RF [NR\_CADC\_R17\_5BDL\_xBUL -Core]

### 9.16 DC of 5 bands LTE inter-band CA (5DL/1L) and 1 NR band (1DL/1UL) [DC\_R17\_5BLTE\_1BNR\_6DL2UL]

#### 9.16.1 Rapporteur Input (WID/TR/CR) [DC\_R17\_5BLTE\_1BNR\_6DL2UL-Core/Per]

**R4-2100988 CR introduction completed band combinations for Dual Connectivity (DC) of 5 bands LTE inter-band CA (5DL/1UL) and 1 NR band (1DL/1UL)**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0453 Cat: B (Rel-17)  
  
 Source: Samsung*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100989 Revised WID on Dual Connectivity (DC) of 5 bands LTE inter-band CA (5DL/1UL) and 1 NR band (1DL/1UL)**

*Type: WID revised For: Information  
 Source: Samsung*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101483 TR 37.717-51-11 update version 0.2.0**

*Type: draft TR For: Agreement  
 37.717-51-11 v0.1.0  
 Source: Samsung R&D Institute India*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

#### 9.16.2 UE RF [DC\_R17\_5BLTE\_1BNR\_6DL2UL-Core]

**R4-2100324 Draft CR for 38.101-3 to introduce new inter-band EN-DC (1NR band +5LTE band) within FR1 DC\_1A-3A-7A-8A-40A\_n78(2A)/DC\_1A-3A-7A-8A-40C\_n78(2A)**

*Type: draftCR For: Endorsement  
 38.101-3 v17.0.0  
 Source: Huawei,HiSilicon*

**Abstract:**

3HK's new band combination

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

### 9.17 DC of x bands (x=2,3,4) LTE inter-band CA (xDL/1UL) and 1 NR FR1 band (1DL/1UL) and 1 NR FR2 band (1DL/1UL) [DC\_R17\_xBLTE\_2BNR\_yDL3UL]

#### 9.17.1 Rapporteur Input (WID/TR/CR) [DC\_R17\_xBLTE\_2BNR\_yDL3UL-Core/Per]

**R4-2100986 CR introduction completed band combinations for Dual Connectivity (DC) of x bands (x=2,3,4) LTE inter-band CA (xDL/1UL) and 1 NR FR1 band (1DL/1UL) and 1 NR FR2 band (1DL/1UL)**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0452 Cat: B (Rel-17)  
  
 Source: Samsung*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100987 Revised WID on Dual Connectivity (DC) of x bands (x=2,3,4) LTE inter-band CA (xDL/1UL) and 1 NR FR1 band (1DL/1UL) and 1 NR FR2 band (1DL/1UL)**

*Type: WID revised For: Information  
 Source: Samsung*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2101486 TR 37.717-21-22 update version 0.2.0**

*Type: draft TR For: Agreement  
 37.717-21-22 v0.1.0  
 Source: Samsung R&D Institute India*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

#### 9.17.2 UE RF [DC\_R17\_xBLTE\_2BNR\_yDL3UL-Core]

### 9.18 SAR schemes for UE power class 2 (PC2) for NR inter-band Carrier Aggregation and supplemental uplink (SUL) configurations with 2 bands UL [NR\_SAR\_PC2\_interB\_SUL\_2BUL]

**R4-2102965 Email discussion summary for [98e][117] NR\_SAR\_PC2\_interB\_SUL\_2BUL**

*Type: other For: Information  
 Source: Moderator (China Telecom)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103305.**

**R4-2103305 Email discussion summary for [98e][117] NR\_SAR\_PC2\_interB\_SUL\_2BUL**

*Type: other For: Information  
 Source: Moderator (China Telecom)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103172 Way forward on SAR solutions for PC2 NR inter-band CA and SUL configurations**

*Type: other For: Approval  
 Source: China Telecom*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103174 Way forward on increasing UE maximum power for UE equipped with two PAs**

*Type: other For: Approval  
 Source: Qualcomm*

**Abstract:**

**Discussion:**

**Decision: Noted.**

#### 9.18.1 General and Rapporteur Input (WID/TR/CR) [NR\_SAR\_PC2\_interB\_SUL\_2BUL-Core/Per]

**R4-2101109 MSD analysis on high power UE for CA\_n41-n79**

*Type: discussion For: Approval  
 Source: Xiaomi, ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101122 CR to 38.307 Release independence for UE power class 2 NR inter-band CA and SUL configurations (R15)**

*Type: CR For: Agreement  
 38.307 v15.7.0 CR-0049 Cat: B (Rel-15)  
  
 Source: China Telecom*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2101123 CR to 38.307 Release independence for UE power class 2 NR inter-band CA and SUL configurations (R16)**

*Type: CR For: Agreement  
 38.307 v16.5.0 CR-0050 Cat: B (Rel-16)  
  
 Source: China Telecom*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2101124 CR to 38.307 Release independence for UE power class 2 NR inter-band CA and SUL configurations (R17)**

*Type: CR For: Agreement  
 38.307 v17.0.0 CR-0051 Cat: B (Rel-17)  
  
 Source: China Telecom*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103173.**

**R4-2103173 CR to 38.307 Release independence for UE power class 2 NR inter-band CA and SUL configurations (R17)**

*Type: CR For: Agreement  
 38.307 v17.0.0 CR-0051 Cat: B (Rel-17)  
  
 Source: China Telecom*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 9.18.2 PC2 for inter-band CA [NR\_SAR\_PC2\_interB\_SUL\_2BUL-Core]

**R4-2100100 Discussion on SAR issues for PC2 NR inter-band CA and SUL configurations**

*Type: discussion For: Discussion  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101101 Discussion on SAR issue for HP UE inter-band UL CA**

*Type: other For: Approval  
 Source: Xiaomi*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101117 Discussion on SAR schemes for UE power class 2 NR inter-band CA with 2UL**

*Type: discussion For: Discussion  
 Source: China Telecom*

**Abstract:**

.

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101119 draft CR to 38.101-1 Introduce SAR solution for UE power class 2 NR inter-band CA with 2UL**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: China Telecom*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2101726 Methods for faciliating SAR compliance for inter-band UL CA**

*Type: other For: Approval  
 Source: Ericsson*

**Abstract:**

In this contribution we propose that duty-cycle reporting is not specified. Power limits combined with the P-MPR method should be used instead. We also discuss power prioritization and PHR for HPUE.

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101752 Discussion on inter-band CA HPUE SAR**

*Type: discussion For: Approval  
 Source: OPPO*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102139 Further discussion on SAR solution for NR PC2 inter-band CA**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102190 Further discussion on SAR solution for NR PC2 inter-band CA**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102287 On the SAR solutions for UL CA band combinations**

*Type: discussion For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102712 Discussion on SAR solution for PC2 inter-band NR CA**

*Type: discussion For: Discussion  
 Source: vivo*

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 9.18.3 PC2 for SUL [NR\_SAR\_PC2\_interB\_SUL\_2BUL-Core]

**R4-2101102 Discussion on SAR issue for NR PC2 SUL**

*Type: other For: Approval  
 Source: Xiaomi*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101118 Discussion on SAR schemes for UE power class 2 NR SUL configurations**

*Type: discussion For: Discussion  
 Source: China Telecom*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101120 draft CR to 38.101-1 Introduce SAR solution for UE power class 2 NR SUL configurations**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: China Telecom*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2102140 Further discussion on SAR solution for NR PC2 SUL**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102191 Further discussion on SAR solution for NR PC2 SUL**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102289 On the SAR solutions for SUL band combinations**

*Type: discussion For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 9.18.4 Others [NR\_SAR\_PC2\_interB\_SUL\_2BUL-Core]

**R4-2100372 Discussion on inter-band 2UL CA Pcmax upper limit**

*Type: discussion For: Discussion  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101121 Discussion on release independence for UE power class 2 NR inter-band CA and SUL configurations**

*Type: discussion For: Discussion  
 Source: China Telecom*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102414 Increasing UE maximum output power**

*Type: discussion For: Approval  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

### 9.19 High power UE (power class 2) for NR inter-band Carrier Aggregation with 2 bands downlink and 2 bands uplink [NR\_PC2\_CA\_R17\_2BDL\_2BUL]

**R4-2102966 Email discussion summary for [98e][118] NR\_PC2\_CA\_R17\_2BDL\_2BUL**

*Type: other For: Information  
 Source: Moderator (China Telecom)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103306.**

**R4-2103306 Email discussion summary for [98e][118] NR\_PC2\_CA\_R17\_2BDL\_2BUL**

*Type: other For: Information  
 Source: Moderator (China Telecom)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

#### 9.19.1 Rapporteur Input (WID/TR/CR) [NR\_PC2\_CA\_R17\_2BDL\_2BUL-Core/Per]

**R4-2101125 Draft TR 38.xxx v0.2.0: High power UE for NR inter-band Carrier Aggregation with 2 bands downlink and x bands uplink (x =1,2)**

*Type: other For: Agreement  
 Source: China Telecom*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101126 Revised WID: High power UE for NR inter-band Carrier Aggregation with 2 bands downlink and x bands uplink (x =1,2)**

*Type: WID revised For: Endorsement  
 Source: China Telecom*

**Abstract:**

update the WI code according to MCC suggestion and the target competion time

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

#### 9.19.2 UE RF [NR\_PC2\_CA\_R17\_2BDL\_2BUL-Core]

**R4-2100273 TP for TR38.xxx for PC2 CA\_n2A-n77A**

*Type: discussion For: Approval  
 Source: Verizon Denmark*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103169.**

**R4-2103169 TP for TR38.xxx for PC2 CA\_n2A-n77A**

*Type: discussion For: Approval  
 Source: Verizon Denmark*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100274 TP for TR38.xxx for PC2 CA\_n5A-n77A**

*Type: discussion For: Approval  
 Source: Verizon Denmark*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103170.**

**R4-2103170 TP for TR38.xxx for PC2 CA\_n5A-n77A**

*Type: discussion For: Approval  
 Source: Verizon Denmark*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100276 TP for TR38.xxx for PC2 CA\_n66A-n77A**

*Type: discussion For: Approval  
 Source: Verizon Denmark*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103171.**

**R4-2103171 TP for TR38.xxx for PC2 CA\_n66A-n77A**

*Type: discussion For: Approval  
 Source: Verizon Denmark*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100285 Self interference analysis and MSD results for PC2 NR inter-band CA band combinations**

*Type: other For: Approval  
 Source: LG Electronics France*

**Abstract:**

Provide MSD results for PC2 NR inter-band CA band combos

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102220 TP for TR38.xxx\_Clarification on PC2 CA\_n28A-n41A, CA\_n28-n79A and CA\_n40A-41A**

*Type: other For: Approval  
 Source: ZTE Corporation, CMCC*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102221 TP for TR38.xxx\_ PC2 CA\_n41A-n79A**

*Type: other For: Approval  
 Source: ZTE Corporation, CMCC, Xiaomi*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102713 Discussion on PC2 MSD for UL CA**

*Type: discussion For: Discussion  
 Source: vivo*

**Discussion:**

[report of discussion]

**Decision: Noted.**

### 9.20 High power UE (power class 2) for EN-DC with 1 LTE band + 1 NR TDD band [ENDC\_UE\_PC2\_R17\_NR\_TDD]

**R4-2102967 Email discussion summary for [98e][119] ENDC\_UE\_PC2\_R17\_NR\_TDD**

*Type: other For: Information  
 Source: Moderator (China Unicom)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103307.**

**R4-2103307 Email discussion summary for [98e][119] ENDC\_UE\_PC2\_R17\_NR\_TDD**

*Type: other For: Information  
 Source: Moderator (China Unicom)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

#### 9.20.1 Rapporteur Input (WID/TR/CR) [ENDC\_UE\_PC2\_R17\_NR\_TDD -Core/Per]

**R4-2100082 Big CR on introduction of completed PC2 for EN-DC with 1 LTE band + 1 NR TDD band**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0432 Cat: B (Rel-17)  
  
 Source: China Unicom*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100083 Revised WID on High power UE (power class 2) for EN-DC with 1 LTE band + 1 NR TDD band**

*Type: WID revised For: Endorsement  
 Source: China Unicom*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100084 TR 37.826 v0.2.0 ENDC\_UE\_PC2\_R17\_NR\_TDD**

*Type: draft TR For: Agreement  
 37.826 v0.2.0  
 Source: China Unicom*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 9.20.2 UE RF [ENDC\_UE\_PC2\_R17\_NR\_TDD -Core]

**R4-2100266 TP for TR 37.826 for DC\_2\_n77**

*Type: discussion For: Approval  
 Source: Verizon Denmark*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103175.**

**R4-2103175 TP for TR 37.826 for DC\_2\_n77**

*Type: discussion For: Approval  
 Source: Verizon Denmark*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100268 TP for TR 37.826 for DC\_5\_n77**

*Type: discussion For: Approval  
 Source: Verizon Denmark*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103176.**

**R4-2103176 TP for TR 37.826 for DC\_5\_n77**

*Type: discussion For: Approval  
 Source: Verizon Denmark*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100269 TP for TR 37.826 for DC\_13\_n77**

*Type: discussion For: Approval  
 Source: Verizon Denmark*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103177.**

**R4-2103177 TP for TR 37.826 for DC\_13\_n77**

*Type: discussion For: Approval  
 Source: Verizon Denmark*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100271 TP for TR 37.826 for DC\_66\_n77**

*Type: discussion For: Approval  
 Source: Verizon Denmark*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103178.**

**R4-2103178 TP for TR 37.826 for DC\_66\_n77**

*Type: discussion For: Approval  
 Source: Verizon Denmark*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100286 MSD for PC2 high power NR DC (with 1 LTE FDD band + 1 NR TDD band) UE**

*Type: other For: Approval  
 Source: LG Electronics France*

**Abstract:**

Provide MSD results for PC2 NR DC (with 1 LTE FDD band + 1 NR TDD band) UE in Rel-17

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101184 Discussion on UE capability for improved PC2 MSD for EN-DC**

*Type: discussion For: Approval  
 Source: CHTTL*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102415 MSD for PC2 EN-DC and UL CA**

*Type: discussion For: Discussion  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

### 9.21 Adding channel bandwidth support to existing NR bands [NR\_bands\_R17\_BWs]

**R4-2102968 Email discussion summary for [98e][120] NR\_bands\_R17\_BWs**

*Type: other For: Information  
 Source: Moderator (Ericsson)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103308.**

**R4-2103308 Email discussion summary for [98e][120] NR\_bands\_R17\_BWs**

*Type: other For: Information  
 Source: Moderator (Ericsson)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103181 Way forward on adding 90 and 100MHz channel BW for UE in band n40**

*Type: other For: Approval  
 Source: Huawei*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103182 Draft CR to TS 38.101-1 – introduction of 30MHz for n48**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: Nokia*

**Abstract:**

**Discussion:**

**Decision: Endorsed.**

**R4-2103183 Draft CR to TS 38.104 – introduction of 30MHz for n48**

*Type: draftCR For: Endorsement  
 38.104 v17.0.0  
 Source: Nokia*

**Abstract:**

**Discussion:**

**Decision: Endorsed.**

**R4-2103184 Way forward on the introduction of 25, 30 and 40MHz in band n2**

*Type: other For: Approval  
 Source: AT&T*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103185 Way forward on the introduction of 25 MHz in band n5**

*Type: other For: Approval  
 Source: AT&T*

**Abstract:**

**Discussion:**

**Decision: Approved.**

#### 9.21.1 General and Rapporteur Input (WID/TR/CR) [NR\_bands\_R17\_BWs -Core/Per]

**R4-2102163 Revised Basket WID on adding channel bandwidth support to existing NR bands**

*Type: WID revised For: Endorsement  
 Source: Ericsson*

**Abstract:**

This contribution is the revision of the basket WI to include the new requests received before RAN4#97e meeting and update status of previous requests

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103179.**

**R4-2103179 Revised Basket WID on adding channel bandwidth support to existing NR bands**

*Type: WID revised For: Endorsement  
 Source: Ericsson*

**Abstract:**

This contribution is the revision of the basket WI to include the new requests received before RAN4#97e meeting and update status of previous requests

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2102164 Big CR to TS 38.104 - New CBW Basket WI**

*Type: CR For: Agreement  
 38.104 v17.0.0 CR-0291 Cat: B (Rel-17)  
  
 Source: Ericsson*

**Abstract:**

This big CR collects all draft CRs to TS 38.104 endorsed in the scope of the new CBW basket WI

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102165 Big CR to TS 38.101-1 - New CBW Basket WI**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0670 Cat: F (Rel-17)  
  
 Source: Ericsson*

**Abstract:**

This big CR collects all draft CRs to TS 38.101-1 endorsed in the scope of the new CBW basket WI

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103180.**

**R4-2103180 Big CR to TS 38.101-1 - New CBW Basket WI**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0670 Cat: F (Rel-17)  
  
 Source: Ericsson*

**Abstract:**

This big CR collects all draft CRs to TS 38.101-1 endorsed in the scope of the new CBW basket WI

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102168 Basket WID on new CBW - Rapporteur's update**

*Type: discussion For: Discussion  
 Source: Ericsson*

**Abstract:**

This contribution is giving an update and notify about parallel discussion on the MSD analysis for CA combinations for the new CBW

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 9.21.2 UE RF requirement [NR\_bands\_R17\_BWs -Core]

**R4-2101521 Adding 90 and 100MHz bandwidth for band n40**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 9.21.2.1 Reference sensitivity [NR\_bands\_R17\_BWs -Core]

**R4-2101815 Discussion on the larger channel bandwidth for band n2**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102166 New channel BW in bands n2, n5 and n48 - A-MPR**

*Type: other For: Approval  
 Source: Ericsson*

**Abstract:**

This contribution is discussing the A-MPR impact when introducing the request channel BW in bands n2, n5 and n48

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 9.21.2.2 MPR/A-MPR/NS signaling [NR\_bands\_R17\_BWs -Core]

**R4-2100132 n48 30 MHz A-MPR simulation results**

*Type: discussion For: Discussion  
 Source: Nokia*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100133 CR introduction of 30 MHz for n48**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0592 Cat: B (Rel-17)  
  
 Source: Nokia, Dish Network, Skyworks Inc*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2102167 New channel BW in bands n2, n5 and n48 - REFSENS**

*Type: other For: Approval  
 Source: Ericsson*

**Abstract:**

This contribution is discussing the UE REFSENS impact when introducing the request channel BW in bands n2, n5 and n48

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102929 UE-UE Coexistence for Asynchronous n40 n41 Networks**

*Type: discussion For: Approval  
 38.101-1 v..  
 Source: Skyworks Solutions Inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102931 UE-UE Coexistence for Asynchronous n40 n41 Networks**

*Type: discussion For: Approval  
 38.101-1 v..  
 Source: Skyworks Solutions Inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102932 n48 30MHz A-MPR Measurements**

*Type: discussion For: Approval  
 38.101-1 v..  
 Source: Skyworks Solutions Inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 9.21.2.3 others [NR\_bands\_R17\_BWs -Core]

**R4-2100166 Co-existence challenges with NR-U 100MHz channel bandwidth and other technologies**

*Type: Work Plan For: Approval  
 Source: Charter Communications, Inc*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102900 NR-U Punctured Channel SEM for 100 MHz Bandwidth**

*Type: discussion For: Approval  
 Source: CableLabs*

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 9.21.3 BS RF requirement [NR\_bands\_R17\_BWs -Core]

### 9.22 Introduction of channel bandwidths 35MHz and 45MHz for NR [NR\_FR1\_35MHz\_45MHz\_BW]

**R4-2102969 Email discussion summary for [98e][121] NR\_FR1\_35MHz\_45MHz\_BW**

*Type: other For: Information  
 Source: Moderator (Huawei)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103309.**

**R4-2103309 Email discussion summary for [98e][121] NR\_FR1\_35MHz\_45MHz\_BW**

*Type: other For: Information  
 Source: Moderator (Huawei)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103186 Way forward on spectrum utilization for 35MHz and 45MHz**

*Type: other For: Approval  
 Source: Huawei*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103187 Way forward on REFSENS for 35MHz and 45MHz**

*Type: other For: Approval  
 Source: Qualcomm*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103188 Way forward on A-MPR for 35MHz and 45MHz**

*Type: other For: Approval  
 Source: Apple*

**Abstract:**

**Discussion:**

**Decision: Approved.**

#### 9.22.1 General and Rapporteur Input (WID/TR/CR) [NR\_FR1\_35MHz\_45MHz\_BW-Core/Per]

**R4-2101501 Consideration on the work plan on introduction of channel bandwidths 35MHz and 45MHz**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 9.22.2 Spectrum utilization [NR\_FR1\_35MHz\_45MHz\_BW-Core]

**R4-2100753 Spectrum utilization with channel raster and PRB grid alignment**

*Type: other For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102141 Further discussion on spectrum utilization for 35MHz and 45MHz**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102192 Further discussion on spectrum utilization for 35MHz and 45MHz**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 9.22.3 UE RF requirements [NR\_FR1\_35MHz\_45MHz\_BW-Core]

**R4-2100516 A-MPR Proposal for n1 and 45MHz CBW**

*Type: discussion For: Approval  
 Source: Apple Inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100517 A-MPR Proposal for n2 and 35MHz CBW**

*Type: discussion For: Approval  
 Source: Apple Inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100518 A-MPR Proposal for n25 and 45MHz CBW**

*Type: discussion For: Approval  
 Source: Apple Inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100703 REFSENS of n8 and n71 for 35MHz channel bandwidth**

*Type: discussion For: Approval  
 Source: Murata Manufacturing Co Ltd.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100705 REFSENS of n25 for 45MHz channel bandwidth**

*Type: discussion For: Approval  
 Source: Murata Manufacturing Co Ltd.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101159 REFSENS evaluation of n8 and n71 for 35MHz channel bandwidth**

*Type: discussion For: Approval  
 38.101-1 v..  
 Source: Mediatek India Technology Pvt.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101177 35MHz 45MHz AMPR, MPR, REFSENS for n8, n71, and n25.**

*Type: other For: Approval  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101502 UE REFSENS for 35 MHz and 45 MHz**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101503 CR for TS 38.101: introduction of channel bandwidths 35MHz and 45MHz**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2102142 Introduction of 35MHz and 45 MHz bandwidths to TS38.101-1**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0666 Cat: B (Rel-17)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision:** The document was **withdrawn**.

**R4-2102193 Introduction of 35MHz and 45 MHz bandwidths to TS38.101-1**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0671 Cat: B (Rel-17)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103189.**

**R4-2103189 Introduction of 35MHz and 45 MHz bandwidths to TS38.101-1**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0671 Cat: B (Rel-17)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102592 MSD considering asymmetric UL/DL for bands n8 and n71**

*Type: discussion For: Approval  
 Source: Apple Inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102606 CR for TS 38.101-1: UE RF requirements table simplification**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0704 Cat: F (Rel-17)  
  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2102927 35MHz 45MHz REFSENS**

*Type: discussion For: Approval  
 Source: Skyworks Solutions Inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 9.22.4 BS RF requirements [NR\_FR1\_35MHz\_45MHz\_BW-Core]

**R4-2101504 CR for TS 38.104: introduction of channel bandwidths 35MHz and 45MHz**

*Type: draftCR For: Endorsement  
 38.104 v17.0.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103190.**

**R4-2103190 CR for TS 38.104: introduction of channel bandwidths 35MHz and 45MHz**

*Type: draftCR For: Endorsement  
 38.104 v17.0.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101505 CR for TS 37.141: introduction of channel bandwidths 35MHz and 45MHz**

*Type: draftCR For: Endorsement  
 37.141 v17.0.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103191.**

**R4-2103191 CR for TS 37.141: introduction of channel bandwidths 35MHz and 45MHz**

*Type: draftCR For: Endorsement  
 37.141 v17.0.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101506 CR for TS 37.145-2: introduction of channel bandwidths 35MHz and 45MHz**

*Type: draftCR For: Endorsement  
 37.145-2 v17.0.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103192.**

**R4-2103192 CR for TS 37.145-2: introduction of channel bandwidths 35MHz and 45MHz**

*Type: draftCR For: Endorsement  
 37.145-2 v17.0.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101559 CR to TS 37.105: Introduction of CBWs 35 MHz and 45 MHz**

*Type: CR For: Agreement  
 37.105 v17.0.0 CR-0219 Cat: B (Rel-17)  
  
 Source: Ericsson*

**Abstract:**

BS RF requirements for 35 MHz and 45 MHz channel bandwidths were added

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103193.**

**R4-2103193 CR to TS 37.105: Introduction of CBWs 35 MHz and 45 MHz**

*Type: CR For: Agreement  
 37.105 v17.0.0 CR-0219 Cat: B (Rel-17)  
  
 Source: Ericsson*

**Abstract:**

BS RF requirements for 35 MHz and 45 MHz channel bandwidths were added

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101560 CR to TS 38.141-1: Introduction of CBWs 35 MHz and 45 MHz**

*Type: CR For: Agreement  
 38.141-1 v17.0.0 CR-0191 Cat: B (Rel-17)  
  
 Source: Ericsson*

**Abstract:**

BS RF requirements for 35 MHz and 45 MHz channel bandwidths were added

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103194.**

**R4-2103194 CR to TS 38.141-1: Introduction of CBWs 35 MHz and 45 MHz**

*Type: CR For: Agreement  
 38.141-1 v17.0.0 CR-0191 Cat: B (Rel-17)  
  
 Source: Ericsson*

**Abstract:**

BS RF requirements for 35 MHz and 45 MHz channel bandwidths were added

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101986 CR to TS 38.141-2: Introduction of 35MHz and 45MHz**

*Type: CR For: Agreement  
 38.141-1 v17.0.0 CR-0197 Cat: B (Rel-17)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2103354 CR to TS 38.141-2: Introduction of 35MHz and 45MHz**

*Type: CR For: Agreement  
 38.141-2 v17.0.0 CR- Cat: B (Rel-17)  
  
 Source: ZTE Corporation*

**Abstract:**

**Discussion:**

**Decision: Endorsed.**

**R4-2103195 CR to TS 38.141-2: Introduction of 35MHz and 45MHz**

*Type: CR For: Agreement  
 38.141-1 v17.0.0 CR-0197 Cat: B (Rel-17)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2101987 CR to 37.145-1: Introduction of 35MHz and 45MHz**

*Type: CR For: Agreement  
 37.145-1 v17.0.0 CR-0242 Cat: B (Rel-17)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103196.**

**R4-2103196 CR to 37.145-1: Introduction of 35MHz and 45MHz**

*Type: CR For: Agreement  
 37.145-1 v17.0.0 CR-0242 Cat: B (Rel-17)  
  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2102484 CR to 37.104: Introduction of requirements for 35 and 45MHz channel bandwidths**

*Type: CR For: Agreement  
 37.104 v17.0.0 CR-0933 Cat: B (Rel-17)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103197.**

**R4-2103197 CR to 37.104: Introduction of requirements for 35 and 45MHz channel bandwidths**

*Type: CR For: Agreement  
 37.104 v17.0.0 CR-0933 Cat: B (Rel-17)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

#### 9.22.5 Others [NR\_FR1\_35MHz\_45MHz\_BW-Core]

### 9.23 Band combinations for Uu and V2X con-current operation [NR\_LTE\_V2X\_PC5\_combos]

**R4-2102970 Email discussion summary for [98e][122] NR\_LTE\_V2X\_PC5\_combos**

*Type: other For: Information  
 Source: Moderator (CATT)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103310.**

**R4-2103310 Email discussion summary for [98e][122] NR\_LTE\_V2X\_PC5\_combos**

*Type: other For: Information  
 Source: Moderator (CATT)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103198 Updated TR 37.875 on band combinations for con-current operation of NR/LTE Uu bands/band combinations and one NR/LTE V2X PC5 band**

*Type: draft TR For: Agreement  
 37.875 v0.2.0  
 Source: CATT*

**Abstract:**

**Discussion:**

**Decision: Agreed.**

#### 9.23.1 General and Rapporteur Input (WID/TR/CR) [NR\_LTE\_V2X\_PC5\_combos-Core/Per]

**R4-2100412 TP on V2X\_n41A-n47A coexistence study**

*Type: pCR For: Approval  
 37.875 v0.0.0  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103199.**

**R4-2103199 TP on V2X\_n41A-n47A coexistence study**

*Type: pCR For: Approval  
 37.875 v0.0.0  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100413 CR for TS 38.101-1, Introduce new band combination of V2X\_n41A-n47A**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0616 Cat: B (Rel-17)  
  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103200.**

**R4-2103200 CR for TS 38.101-1, Introduce new band combination of V2X\_n41A-n47A**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0616 Cat: B (Rel-17)  
  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100414 CR for TS 38.101-3, Introduce new band combination of V2X\_41A-n47A and V2X\_n41A-47A**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0441 Cat: B (Rel-17)  
  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103201.**

**R4-2103201 CR for TS 38.101-3, Introduce new band combination of V2X\_41A-n47A and V2X\_n41A-47A**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0441 Cat: B (Rel-17)  
  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100502 TR 37.875 on band combinations for con-current operation of NR/LTE Uu bands/band combinations and one NR/LTE V2X PC5 band**

*Type: draft TR For: Agreement  
 37.875 v0.0.1  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101290 Revised WID for V2X band combination**

*Type: WID revised For: Approval  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

#### 9.23.2 UE RF requirement for concurrent operation between NR Uu band and NR PC5 band [NR\_LTE\_V2X\_PC5\_combos-Core]

**R4-2100617 Revision of inter-band V2X con-currency table for V2X\_n39A-n47A and V2X\_n40A-n47A**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0625 Cat: F (Rel-17)  
  
 Source: Qualcomm Incorporated*

**Abstract:**

Removes n47 from protected band list for V2X\_n39A-n47A and V2X\_n40A-n47A

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 9.23.3 UE RF requirement for concurrent operation between LTE Uu band and NR PC5 band [NR\_LTE\_V2X\_PC5\_combos-Core]

**R4-2100618 Revision of inter-band V2X con-currency table for V2X\_39\_n47 and V2X\_40\_n47**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0446 Cat: F (Rel-17)  
  
 Source: Qualcomm Incorporated*

**Abstract:**

Removes n47 from protected band list for V2X\_39\_n47 and V2X\_40\_n47

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 9.23.4 UE RF requirement for concurrent operation between NR Uu band and LTE PC5 band [NR\_LTE\_V2X\_PC5\_combos-Core]

#### 9.23.5 UE RF requirement for concurrent operation of LTE/NR CA/DC band combinations + PC5 V2X [NR\_LTE\_V2X\_PC5\_combos-Core]

### 9.24 Introduction of FR2 FWA UE with maximum TRP of 23dBm for band n257 and n258 [NR\_FR2\_FWA\_Bn257\_Bn258]

#### 9.24.1 UE RF (38.101-2) [NR\_FR2\_FWA\_Bn257\_Bn258-Core]

**R4-2102971 Email discussion summary for [98e][123] NR\_FR2\_FWA\_Bn257\_Bn258**

*Type: other For: Information  
 Source: Moderator (SoftBank)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103311.**

**R4-2103311 Email discussion summary for [98e][123] NR\_FR2\_FWA\_Bn257\_Bn258**

*Type: other For: Information  
 Source: Moderator (SoftBank)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103202 Way forward on Beam correspondence for FR2 FWA**

*Type: other For: Approval  
 Source: SoftBank*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2100566 Views on RF requirement for FWA**

*Type: other For: Approval  
 Source: Sony, Ericsson*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100692 Proposals on FR2 PC5 beam correspondence**

*Type: discussion For: Approval  
 Source: MediaTek Beijing Inc.*

**Abstract:**

Proposal1: If FR2 power class 5 beam correspondence is required, both beam correspondence bit-0 and bit-1 requirement shall be defined.

Proposal2: As Table2, UE beam correspondence tolerance for FR2 power class 5:

• n257 = [3.0] dB at 85th %-tile ?EIRPBC

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101282 Beam correspondence requirements for FWA UE devices**

*Type: discussion For: Discussion  
 Source: Intel Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101753 Discussion on Rel-17 FWA beam correspondence**

*Type: discussion For: Approval  
 Source: OPPO*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102560 Beam correspondence of FWA device**

*Type: other For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102631 on new FWA UE beam correspondence requirement**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102669 On PC5 beam correspondence requirement**

*Type: other For: Agreement  
 Source: Qualcomm Incorporated*

**Abstract:**

PC5 BC requirement proposal

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102670 CR to 38.807: Update for FR2 PC5**

*Type: CR For: Agreement  
 38.101-2 v15.12.0 CR-0338 Cat: F (Rel-15)  
  
 Source: Qualcomm Incorporated*

**Abstract:**

Add PC5 to existing list of power classes

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102671 CR to 38.807: Update for FR2 PC5**

*Type: CR For: Agreement  
 38.101-2 v16.6.0 CR-0339 Cat: F (Rel-16)  
  
 Source: Qualcomm Incorporated*

**Abstract:**

Add PC5 to existing list of power classes

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102672 CR to 38.807: Update for FR2 PC5**

*Type: CR For: Agreement  
 38.101-2 v17.0.0 CR-0340 Cat: A (Rel-17)  
  
 Source: Qualcomm Incorporated*

**Abstract:**

Add PC5 to existing list of power classes

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102688 CR for FR2 FWA RF requirements**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0711 Cat: B (Rel-17)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103203.**

**R4-2103203 CR for FR2 FWA RF requirements**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0711 Cat: B (Rel-17)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102700 CR to 38.807: Update for FR2 PC5**

*Type: CR For: Agreement  
 38.307 v15.7.0 CR-0058 Cat: F (Rel-15)  
  
 Source: Qualcomm Incorporated*

**Abstract:**

Add PC5 to existing list of power classes

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2102701 CR to 38.807: Update for FR2 PC5**

*Type: CR For: Agreement  
 38.307 v16.5.0 CR-0059 Cat: F (Rel-16)  
  
 Source: Qualcomm Incorporated*

**Abstract:**

Add PC5 to existing list of power classes

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2102702 CR to 38.807: Update for FR2 PC5**

*Type: CR For: Agreement  
 38.307 v17.0.0 CR-0060 Cat: A (Rel-17)  
  
 Source: Qualcomm Incorporated*

**Abstract:**

Add PC5 to existing list of power classes

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

#### 9.24.4 Others [NR\_FR2\_FWA\_Bn257\_Bn258-Core/Perf]

**R4-2100709 CR for 38.307: Introduction of power class 5 for FR2**

*Type: CR For: Agreement  
 38.307 v17.0.0 CR-0042 Cat: B (Rel-17)  
  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

### 9.25 Introduction of NR 47 GHz band [NR\_47GHz\_Band]

#### 9.25.1 UE RF (38.101-2) [NR\_47GHz\_Band-Core]

**R4-2102972 Email discussion summary for [98e][124] NR\_47GHz\_Band**

*Type: other For: Information  
 Source: Moderator (Nokia)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103312.**

**R4-2103312 Email discussion summary for [98e][124] NR\_47GHz\_Band**

*Type: other For: Information  
 Source: Moderator (Nokia)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

##### 9.25.1.1 Peak EIRP and EIRP spherical coverage [NR\_47GHz\_Band-Core]

**R4-2100094 Multi-band relaxation for band n262**

*Type: discussion For: Discussion  
 Source: Murata Manufacturing Co., Ltd.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100567 Peak EIRP and EIRP spherical coverage for PC3 for n262**

*Type: other For: Approval  
 Source: Sony, Ericsson*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100748 EIRP requirements for n262**

*Type: other For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100913 UE RF requirements for 47 GHz band**

*Type: discussion For: Approval  
 Source: Samsung*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101831 Discussion on MOP for Band n262**

*Type: other For: Approval  
 Source: vivo*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102590 Peak EIRP and EIRP Spherical coverage for n262**

*Type: discussion For: Approval  
 Source: Apple Inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102668 On EIRP spherical coverage requirements for n262**

*Type: other For: Discussion  
 Source: Qualcomm Incorporated*

**Abstract:**

peak gain, spherical coverage of gain discussed

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102906 EIRP requirements of band n262**

*Type: discussion For: Discussion  
 Source: Intel Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 9.25.1.2 Other UE TX requirements [NR\_47GHz\_Band-Core]

**R4-2100568 Multiband relaxations for PC3 for n262**

*Type: other For: Approval  
 Source: Sony, Ericsson*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100749 TP to TR 38.847: UE Tx requirement for n262**

*Type: pCR For: Approval  
 38.847 v0.0.2  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103204.**

**R4-2103204 TP to TR 38.847: UE Tx requirement for n262**

*Type: pCR For: Approval  
 38.847 v0.0.2  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100750 Introduction of n262 UE RF requirements**

*Type: CR For: Agreement  
 38.101-2 v17.0.0 CR-0325 Cat: B (Rel-17)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103205.**

**R4-2103205 Introduction of n262 UE RF requirements**

*Type: CR For: Agreement  
 38.101-2 v17.0.0 CR-0325 Cat: B (Rel-17)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103392.**

**R4-2103392 Introduction of n262 UE RF requirements**

*Type: CR For: Agreement  
 38.101-2 v17.0.0 CR-0325 Cat: B (Rel-17)  
  
 Source: Nokia, Nokia Shanghai Bell, Apple*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2102667 On EVM requirements for n262**

*Type: other For: Agreement  
 Source: Qualcomm Incorporated*

**Abstract:**

Next steps to investigate if deviation from existing FR2 EVM side conditions is justified for n262

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 9.25.1.3 REFSENS and EIS spherical coverage [NR\_47GHz\_Band-Core]

**R4-2100569 REFSENS and EIS spherical coverage for PC3 for n262**

*Type: other For: Approval  
 Source: Sony, Ericsson*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100751 EIS requirements for n262**

*Type: other For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101832 Discussion on REFSENS and EIS spherical coverage for Band n262**

*Type: other For: Approval  
 Source: vivo*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102591 Peak EIS and EIS Spherical coverage for n262**

*Type: discussion For: Approval  
 Source: Apple Inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102907 EIS requirements of band n262**

*Type: discussion For: Discussion  
 Source: Intel Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 9.25.1.4 Other UE RX requirements [NR\_47GHz\_Band-Core]

**R4-2100752 TP to TR 38.847: UE Rx requirement for n262**

*Type: pCR For: Approval  
 38.847 v0.0.2  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103206.**

**R4-2103206 TP to TR 38.847: UE Rx requirement for n262**

*Type: pCR For: Approval  
 38.847 v0.0.2  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Approved.**

#### 9.25.4 Others [NR\_47GHz\_Band-Core/Perf]

##### 9.25.4.4 Others [NR\_47GHz\_Band-Core/Perf]

**R4-2102158 TR 38.847 Introduction of NR Band 262 (47GHz band)**

*Type: draft TR For: Agreement  
 38.847 v0.1.0  
 Source: Ericsson*

**Abstract:**

Updated TR to capture the work done when specifying the new NR FR2 47GHz band

**Discussion:**

[report of discussion]

**Decision: Agreed.**

### 9.26 Introduction of NR band n24 [NR\_band\_n24]

**R4-2102973 Email discussion summary for [98e][125] NR\_LTE\_band\_n24**

*Type: other For: Information  
 Source: Moderator (Ligado Networks)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103313.**

**R4-2103313 Email discussion summary for [98e][125] NR\_LTE\_band\_n24**

*Type: other For: Information  
 Source: Moderator (Ligado Networks)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

#### 9.26.1 UE RF (38.101-1) [NR\_band\_n24-Core]

**R4-2100134 Simulation results for n24 / band 24 A-MPR**

*Type: discussion For: Discussion  
 Source: Nokia*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100135 n24 / band 24 A-MPR proposal**

*Type: other For: Approval  
 Source: Nokia, Skyworks Inc*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103209.**

**R4-2103209 n24 / band 24 A-MPR proposal**

*Type: other For: Approval  
 Source: Nokia, Skyworks Inc*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100246 CR for TS 38.101-1 introduction of NR band n24**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0604 Cat: B (Rel-17)  
  
 Source: Ligado Networks, Nokia, Skyworks Solutions Inc.*

**Abstract:**

Updates to 38.101-1 to introduce NR band n24

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103210.**

**R4-2103210 CR for TS 38.101-1 introduction of NR band n24**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0604 Cat: B (Rel-17)  
  
 Source: Ligado Networks, Nokia, Skyworks Solutions Inc.*

**Abstract:**

Updates to 38.101-1 to introduce NR band n24

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103378.**

**R4-2103378 CR for TS 38.101-1 introduction of NR band n24**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0604 Cat: B (Rel-17)  
  
 Source: Ligado Networks, Nokia, Skyworks Solutions Inc.*

**Abstract:**

Updates to 38.101-1 to introduce NR band n24

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100545 Band 24, n24 and n99 A-MPR**

*Type: discussion For: Approval  
 38.101-1 v..  
 Source: Skyworks Solutions Inc.*

**Abstract:**

This contribution provided measurements for band n24 AMPR proposal. It is also proposing AMPR for LTE band 24 and NR SUl n99 and thus must be considered in related agendas.

**Discussion:**

[report of discussion]

**Decision: Approved.**

#### 9.26.2 BS RF (38.104) [NR\_band\_n24-Core]

**R4-2102451 CR to 38.104: Introduction of n24**

*Type: CR For: Agreement  
 38.104 v17.0.0 CR-0295 Cat: B (Rel-17)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 9.26.3 RRM (38.133) [NR\_band\_n24-Core]

**R4-2100247 CR for TS 38.133 introduction of NR band n24**

*Type: CR For: Agreement  
 38.133 v17.0.0 CR-1469 Cat: B (Rel-17)  
  
 Source: Ligado Networks*

**Abstract:**

Updates to TS 38.133 to introduce NR band n24

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 9.26.4 Others [NR\_band\_n24-Core/Perf]

**R4-2100248 CR for TS 37.105 introduction of NR band n24**

*Type: CR For: Agreement  
 37.105 v17.0.0 CR-0214 Cat: B (Rel-17)  
  
 Source: Ligado Networks*

**Abstract:**

Updates to TS 37.105 to introduce NR band n24

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100249 CR for TS 37.145-1 introduction of NR band n24**

*Type: CR For: Agreement  
 37.145-1 v17.0.0 CR-0234 Cat: B (Rel-17)  
  
 Source: Ligado Networks*

**Abstract:**

Updates to TS 37.145-1 to introduce NR band n24

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100250 CR for TS 37.145-2 introduction of NR band n24**

*Type: CR For: Agreement  
 37.145-2 v17.0.0 CR-0268 Cat: B (Rel-17)  
  
 Source: Ligado Networks*

**Abstract:**

Updates to TS 37.145-2 to introduce NR band n24

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100251 CR for TS 38.141-1 introduction of NR band n24**

*Type: CR For: Agreement  
 38.141-1 v17.0.0 CR-0168 Cat: B (Rel-17)  
  
 Source: Ligado Networks*

**Abstract:**

Updates to TS 38.141-1 to introduce NR band n24

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100252 CR for TS 38.141-2 introduction of NR band n24**

*Type: CR For: Agreement  
 38.141-2 v17.0.0 CR-0259 Cat: B (Rel-17)  
  
 Source: Ligado Networks*

**Abstract:**

Updates to TS 38.141-2 to introduce NR band n24

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102447 CR to 36.104: Introduction of n24 requirements**

*Type: CR For: Agreement  
 36.104 v17.0.0 CR-4927 Cat: B (Rel-17)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102448 CR to 36.141: Introduction of n24 requirements**

*Type: CR For: Agreement  
 36.141 v17.0.0 CR-1295 Cat: B (Rel-17)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102449 CR to 37.104: Introduction of n24 requirements**

*Type: CR For: Agreement  
 37.104 v17.0.0 CR-0924 Cat: B (Rel-17)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102450 CR to 37.141: Introduction of n24 requirements**

*Type: CR For: Agreement  
 37.141 v17.0.0 CR-0964 Cat: B (Rel-17)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

### 9.27 Introduction of 1.6 GHz NR SUL band with same uplink frequency range of Band 24 [NR\_SUL\_UL\_n24]

#### 9.27.1 UE RF (38.101-1) [NR\_SUL\_UL\_n24-Core]

**R4-2100332 Discussion on new SUL band n99 UE requirements**

*Type: discussion For: Discussion  
 Source: Huawei,HiSilicon*

**Abstract:**

SUL n99

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100334 CR to 38101-1 on introducing new SUL band n99**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0609 Cat: B (Rel-17)  
  
 Source: Huawei,HiSilicon*

**Abstract:**

SUL n99

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103211.**

**R4-2103211 CR to 38101-1 on introducing new SUL band n99**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0609 Cat: B (Rel-17)  
  
 Source: Huawei,HiSilicon*

**Abstract:**

SUL n99

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103351.**

**R4-2103351 CR to 38101-1 on introducing new SUL band n99**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0609 Cat: B (Rel-17)  
  
 Source: Huawei,HiSilicon*

**Abstract:**

SUL n99

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 9.27.2 BS RF (38.104) [NR\_SUL\_UL\_n24-Core]

**R4-2100333 Discussion on new SUL band n99 BS requirements**

*Type: discussion For: Discussion  
 Source: Huawei,HiSilicon*

**Abstract:**

SUL n99

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100335 CR to 38104 on introducing new SUL band n99**

*Type: CR For: Agreement  
 38.104 v17.0.0 CR-0262 Cat: B (Rel-17)  
  
 Source: Huawei,HiSilicon*

**Abstract:**

SUL n99

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103212.**

**R4-2103212 CR to 38104 on introducing new SUL band n99**

*Type: CR For: Agreement  
 38.104 v17.0.0 CR-0262 Cat: B (Rel-17)  
  
 Source: Huawei,HiSilicon*

**Abstract:**

SUL n99

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103352.**

**R4-2103352 CR to 38104 on introducing new SUL band n99**

*Type: CR For: Agreement  
 38.104 v17.0.0 CR-0262 Cat: B (Rel-17)  
  
 Source: Huawei,HiSilicon*

**Abstract:**

SUL n99

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100336 CR to 36104 on introducing new SUL band n99**

*Type: CR For: Agreement  
 36.104 v17.0.0 CR-4920 Cat: B (Rel-17)  
  
 Source: Huawei,HiSilicon*

**Abstract:**

SUL n99

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100337 CR to 38141-1 on introducing new SUL band n99**

*Type: CR For: Agreement  
 38.141-1 v17.0.0 CR-0169 Cat: B (Rel-17)  
  
 Source: Huawei,HiSilicon*

**Abstract:**

SUL n99

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100338 CR to 38141-2 on introducing new SUL band n99**

*Type: CR For: Agreement  
 38.141-2 v17.0.0 CR-0260 Cat: B (Rel-17)  
  
 Source: Huawei,HiSilicon*

**Abstract:**

SUL n99

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100339 CR to 36141 on introducing new SUL band n99**

*Type: CR For: Agreement  
 36.141 v17.0.0 CR-1288 Cat: B (Rel-17)  
  
 Source: Huawei,HiSilicon*

**Abstract:**

SUL n99

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100340 CR to 37104 on introducing new SUL band n99**

*Type: CR For: Agreement  
 37.104 v17.0.0 CR-0920 Cat: B (Rel-17)  
  
 Source: Huawei,HiSilicon*

**Abstract:**

SUL n99

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100341 CR to 37141 on introducing new SUL band n99**

*Type: CR For: Agreement  
 37.141 v17.0.0 CR-0959 Cat: B (Rel-17)  
  
 Source: Huawei,HiSilicon*

**Abstract:**

SUL n99

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100342 CR to 37105 on introducing new SUL band n99**

*Type: CR For: Agreement  
 37.105 v17.0.0 CR-0216 Cat: B (Rel-17)  
  
 Source: Huawei,HiSilicon*

**Abstract:**

SUL n99

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100343 CR to 37145-1 on introducing new SUL band n99**

*Type: CR For: Agreement  
 37.145-1 v17.0.0 CR-0236 Cat: B (Rel-17)  
  
 Source: Huawei,HiSilicon*

**Abstract:**

SUL n99

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103213.**

**R4-2103213 CR to 37145-1 on introducing new SUL band n99**

*Type: CR For: Agreement  
 37.145-1 v17.0.0 CR-0236 Cat: B (Rel-17)  
  
 Source: Huawei,HiSilicon*

**Abstract:**

SUL n99

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100344 CR to 37145-2 on introducing new SUL band n99**

*Type: CR For: Agreement  
 37.145-2 v17.0.0 CR-0270 Cat: B (Rel-17)  
  
 Source: Huawei,HiSilicon*

**Abstract:**

SUL n99

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103214.**

**R4-2103214 CR to 37145-2 on introducing new SUL band n99**

*Type: CR For: Agreement  
 37.145-2 v17.0.0 CR-0270 Cat: B (Rel-17)  
  
 Source: Huawei,HiSilicon*

**Abstract:**

SUL n99

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 9.27.3 RRM (38.133) [NR\_SUL\_UL\_n24-Core]

#### 9.27.4 Others [NR\_SUL\_UL\_n24-Core/Perf]

### 9.28 Introduction of NR band n67 [NR\_n67]

**R4-2102974 Email discussion summary for [98e][126] NR\_n67**

*Type: other For: Information  
 Source: Moderator (Ericsson)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103314.**

**R4-2103314 Email discussion summary for [98e][126] NR\_n67**

*Type: other For: Information  
 Source: Moderator (Ericsson)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103218 Way forward on the introduction of band n67**

*Type: other For: Approval  
 Source: Ericsson*

**Abstract:**

**Discussion:**

In slide 6:

- UL RB configuration table does not apply to n67 and should be removed.

- in REFSENS table, note 7 should be attached to "n67"

**Decision: Approved.**

**R4-2102491 Introduction of band n67**

*Type: discussion For: Approval  
 Source: Huawei, HiSilicon*

**Abstract:**

discussion about introducing band n67

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 9.28.1 UE RF (38.101-1) [NR\_n67-Core]

**R4-2102170 New NR band n67 - UE RF impacts**

*Type: other For: Approval  
 Source: Ericsson*

**Abstract:**

This contribution is analyzing the UE RF impacts when adding the new refarmed band n67

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 9.28.2 BS RF (38.104) [NR\_n67-Core]

**R4-2102169 New NR band n67 - BS RF impacts**

*Type: other For: Approval  
 Source: Ericsson*

**Abstract:**

This contribution is analyzing the BS RF impacts when adding the new refarmed band n67

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 9.28.3 RRM (38.133) [NR\_n67-Core]

#### 9.28.4 Others [NR\_n67-Core/Perf]

### 9.29 Introduction of NR band n85 [NR\_n85]

**R4-2102975 Email discussion summary for [98e][127] NR\_n85**

*Type: other For: Information  
 Source: Moderator (Ericsson)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103315.**

**R4-2103315 Email discussion summary for [98e][127] NR\_n85**

*Type: other For: Information  
 Source: Moderator (Ericsson)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103219 Way forward on the introduction of band n85**

*Type: other For: Approval  
 Source: Ericsson*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2102509 Introduction of band n85**

*Type: discussion For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 9.29.1 UE RF (38.101-1) [NR\_n85-Core]

**R4-2102172 New NR band n85 - UE RF impacts**

*Type: other For: Approval  
 Source: Ericsson*

**Abstract:**

This contribution is analyzing the UE RF impacts when adding the new refarmed band n85

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 9.29.2 BS RF (38.104) [NR\_n85-Core]

**R4-2102171 New NR band n85 - BS RF impacts**

*Type: other For: Approval  
 Source: Ericsson*

**Abstract:**

This contribution is analyzing the BS RF impacts when adding the new refarmed band n85

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 9.29.3 RRM (38.133) [NR\_n85-Core]

#### 9.29.4 Others [NR\_n85-Core/Perf]

### 9.30 Introduction of bandwidth combination set 4 (BCS4) for NR [NR\_BCS4]

**R4-2102976 Email discussion summary for [98e][128] NR\_BCS4**

*Type: other For: Information  
 Source: Moderator (Ericsson)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103316.**

**R4-2103316 Email discussion summary for [98e][128] NR\_BCS4**

*Type: other For: Information  
 Source: Moderator (Ericsson)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103375.**

**R4-2103375 Email discussion summary for [98e][128] NR\_BCS4**

*Type: other For: Information  
 Source: Moderator (Ericsson)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103271 Way forward on BCS4 for NR**

*Type: other For: Approval  
 Source: Ericsson*

**Abstract:**

**Discussion:**

**Decision: Approved.**

#### 9.30.1 General and Rapporteur Input (WID/TR/CR) [NR\_BCS4-Core]

**R4-2101817 General discussion on introduction of BCS4**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102136 Templates for BCS4 configurations for inter-band NR CA**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision:** The document was **withdrawn**.

**R4-2102187 Templates for BCS4 configurations for inter-band NR CA**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 9.30.2 UE RF requirements [NR\_BCS4-Core]

**R4-2102928 Cross-band MSD for ENDC and NR-CA BCS4**

*Type: discussion For: Approval  
 38.101-1 v..  
 Source: Skyworks Solutions Inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 9.30.2.1 MSD [NR\_BCS4-Core]

**R4-2101816 Discussion on how to simplify MSD definition using bandwidth-agnostic approach**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102150 Discussion on BCS4**

*Type: discussion For: Approval  
 Source: T-Mobile USA*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102151 Draft CR for 38.101-1: Introduction of BCS4**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: T-Mobile USA, MediaTek*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103376.**

**R4-2103376 Draft CR for 38.101-1: Introduction of BCS4**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: T-Mobile USA, MediaTek*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103394.**

**R4-2103394 Draft CR for 38.101-1: Introduction of BCS4**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: T-Mobile USA, MediaTek*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

##### 9.30.2.2 Others (in case MPR/A-MPR is needed) [NR\_BCS4-Core]

#### 9.30.3 Signalling [NR\_BCS4-Core]

**R4-2100088 Required changes to the original BCS4 idea**

*Type: other For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

This contribution discuss the most suitable UE capabilities signalling methods to enable BCS4 support among captured methods in a corresponding WID.

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101371 The signalling for BCS4**

*Type: discussion For: Approval  
 Source: Xiaomi*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102137 Discussion on UE capabilities signalling to enable BCS4**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102188 Discussion on UE capabilities signalling to enable BCS4**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102502 Discussion on candidate methods for BCS4**

*Type: discussion For: (not specified)  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

### 9.31 Band combination specific requirements for NR intra band UL Carrier Aggregation []

**R4-2102977 Email discussion summary for [98e][129] NR\_req\_Intra\_UL\_CA**

*Type: other For: Information  
 Source: Moderator (Huawei)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103317.**

**R4-2103317 Email discussion summary for [98e][129] NR\_req\_Intra\_UL\_CA**

*Type: other For: Information  
 Source: Moderator (Huawei)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

#### 9.31.1 General and Rapporteur Input (WID/TR/CR) [-Core]

**R4-2102621 TR skeleton 38.XXX V001 NR\_HPUE\_intra\_Band\_R17**

*Type: other For: Endorsement  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103220.**

**R4-2103220 TR skeleton 38.XXX V001 NR\_HPUE\_intra\_Band\_R17**

*Type: other For: Endorsement  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 9.31.2 PC2 UE RF requirements [-Core]

##### 9.31.2.1 Maximum output power [-Core]

##### 9.31.2.2 A-MPR [-Core]

##### 9.31.2.3 others [-Core]

#### 9.31.3 PC3 UE RF requirements [-Core]

### 9.32 Additional NR bands for UL-MIMO [NR\_bands\_UL\_MIMO\_PC3\_R17]

**R4-2102978 Email discussion summary for [98e][130] NR\_bands\_UL\_MIMO\_PC3\_R17**

*Type: other For: Information  
 Source: Moderator (Huawei)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

#### 9.32.1 General and Rapporteur Input (WID/TR/CR) [NR\_bands\_UL\_MIMO\_PC3\_R17-Core]

**R4-2100099 Introduce NR SUL bands to PC3 UL-MIMO configuration**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0587 Cat: B (Rel-17)  
  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2102394 CR for TS 38.101-1 Introduce NR SUL bands to PC3 UL-MIMO configuration**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0688 Cat: B (Rel-17)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 9.32.2 MPR/A-MPR requirement [NR\_bands\_UL\_MIMO\_PC3\_R17-Core]

#### 9.32.3 Others [NR\_bands\_UL\_MIMO\_PC3\_R17-Core/Perf]

**R4-2102393 draftCR to introduce UL MIMO configurations for band n84**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

### 9.33 Down link interruption for band combinations to conduct dynamic Tx Switching [DL\_intrpt\_combos\_TxSW\_R17]

**R4-2102979 Email discussion summary for [98e][131] DL\_intrpt\_combos\_TxSW\_R17**

*Type: other For: Information  
 Source: Moderator (China Telecom)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103318.**

**R4-2103318 Email discussion summary for [98e][131] DL\_intrpt\_combos\_TxSW\_R17**

*Type: other For: Information  
 Source: Moderator (China Telecom)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

#### 9.33.1 General and Rapporteur Input (WID/TR/CR) [DL\_intrpt\_combos\_TxSW\_R17-Core]

**R4-2100373 TR skeleton for Downlink interruption for band combinations to conduct dynamic Tx Switching**

*Type: draft TR For: Agreement  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100374 TR 37.xxx 0.1.0 for Downlink interruption for band combinations to conduct dynamic Tx Switching**

*Type: draft TR For: Agreement  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101127 Work plan on downlink interruption for band combinations to conduct dynamic Tx switching**

*Type: other For: Approval  
 Source: China Telecom*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101128 Revised WID: Downlink interruption for NR and EN-DC band combinations to conduct dynamic Tx Switching in Uplink**

*Type: WID revised For: Endorsement  
 Source: China Telecom*

**Abstract:**

Update the WI title, code and TR remarks according to MCC suggestion

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

#### 9.33.2 Determination of inter-band uplink CA and EN-DC combinations for which DL interruption is not allowed [DL\_intrpt\_combos\_TxSW\_R17-Core]

**R4-2100806 TP on DL applicability of CA\_n3-n40-n41 for 37.xxx**

*Type: other For: Approval  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103221.**

**R4-2103221 TP on DL applicability of CA\_n3-n40-n41 for 37.xxx**

*Type: other For: Approval  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100807 TP on DL applicability of CA\_n3-n41-n79 for 37.xxx**

*Type: other For: Approval  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103222.**

**R4-2103222 TP on DL applicability of CA\_n3-n41-n79 for 37.xxx**

*Type: other For: Approval  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100808 TP on DL applicability of CA\_n8-n39-n41for 37.xxx**

*Type: other For: Approval  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103223.**

**R4-2103223 TP on DL applicability of CA\_n8-n39-n41for 37.xxx**

*Type: other For: Approval  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100809 TP on DL applicability of CA\_n8-n41-n79 for 37.xxx**

*Type: other For: Approval  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103224.**

**R4-2103224 TP on DL applicability of CA\_n8-n41-n79 for 37.xxx**

*Type: other For: Approval  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100810 TP on DL applicability of CA\_n39-n41-n79 for 37.xxx**

*Type: other For: Approval  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103225.**

**R4-2103225 TP on DL applicability of CA\_n39-n41-n79 for 37.xxx**

*Type: other For: Approval  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100811 TP on DL applicability of CA\_n40-n41-n79 for 37.xxx**

*Type: other For: Approval  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103226.**

**R4-2103226 TP on DL applicability of CA\_n40-n41-n79 for 37.xxx**

*Type: other For: Approval  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision: Approved.**

#### 9.33.3 Others [DL\_intrpt\_combos\_TxSW\_R17-Core/Perf]

**R4-2100812 Discussion on DL interruption applicability for inter-band CA with 3 bands**

*Type: discussion For: Decision  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision: Noted.**

### 9.34 High-power UE operation for use cases in Band n77 and n78 [HPUE\_PC1\_5\_n77\_n78]

**R4-2102980 Email discussion summary for [98e][132] HPUE\_PC1\_5\_n77\_n78**

*Type: other For: Information  
 Source: Moderator (Qualcomm)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103319.**

**R4-2103319 Email discussion summary for [98e][132] HPUE\_PC1\_5\_n77\_n78**

*Type: other For: Information  
 Source: Moderator (Qualcomm)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103227 Way forward on assumptions for PC1.5 in Band n77 and n78**

*Type: other For: Approval  
 Source: Qualcomm*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103228 Way forward on FWA MPE handling for n77/n78**

*Type: other For: Approval  
 Source: Samsung*

**Abstract:**

**Discussion:**

**Decision: Approved.**

#### 9.34.1 General [HPUE\_PC1\_5\_n77\_n78-Core]

**R4-2100515 Considerations for PC1.5 with n77 and n78**

*Type: discussion For: Approval  
 Source: Apple Inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100912 Regulatory information on RF exposure for FWA devices**

*Type: discussion For: Discussion  
 Source: Samsung*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102283 Consideration on adding PC 1.5 for n77 and n78**

*Type: discussion For: Agreement  
 Source: Huawei, HiSilicon*

**Abstract:**

Changes in UE spec needed for adding PC 1.5 for n77 and n78

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 9.34.2 PC1.5 UE RF requirements [HPUE\_PC1\_5\_n77\_n78-Core]

**R4-2102930 Discussion on band n77 PC1.5 operation**

*Type: discussion For: Discussion  
 38.101-1 v..  
 Source: Skyworks Solutions Inc.*

**Abstract:**

In this contribution we discuss PC1.5 for TDD bands n77 and n78 cases compared with the band n41 case already specified in Release 16 .

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 9.34.2.1 A-MPR [HPUE\_PC1\_5\_n77\_n78-Core]

**R4-2100287 Consideration for RF architecture for n77/n78 PC1.5 UE**

*Type: other For: Approval  
 Source: LG Electronics France*

**Abstract:**

propose basekine RF architecture and MPR/A-MPR simulation assumptions

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 9.34.2.2 others [HPUE\_PC1\_5\_n77\_n78-Core]

**R4-2102417 PC 1.5 for bands n77 and n78**

*Type: discussion For: Approval  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

### 9.35 Introduction of lower 6GHz NR unlicensed operation for Europe [NR\_6GHz\_unlic\_EU]

**R4-2102981 Email discussion summary for [98e][133] NR\_6GHz\_unlic\_EU**

*Type: other For: Information  
 Source: Moderator (Nokia)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103320.**

**R4-2103320 Email discussion summary for [98e][133] NR\_6GHz\_unlic\_EU**

*Type: other For: Information  
 Source: Moderator (Nokia)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103229 Way forward on introduction of lower 6GHz NR unlicensed operation for Europe**

*Type: other For: Approval  
 Source: Nokia*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2100514 Band plan for lower 6GHz NR unlicensed operation for Europe**

*Type: discussion For: Decision  
 Source: Apple Inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 9.35.1 General [NR\_6GHz\_unlic\_EU-Core]

**R4-2100546 NRU in 6GHz EU spectrum: Band Definition and Related Emission Requirements**

*Type: discussion For: Approval  
 38.101-1 v..  
 Source: Skyworks Solutions Inc.*

**Abstract:**

In this contribution, we analyze the available regulations and propose to reuse the n96 band definition restricted to the channels in the 5945-6425MHz frequency range using NS mechanism as already used for n46 sub-bands or FCC compliant indoor/outdoor ope

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101927 Skeleton TR 38.849 v0.0.0**

*Type: draft TR For: Agreement  
 38.849 v0.0.0  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

Draft skeleton for the internal TR 38.849 for the WID on Introduction of lower 6GHz NR unlicensed operation for Europe

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101928 draft TR 38.849 v0.1.0**

*Type: draft TR For: Agreement  
 38.849 v0.1.0  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

Inclusion of agreements and TPs provided at RAN4#98 to TR 38.849

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2101929 Work plan for Introduction of lower 6GHz NR unlicensed operation for Europe**

*Type: Work Plan For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101965 Discussion on Europe unlicensed 6GHz for NR-U**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 9.35.2 UE RF requirements [NR\_6GHz\_unlic\_EU-Core]

**R4-2101930 On UE RF aspects for the lower 6GHz NR unlicensed operation**

*Type: discussion For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102416 UE requirements for EU NR-U 6 GHz band**

*Type: discussion For: Approval  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 9.35.3 BS RF requirements [NR\_6GHz\_unlic\_EU-Core]

**R4-2101931 On BS RF aspects for the lower 6GHz NR unlicensed operation**

*Type: discussion For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101966 Discussion on BS RF requirements for Europe unlicensed 6GHz**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101967 draft CR for introduction of Europe unlicensed 6GHz.**

*Type: draftCR For: Endorsement  
 38.104 v17.0.0  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

#### 9.35.4 Others [NR\_6GHz\_unlic\_EU-Core]

## 10 Reply to ITU-R LS (RP-200042)

### 10.1 Study on IMT parameters for frequency ranges 6.425-7.125GHz and 10.0-10.5GHz [FS\_6425\_10500MHz \_NR]

**R4-2102982 Email discussion summary for [98e][134] FS\_6425\_10500MHz\_NR**

*Type: other For: Information  
 Source: Moderator (Ericsson)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103321.**

**R4-2103321 Email discussion summary for [98e][134] FS\_6425\_10500MHz\_NR**

*Type: other For: Information  
 Source: Moderator (Ericsson)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103103 Way forward on WF on remaining BS and UE parameters for 6.425-7.125 and 10.0-10.5 GHz**

*Type: other For: Approval  
 Source: Ericsson*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103396.**

**R4-2103396 Way forward on WF on remaining BS and UE parameters for 6.425-7.125 and 10.0-10.5 GHz**

*Type: other For: Approval  
 Source: Ericsson, ZTE, Nokia, Nokia Shanghai Bell, CATT, Qualcomm*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2101494 TR 38.921 V 0.3.0**

*Type: draft TR For: Agreement  
 38.921 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101500 Reply LS on Parameters of terrestrial component of IMT for sharing and compatibility studies in preparation for WRC-23 (6.425 to 10.5 GHz)**

*Type: LS out For: Approval  
 to ITU-R WP5D, cc RAN  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102840 Draft LS to WP5D on Parameters of terrestrial component of IMT for sharing and compatibility studies in preparation for WRC-23**

*Type: LS out For: Approval  
 to ITU-R WP5D, cc TSG RAN  
 Source: Ericsson*

**Abstract:**

The LS gives feedback to WP5D on the parameters and fills in the final ones.

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103104.**

**R4-2103104 Draft LS to WP5D on Parameters of terrestrial component of IMT for sharing and compatibility studies in preparation for WRC-23**

*Type: LS out For: Approval  
 to ITU-R WP5D, cc TSG RAN  
 Source: Ericsson*

**Abstract:**

The LS gives feedback to WP5D on the parameters and fills in the final ones.

**Discussion:**

[report of discussion]

**Decision: Approved.**

#### 10.1.1 UE parameters

**R4-2100488 Fuurther discussion on UE parameters for 6.425-7.125GHz, 7.025-7.125GHz and 10.0-10.5GHz**

*Type: discussion For: Approval  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101495 TP to TR 38.921: UE remaining parameters**

*Type: pCR For: Approval  
 38.921 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101791 Proposals of UE Parameters for Frequency Ranges 6.425-7.125GHz and 10.0-10.5GHz**

*Type: other For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

This contribution provides the proposals of the open UE parameters for frequency ranges 6.425-7.125GHz and 10.0-10.5GHz according to the downlink and uplink coexistence simulation results provided.

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101948 TP to TR 38.921 UE transmitter requirements**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103105.**

**R4-2103105 TP to TR 38.921 UE transmitter requirements**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103397.**

**R4-2103397 TP to TR 38.921 UE transmitter requirements**

*Type: other For: Approval  
 Source: ZTE Corporation, Qualcomm, Huawei, CATT, Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103408.**

**R4-2103408 TP to TR 38.921 UE transmitter requirements**

*Type: other For: Approval  
 Source: ZTE Corporation, Qualcomm, Huawei, CATT, Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102157 SI on IMT parameters - Remaining UE parameters**

*Type: other For: Approval  
 Source: Ericsson*

**Abstract:**

This contribution is discussing remaining UE parameters for the SI on IMT parameters

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102501 Discussion on UE SEM for 6.425-7.125GHz and 10-10.5GHz**

*Type: discussion For: (not specified)  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 10.1.2 BS parameters

**R4-2100489 further discussion on BS parameters for 6.425-7.125GHz, 7.025-7.125GHz and 10.0-10.5GHz**

*Type: discussion For: Approval  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100823 Discussion on remaining Tx requirements of BS for 6425-7125MHz**

*Type: discussion For: Discussion  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101496 TP to TR 38.921: BS remaining parameters**

*Type: pCR For: Approval  
 38.921 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103106.**

**R4-2103106 TP to TR 38.921: BS remaining parameters**

*Type: pCR For: Approval  
 38.921 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103398.**

**R4-2103398 TP to TR 38.921: BS remaining parameters**

*Type: pCR For: Approval  
 38.921 v0.2.0  
 Source: Huawei, HiSilicon, CATT, Nokia, ZTE*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101792 Proposals of BS Parameters for Frequency Ranges 6.425-7.125GHz and 10.0-10.5GHz**

*Type: other For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

This contribution provides the proposals of the open BS parameters for frequency ranges 6.425-7.125GHz and 10.0-10.5GHz according to the downlink and uplink coexistence simulation results provided.

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101949 TP to TR 38.921 BS requirements**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102156 SI on IMT parameters - Remaining BS parameters**

*Type: other For: Approval  
 Source: Ericsson*

**Abstract:**

This contribution is discussing remaining BS parameters for the SI on IMT parameters

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 10.1.3 Coexistence study

**R4-2101499 TP for Clause 4.3 co-existence simulation results**

*Type: pCR For: Approval  
 38.921 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101950 TP to TR 38.921 summary of simulation results**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103107.**

**R4-2103107 TP to TR 38.921 summary of simulation results**

*Type: other For: Approval  
 Source: ZTE Corporation, Nokia, Nokia Shanghai Bell, CATT, Qualcomm*

**Discussion:**

[report of discussion]

**Decision: Approved.**

##### 10.1.3.1 Simulation assumptions

**R4-2101793 TP to TR 38.921: Clarification of BS maximum transmit power on system level simulation assumptions for study on IMT parameters for frequency ranges 6.425-7.125GHz and 10.0-10.5GHz**

*Type: pCR For: Approval  
 38.921 v0.2.0  
 Source: Nokia, Nokia Shanghai Bell, ZTE*

**Abstract:**

This contribution proposes to remove the reference to Note 3 for the indoor “BS max TX power in dBm” to avoid the ambiguity that 24dBm is defined per polarization.

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101953 TP to TR 38.921 Maintenance for simulation assumption**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102500 TP to TR 38.921: Clarification of beamforming pattern modelling for multiple UL schedued UEs**

*Type: pCR For: Approval  
 38.921 v0.3.0  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2103108 TP to TR 38.921: Clarification of beamforming pattern modelling for multiple UL schedued UEs**

*Type: pCR For: Approval  
 38.921 v0.3.0  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

##### 10.1.3.2 Downlink

**R4-2100490 Downlin simulation results for 6425-7125MHz and 10-10.5GHz - indoor scenario**

*Type: discussion For: Discussion  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101497 Simulation results on indoor DL co-existence for 6.425-7.125GHz, 10.0-10.5 GHz**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101794 Downlink Indoor Hotspot Coexistence Simulation Results for Frequency Ranges 6.425-7.125GHz and 10.0-10.5GHz**

*Type: other For: Discussion  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

This contribution provides the downlink indoor hotspot coexistence simulation results according to the agreed assumptions.

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101951 DL simulation results for 6425-7125MHz and 10-10.5GHz**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102154 SI on IMT parameters - DL simulations results**

*Type: discussion For: Discussion  
 Source: Ericsson*

**Abstract:**

This contribution is providing coexistence simulations results in DL for the 6-7GHz and 10GHz bands

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102498 Downlink co-existence simulation results for indoor scenario**

*Type: discussion For: (not specified)  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 10.1.3.3 Uplink

**R4-2100491 Uuplink simulation results for 6425-7125MHz and 10-10.5GHz indoor scenario- indoor scenario**

*Type: discussion For: Discussion  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101498 Simulation results on indoor UL co-existence for 6.425-7.125GHz, 10.0-10.5 GHz**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101795 Uplink Indoor Hotspot Coexistence Simulation Results for Frequency Ranges 6.425-7.125GHz and 10.0-10.5GHz**

*Type: other For: Discussion  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

This contribution provides the uplink indoor hotspot coexistence simulation results according to the agreed assumptions.

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101952 UL simulation results for 6425-7125MHz and 10-10.5GHz**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102155 SI on IMT parameters - UL simulations results**

*Type: discussion For: Discussion  
 Source: Ericsson*

**Abstract:**

This contribution is providing coexistence simulations results in UL for the 6-7GHz and 10GHz bands

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102499 Uplink co-existence simulation results for indoor scenario**

*Type: discussion For: (not specified)  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 10.1.4 Antenna characteristics

**R4-2101182 TP to TR 38.921: Addition of in-door antenna parameters and correction to model in subclause 8.1**

*Type: pCR For: Approval  
 38.921 v0.2.0  
 Source: Ericsson*

**Abstract:**

At the end of this contribution a text proposal is attached for approval. The text proposal consists of two parts; Addition of antenna parameters for in-door deployment scenario and correction of antenna parameter definition in subclause 8.1.

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103109.**

**R4-2103109 TP to TR 38.921: Addition of in-door antenna parameters and correction to model in subclause 8.1**

*Type: pCR For: Approval  
 38.921 v0.2.0  
 Source: Ericsson*

**Abstract:**

At the end of this contribution a text proposal is attached for approval. The text proposal consists of two parts; Addition of antenna parameters for in-door deployment scenario and correction of antenna parameter definition in subclause 8.1.

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101796 TP to TR 38.921: Proposals of Indoor BS Antenna Characteristics for Frequency Ranges 6.425-7.125GHz and 10.0-10.5GHz**

*Type: pCR For: Approval  
 38.921 v0.2.0  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

This contribution provides the proposals of indoor BS antenna characteristics for frequency ranges 6.425-7.125GHz and 10.0-10.5GHz according to the downlink and uplink coexistence simulation results provided

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101954 TP to TR 38.921 Antenna configurations**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 10.1.5 Relevant information for the sharing and compatibility studies

**R4-2101797 Proposals of Relevant Information for the ITU-R WP5D Sharing and Compatibility Studies for Frequency Ranges 6.425-7.125GHz and 10.0-10.5GHz**

*Type: other For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

This contribution provides the proposals on how the relevant information may be considered in the ITU-R WP5D sharing and compatibility studies for frequency ranges 6.425-7.125GHz and 10.0-10.5GHz.

**Discussion:**

[report of discussion]

**Decision: Noted.**

## 11 Rel-17 non-spectrum related work items for NR

### 11.2 RF requirements enhancement for NR frequency range 1 (FR1) [NR\_RF\_FR1\_enh]

#### 11.2.1 General and work plan [NR\_RF\_FR1\_enh-Core]

**R4-2102983 Email discussion summary for [98e][135] NR\_RF\_FR1\_enh\_Part\_1**

*Type: other For: Information  
 Source: Moderator (Huawei)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103322.**

**R4-2103322 Email discussion summary for [98e][135] NR\_RF\_FR1\_enh\_Part\_1**

*Type: other For: Information  
 Source: Moderator (Huawei)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103231 Way forward on RF architecture and requirements for intra-band UL contiguous CA**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103232 Way forward on MPR and AMPR for intra-band UL contiguous CA**

*Type: other For: Approval  
 Source: Skyworks*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103233 Way forward on 4Rx requirement for CA\_n77(3A) and CA\_77(4A)**

*Type: other For: Approval  
 Source: SoftBank*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2102627 additional work plan for Rel-17 FR1 UE RF enhancement**

*Type: Work Plan For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103230.**

**R4-2103230 additional work plan for Rel-17 FR1 UE RF enhancement**

*Type: Work Plan For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Approved.**

#### 11.2.2 RF core requirements [NR\_RF\_FR1\_enh-Core]

**R4-2102284 n77(3/4A) DL CA UE Architecture, Regional Needs and 4x4 DL MIMO Support**

*Type: discussion For: Approval  
 38.101-1 v..  
 Source: Skyworks Solutions Inc.*

**Abstract:**

In this contribution, we further discuss architecture and 4x4 DL MIMO support for n77(3A/4A) and regional needs and make proposals in order to introduce these combinations in Release 17.

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 11.2.2.1 UL MIMO configuration for SUL band configurations [NR\_RF\_FR1\_enh-Core]

**R4-2100799 CR on introducing NR SUL bands n80 to UL-MIMO configuration**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0631 Cat: B (Rel-17)  
  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101854 Draft CR to TS 38.101-1 on switching time between SUL and NUL**

*Type: draftCR For: Endorsement  
 38.101-1 v17.0.0  
 Source: ZTE Wistron Telecom AB*

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2101855 Switching time for UL-MIMO enabled SUL band combination**

*Type: discussion For: Decision  
 Source: ZTE Wistron Telecom AB*

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 11.2.2.2 2Tx switching between carrier 1 and carrier 2 [NR\_RF\_FR1\_enh-Core]

**R4-2102984 Email discussion summary for [98e][136] NR\_RF\_FR1\_enh\_Part\_2**

*Type: other For: Information  
 Source: Moderator (China Telecom)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103323.**

**R4-2103323 Email discussion summary for [98e][136] NR\_RF\_FR1\_enh\_Part\_2**

*Type: other For: Information  
 Source: Moderator (China Telecom)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103234 LS on Rel-17 Tx switching enhancements**

*Type: LS out For: Approval  
 Source: China Telecom*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103235 Way forward on RF requirements for Rel-17 Tx switching enhancements**

*Type: other For: Approval  
 Source: China Telecom*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2100496 Discussion on 2Tx switching**

*Type: discussion For: Discussion  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100600 Discussion on power boosting for 2Tx switching**

*Type: discussion For: Discussion  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100790 Remaining issues on Tx switching enhancement and draft LS**

*Type: discussion For: Discussion  
 Source: China Telecom*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100791 Switching time mask for 2Tx-2Tx switching between two carriers and 1Tx-2Tx/2Tx-2Tx switching between two bands in Rel-17**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0628 Cat: B (Rel-17)  
  
 Source: China Telecom*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103236.**

**R4-2103236 Switching time mask for 2Tx-2Tx switching between two carriers and 1Tx-2Tx/2Tx-2Tx switching between two bands in Rel-17**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0628 Cat: B (Rel-17)  
  
 Source: China Telecom*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100800 Discussion on 2Tx switching between carrier 1 and carrier 2**

*Type: discussion For: Discussion  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101754 Discussion on Rel-17 power boosting in switched UL transmission**

*Type: discussion For: Approval  
 Source: OPPO*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102706 Further discussion on Tx Switching enhancment**

*Type: discussion For: Discussion  
 Source: vivo*

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 11.2.2.3 Tx switching between 1 carrier on band A and 2 contiguous aggregated carriers on band B [NR\_RF\_FR1\_enh-Core]

**R4-2100801 Discussion on Tx switching between 1 carrier on band A and 2 contiguous aggregated carriers on band B**

*Type: discussion For: Discussion  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101104 Discussion on remaining issue on UL Tx switching enhancement in R17**

*Type: other For: Approval  
 Source: Xiaomi*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101851 Discussion on 2Tx UL switching between two bands**

*Type: discussion For: Discussion  
 Source: ZTE Wistron Telecom AB*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102397 On 2Tx - 2Tx UE uplink switch**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 11.2.2.4 HPUE for TDD intra-band contiguous UL CA [NR\_RF\_FR1\_enh-Core]

**R4-2100288 MPR/A-MPR initial simulation results according to candidate RF architectures**

*Type: other For: Approval  
 Source: LG Electronics France*

**Abstract:**

Provide initial MPR/A-MPR simulations results for PC2 NR intra-band contiguous CA

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100544 PC2 Class C UL CA UE Architecture and MPR/A-MPR evaluation**

*Type: discussion For: Approval  
 38.101-1 v..  
 Source: Skyworks Solutions Inc.*

**Abstract:**

This contribution discusses the transmitter architecture options for PC2 contiguous UL CA and reuses the measured data to make proposals for PC2 class B and C UL CA MPR and NS04 A-MPR.

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101103 Discussion on HP UE for TDD intra-band contiguous UL CA**

*Type: other For: Approval  
 Source: Xiaomi*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101160 HPUE TDD+TDD MPR and AMPR**

*Type: other For: Approval  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101755 Discussion on Rel-17 FR1 UL CA**

*Type: discussion For: Approval  
 Source: OPPO*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102133 Discussion on PC2 intra-band contiguous NR CA RF requirements**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102184 Discussion on PC2 intra-band contiguous NR CA RF requirements**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102657 on intra-band CA HPUE RF architecture and MPR**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 11.2.2.5 HPUE for TDD intra-band non-contiguous UL CA [NR\_RF\_FR1\_enh-Core]

**R4-2102985 Email discussion summary for [98e][137] NR\_RF\_FR1\_enh\_Part\_3**

*Type: other For: Information  
 Source: Moderator (Qualcomm)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103324.**

**R4-2103324 Email discussion summary for [98e][137] NR\_RF\_FR1\_enh\_Part\_3**

*Type: other For: Information  
 Source: Moderator (Qualcomm)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103237 Way forward on NC UL CA PC2 evaluation assumptions and scenarios**

*Type: other For: Approval  
 Source: Skyworks*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103371.**

**R4-2103371 Way forward on NC UL CA PC2 evaluation assumptions and scenarios**

*Type: other For: Approval  
 Source: Skyworks*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103238 Way forward on NC UL CA PC2 requirements**

*Type: other For: Approval  
 Source: ZTE*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2100289 MPR/A-MPR initial simulation assumptions for PC2 NR intra-band NC CA**

*Type: other For: Approval  
 Source: LG Electronics France, LG Uplus*

**Abstract:**

Propose baseline RF architecture and basic simulation assumptions for MPR requirements for PC2 intra-band NC CA

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100572 PC2 non-contiguous UL CA UE Architecture and MPR/A-MPR evaluation**

*Type: discussion For: Approval  
 38.101-1 v..  
 Source: Skyworks Solutions Inc.*

**Abstract:**

This contribution discusses the transmitter architecture for PC2 non-contiguous Ul CA and provides the evaluation assumptions for n77 and n41 MPR and NS04 A-MPR.

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102134 Discussion on PC2 intra-band non-contiguous NR CA**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102185 Discussion on PC2 intra-band non-contiguous NR CA**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102707 Discussion on SAR control scheme for TDD intra-band non-contiguous UL CA HPUE**

*Type: discussion For: Discussion  
 Source: vivo*

**Discussion:**

[report of discussion]

**Decision: Noted.**

### 11.3 NR RF requirement enhancements for frequency range 2 (FR2) [NR\_RF\_FR2\_req\_enh2]

#### 11.3.1 General and work plan [NR\_RF\_FR2\_req\_enh2-Core]

**R4-2102986 Email discussion summary for [98e][138] NR\_RF\_FR2\_req\_enh2\_Part\_1**

*Type: other For: Information  
 Source: Moderator (Nokia)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103325.**

**R4-2103325 Email discussion summary for [98e][138] NR\_RF\_FR2\_req\_enh2\_Part\_1**

*Type: other For: Information  
 Source: Moderator (Nokia)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103110 Way forward on introduction of new FR2 CA BW classes**

*Type: other For: Approval  
 Source: Verizon*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103359.**

**R4-2103359 Way forward on introduction of new FR2 CA BW classes**

*Type: other For: Approval  
 Source: Verizon*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2100264 Release 17 FR2 bandwidth class**

*Type: discussion For: Decision  
 Source: Verizon Denmark*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100693 Status overview and proposals on FR2 inter-band CA discussion**

*Type: discussion For: Approval  
 Source: MediaTek Beijing Inc.*

**Abstract:**

Proposal1: For “feasibility study stage”, RAN4 shall converge inter-band DL CA discussion firstly, before start to do inter-band UL CA feasibility study.

Proposal2: For “UE requirement discussion stage”, RAN4 shall specify exact band combination demand f

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101727 On the inter-band UL CA study and change of scope too include improved BC**

*Type: other For: Approval  
 Source: Ericsson, Sony*

**Abstract:**

In this contribution we propose that the scope of the UL inter-band study is reduced to give room for further work on beam correspondence

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 11.3.2 RF core requirements [NR\_RF\_FR2\_req\_enh2-Core]

**R4-2102987 Email discussion summary for [98e][139] NR\_RF\_FR2\_req\_enh2\_Part\_2**

*Type: other For: Information  
 Source: Moderator (Qualcomm)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103326.**

**R4-2103326 Email discussion summary for [98e][139] NR\_RF\_FR2\_req\_enh2\_Part\_2**

*Type: other For: Information  
 Source: Moderator (Qualcomm)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103111 Way forward on FR2 UEs that support inter-band DL CA with IBM**

*Type: other For: Approval  
 Source: Sony*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103112 Way forward on FR2 UEs that support inter-band DL CA with CBM**

*Type: other For: Approval  
 Source: Samsung*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103399.**

**R4-2103399 Way forward on FR2 UEs that support inter-band DL CA with CBM**

*Type: other For: Approval  
 Source: Samsung*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103113 Way forward on FR2 UEs that support inter-band UL CA**

*Type: other For: Approval  
 Source: MediaTek*

**Abstract:**

**Discussion:**

**Decision: Approved.**

##### 11.3.2.1 Inter-band DL CA enhancements [NR\_RF\_FR2\_req\_enh2-Core]

###### 11.3.2.1.1 Applicability of CBM/IBM for different CA configurations [NR\_RF\_FR2\_req\_enh2-Core]

**R4-2100143 Specification differences between IBM and CBM**

*Type: discussion For: Discussion  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100570 Views on Applicability of CBM/IBM for different CA configurations**

*Type: other For: Approval  
 Source: Sony, Ericsson*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100598 Applicability for CBM and IBM for FR2 inter-band CA band combos**

*Type: other For: Approval  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100636 Discussion on applicability of CBM and IBM for different CA configurations**

*Type: discussion For: Discussion  
 Source: LG Electronics*

**Abstract:**

It discusses applicability of CBM and IBM for different CA configurations for both UL CA and DL CA.

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101284 Frequency separation class consideration for inter-band CA based on CBM**

*Type: discussion For: Discussion  
 Source: Intel Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101373 Frequency separation class for inter-band CA within the same frequency group based on CBM**

*Type: discussion For: Approval  
 Source: Xiaomi*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101756 Discussion on Rel-17 FR2 CBM IBM**

*Type: discussion For: Approval  
 Source: OPPO*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102131 Discussion on FR2 Inter-band DL CA enhancements**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102182 Discussion on FR2 Inter-band DL CA enhancements**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102511 Discussion on the CBM/IBM applicability of Rel-17 FR2 inter-band CA**

*Type: discussion For: Approval  
 Source: Google Inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102676 on CBM and IBM for FR2 inter-band DL CA**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

###### 11.3.2.1.2 UE requirements for CA configurations CA\_n258A-n260A and CA\_n257A-n259A based on IBM [NR\_RF\_FR2\_req\_enh2-Core]

**R4-2100620 RF specifications for DLCA n260A\_n258A and n259A\_n257A based on IBM**

*Type: other For: Approval  
 38.101-2 v..  
 Source: Qualcomm Incorporated*

**Abstract:**

Provides RF specifications for DLCA n260A\_n258A and n259A\_n257A

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100695 Proposals on PC3 RIB of CA\_n258A-n260A and CA\_n257A-n259A**

*Type: discussion For: Approval  
 Source: MediaTek Beijing Inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100747 FR2 inter-band CA for different frequency band groups with IBM**

*Type: other For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

In this contribution, the general framework for FR2 inter-band DL CA for different frequency group based on IBM is discussed.

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101199 Band specific requirements for FR2 DL Inter-band CA of n257n259 with IBM**

*Type: other For: Approval  
 Source: NTT DOCOMO INC.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102138 Discussion on UE requirements for CA configurations based on IBM**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision:** The document was **withdrawn**.

**R4-2102189 Discussion on UE requirements for CA configurations based on IBM**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102607 CA\_n258A-n260A and CA\_n257A-n259A based on IBM**

*Type: other For: Discussion  
 38.101-2 v..  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Noted.**

###### 11.3.2.1.3 UE requirements for CA configurations within the same frequency group based on CBM [NR\_RF\_FR2\_req\_enh2-Core]

**R4-2100142 IBM RF requirements for CA configurations within same frequency group**

*Type: other For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100621 CBM requirements for DLCA band combinations from the same frequency group**

*Type: other For: Approval  
 38.101-2 v..  
 Source: Qualcomm Incorporated*

**Abstract:**

Provides a framework for CBM requirements for DLCA band combinations from the same frequency group

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102608 Inter-band DL CA within same frequency group based on CBM**

*Type: other For: Approval  
 38.101-2 v..  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 11.3.2.2 Inter-band UL CA [NR\_RF\_FR2\_req\_enh2-Core]

###### 11.3.2.2.1 UE requirements for CA configuration CA\_n257A-n259A based on IBM [NR\_RF\_FR2\_req\_enh2-Core]

**R4-2100697 Views on inter-band UL CA power class definition**

*Type: discussion For: Approval  
 Source: MediaTek Beijing Inc.*

**Abstract:**

Proposal1: For min requirement of “simultaneous uplink in multiple bands”, “per UE” concept shall be applied.

Proposal2: Clarify whether apply power sharing mechanism for FR2 inter-band UL CA firstly, before discuss the details about based on “EIRP” or “

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101202 UE requirements for FR2 UL Inter-band CA**

*Type: other For: Approval  
 Source: NTT DOCOMO INC.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101283 Consideration on inter-band UL CA RF requirements**

*Type: discussion For: Discussion  
 Source: Intel Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101374 The MOP and Tx requirements for inter-band UL CA in FR2**

*Type: discussion For: Approval  
 Source: Xiaomi*

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 11.3.3 Feasibility study [NR\_RF\_FR2\_req\_enh2-Core]

**R4-2100637 Discussion on feasibility for inter-band CA configurations**

*Type: discussion For: Discussion  
 Source: LG Electronics*

**Abstract:**

It discusses feasibility for inter-band CA configurations.

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 11.3.3.1 Inter-band DL CA enhancements [NR\_RF\_FR2\_req\_enh2-Core]

**R4-2102714 Simulation and analysis of FR2 inter-band DL CA based on CBM/IBM**

*Type: discussion For: Discussion  
 Source: vivo*

**Discussion:**

[report of discussion]

**Decision: Noted.**

###### 11.3.3.1.1 Feasibility study for CA configurations within same frequency group based on IBM [NR\_RF\_FR2\_req\_enh2-Core]

**R4-2100893 Discussion on IBM inter-band CA within same frequency group**

*Type: discussion For: Discussion  
 Source: Samsung*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101375 The IBM UE capability for inter-band CA within the same frequency group**

*Type: discussion For: Approval  
 Source: Xiaomi*

**Discussion:**

[report of discussion]

**Decision: Noted.**

###### 11.3.3.1.2 Feasibility study for CA configurations between different frequency groups based on CBM [NR\_RF\_FR2\_req\_enh2-Core]

**R4-2100240 On the feasibility of CBM for FR2 inter-band CA cross different frequency groups**

*Type: discussion For: Discussion  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101376 The CBM UE capability for inter-band CA between different frequency groups**

*Type: discussion For: Approval  
 Source: Xiaomi*

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 11.3.3.2 Inter-band UL CA [NR\_RF\_FR2\_req\_enh2-Core]

**R4-2102715 Discussion on FR2 inter-band UL CA**

*Type: discussion For: Discussion  
 Source: vivo*

**Discussion:**

[report of discussion]

**Decision: Noted.**

###### 11.3.3.2.1 Feasibility study for CA configurations within same frequency group based on IBM and CBM [NR\_RF\_FR2\_req\_enh2-Core]

**R4-2100619 Definition of TRP and EIRP for FR2 ULCA**

*Type: other For: Approval  
 38.101-2 v..  
 Source: Qualcomm Incorporated*

**Abstract:**

Provides definitions for TRP and EIRP for FR2 ULCA

**Discussion:**

[report of discussion]

**Decision: Noted.**

###### 11.3.3.2.2 Feasibility study for CA configurations between different frequency groups based on CBM [NR\_RF\_FR2\_req\_enh2-Core]

#### 11.3.4 UL gaps for self-calibration and monitoring [NR\_RF\_FR2\_req\_enh2-Core]

**R4-2102988 Email discussion summary for [98e][140] NR\_RF\_FR2\_req\_enh2\_Part\_3**

*Type: other For: Information  
 Source: Moderator (Apple)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103327.**

**R4-2103327 Email discussion summary for [98e][140] NR\_RF\_FR2\_req\_enh2\_Part\_3**

*Type: other For: Information  
 Source: Moderator (Apple)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103114 Way forward on UL gap for FR2 RF**

*Type: other For: Approval  
 Source: Apple*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2100825 Performance evaluation for calibration**

*Type: discussion For: Discussion  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 11.3.4.1 Gap use cases and performance evaluation [NR\_RF\_FR2\_req\_enh2-Core]

**R4-2100218 UL gaps for Tx power management**

*Type: discussion For: Discussion  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101129 Discussion on the UL Gap**

*Type: discussion For: Discussion  
 Source: LG Electronics Finland*

**Abstract:**

Use cases and metrics are further discussed in this contribution.

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101200 Consideration on FR2 UL gap for self calibration and monitering**

*Type: other For: Approval  
 Source: NTT DOCOMO INC.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101467 Discussion on UL gap for self-calibration and monitoring**

*Type: discussion For: Discussion  
 Source: vivo*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102623 on gaps for self-calibration and monitoring**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102680 Power calibration gap UE improvement requirements**

*Type: discussion For: Agreement  
 Source: Ericsson, Sony*

**Abstract:**

This paper disusses the performance iprovements required for UEs supporting PCGs

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 11.3.4.2 Others [NR\_RF\_FR2\_req\_enh2-Core]

**R4-2100144 FR2 UL gaps for self-calibration and monitoring**

*Type: other For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100217 UL gaps for tranceiver calibration**

*Type: discussion For: Discussion  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100599 UL calibration gap continuation**

*Type: other For: Approval  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

### 11.7 NR support for high speed train scenario in FR2 [NR\_HST\_FR2\_enh]

**R4-2102989 Email discussion summary for [98e][141] NR\_HST\_FR2\_enh**

*Type: other For: Information  
 Source: Moderator (Samsung)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103328.**

**R4-2103328 Email discussion summary for [98e][141] NR\_HST\_FR2\_enh**

*Type: other For: Information  
 Source: Moderator (Samsung)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103240 Way forward on Deployment Scenario and UE RF Requirement for FR2 HST**

*Type: other For: Approval  
 Source: Samsung*

**Abstract:**

**Discussion:**

It is agreed:

Number of analog beams > 2 is not precluded for uni-directional scenario, if benefit is identified.

**Decision: Approved.**

#### 11.7.1 General and work plan [NR\_HST\_FR2\_enh-Core]

**R4-2102103 HST FR2 general aspects**

*Type: other For: Approval  
 Source: Ericsson*

**Abstract:**

Considers general work needed to determine supportable speed, including demod

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102266 NR support for high speed train scenario in frequency range 2 (FR2)**

*Type: other For: Approval  
 38.133 v..  
 Source: Nokia, Nokia Shanghai Bell, Samsung*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103239.**

**R4-2103239 NR support for high speed train scenario in frequency range 2 (FR2)**

*Type: other For: Approval  
 38.133 v..  
 Source: Nokia, Nokia Shanghai Bell, Samsung*

**Discussion:**

[report of discussion]

**Decision: Approved.**

#### 11.7.2 High speed train deployment scenario in FR2 [NR\_HST\_FR2\_enh-Core]

**R4-2100631 FR2 HST general discussion**

*Type: discussion For: Discussion  
 Source: Qualcomm, Inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100915 Further discussion on high speed train deployment scenario in FR2**

*Type: discussion For: Discussion  
 Source: Samsung*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100916 Simulation results and analysis on HST deployment scenario in FR2**

*Type: discussion For: Discussion  
 Source: Samsung*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101267 Discussion on deployment scenarios for NR HST in FR2**

*Type: discussion For: Discussion  
 Source: Intel Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101368 Discussion on deployment scenarios for FR2 HST**

*Type: discussion For: Discussion  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101856 Deployment scenarios for HST FR2**

*Type: discussion For: Discussion  
 Source: ZTE Wistron Telecom AB*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102093 Simulation results for HST in FR2**

*Type: discussion For: Discussion  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102099 On high-speed train deployment scenario in FR2**

*Type: discussion For: Discussion  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102104 HST FR2 deployment aspects**

*Type: other For: Approval  
 Source: Ericsson*

**Abstract:**

Considers antenna, link budget, deployment etc.

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 11.7.3 UE RF core requirements [NR\_HST\_FR2\_enh-Core]

**R4-2100918 Discussion on UE RF requirement for FR2 HST**

*Type: discussion For: Discussion  
 Source: Samsung*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102561 Power Class 4 for HST**

*Type: discussion For: Discussion  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102679 Consideration on UE requirements for FR2 HST**

*Type: discussion For: Discussion  
 Source: Ericsson*

**Abstract:**

This paper discusses the need for spherical coverage requirements for HST FR2 UEs as well as max output pwr

**Discussion:**

[report of discussion]

**Decision: Noted.**

### 11.10 NR Sidelink enhancement [NRSL\_enh]

#### 11.10.1 General and work plan [NRSL\_enh]

**R4-2102990 Email discussion summary for [98e][142] NRSL\_enh\_Part\_1**

*Type: other For: Information  
 Source: Moderator (LG Electronics)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103329.**

**R4-2103329 Email discussion summary for [98e][142] NRSL\_enh\_Part\_1**

*Type: other For: Information  
 Source: Moderator (LG Electronics)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103241 Way forward on coexistence evaluation for NR SL enhancement in Rel-17**

*Type: other For: Approval  
 Source: LGE*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103242 Way forward on system parameters and operating CBW in n14 for NR SL enhancement**

*Type: other For: Approval  
 Source: CATT, AT&T*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2100282 TR38.xxx v0.0.1 TR Skeleton for SL enhancement in Rel-17**

*Type: other For: Agreement  
 Source: LG Electronics France*

**Abstract:**

Provide Draft TR skeleton for SL enhancement in Rel-17

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103243.**

**R4-2103243 TR38.xxx v0.0.1 TR Skeleton for SL enhancement in Rel-17**

*Type: other For: Agreement  
 Source: LG Electronics France*

**Abstract:**

Provide Draft TR skeleton for SL enhancement in Rel-17

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2101938 Discussion on the adjacent channel coexistence simulation between SL and Uu in license band**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102342 Bandwidth for SL operating in n14**

*Type: other For: Approval  
 Source: Ericsson*

**Abstract:**

In this paper, we present our view on bandwidth support for n14.

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 11.10.2 Spectrum request for SL operation [NRSL\_enh-Core]

**R4-2101857 Additional Information for SL Operation in NR Band n14**

*Type: discussion For: Approval  
 Source: AT&T*

**Abstract:**

This contribution provides the additional information for SL operation in NR Band n14 that was requested in the approved WF in R4-2016923.

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103005.**

**R4-2103005 Additional Information for SL Operation in NR Band n14**

*Type: discussion For: Approval  
 Source: AT&T, FirstNet*

**Abstract:**

This contribution provides the additional information for SL operation in NR Band n14 that was requested in the approved WF in R4-2016923.

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 11.10.3 UE RF requirements for NR SL enhancement [NRSL\_enh-Core]

##### 11.10.3.1 TX requirements [NRSL\_enh-Core]

**R4-2100418 Discussion on UE Tx RF requirement for NR SL enhancement**

*Type: discussion For: Approval  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101937 Discussion on n47 PC2 MPR simulation of Rel-17 SL enhancement**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102346 SL UE Timing mask for Partially used SL operation with NR Uu operating bands**

*Type: other For: Approval  
 Source: Ericsson*

**Abstract:**

In this paper, we present our view on timing mask for partially used SL operation with NR Uu operating bands in licensed band operation.

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 11.10.3.2 RX requirements [NRSL\_enh-Core]

**R4-2100419 Discussion on UE Rx RF requirement for NR SL enhancement**

*Type: discussion For: Approval  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 11.10.4 Partially used SL operation with NR Uu operating bands [NRSL\_enh-Core]

**R4-2102991 Email discussion summary for [98e][143] NRSL\_enh\_Part\_2**

*Type: other For: Information  
 Source: Moderator (CATT)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103330.**

**R4-2103330 Email discussion summary for [98e][143] NRSL\_enh\_Part\_2**

*Type: other For: Information  
 Source: Moderator (CATT)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103244 Way forward on TDM operation for SL and Uu in licensed band**

*Type: other For: Approval  
 Source: CATT*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103245 Way forward on FDM operation for SL and Uu in licensed band**

*Type: other For: Approval  
 Source: Xiaomi*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103246 Way forward on MPR/A-MPR simulation assumption for intra-band V2X con-current operation**

*Type: other For: Approval  
 Source: LGE*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103247 Way forward on synchronous operation between Uu and SL in licensed band**

*Type: other For: Approval  
 Source: Ericsson*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103248 LS on synchronous operation between Uu and SL in licensed band**

*Type: LS out For: Approval  
 Source: CATT*

**Abstract:**

**Discussion:**

**Decision: Withdrawn.**

##### 11.10.4.1 Operating scenarios for partially used SL operation [NRSL\_enh-Core]

**R4-2100415 Discussion on operating scenarios for partial used SL operation**

*Type: discussion For: Approval  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100784 General issues about licensed bands partially used for SL**

*Type: discussion For: Approval  
 Source: vivo*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101875 on operating scenarios for partially used SL operation**

*Type: discussion For: (not specified)  
 Source: Xiaomi*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102343 Operating scenarios for partially used SL operation**

*Type: other For: Approval  
 Source: Ericsson*

**Abstract:**

In this paper, we present our view on operation scenarios in licensed band operation.

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 11.10.4.2 Synchronous operation between NR Uu and NR SL in an operating band [NRSL\_enh-Core]

**R4-2100283 Consideration on partial usage operation with PC5 and Uu in a licensed band**

*Type: other For: Approval  
 Source: LG Electronics France*

**Abstract:**

propose as follow

Proposal 1: RAN4 allow TDM operation between PC5 and Uu operation in a licensed TDD band.

Proposal 2: RAN4 can specify the con-current V2X operation in TDD intra-band without in-device coexistence study. For the FDD intra-band con-curre

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100416 Discussion on synchronous operation between NR Uu and NR SL**

*Type: discussion For: Approval  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101877 Synchronous operation between NR Uu and NR SL in an operating band**

*Type: discussion For: (not specified)  
 Source: Xiaomi*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102345 SL UE synchronization issue for licensed operation**

*Type: other For: Approval  
 Source: Ericsson*

**Abstract:**

In this paper, we present our view on timing alignment issue in licensed band operation.

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 11.10.4.3 Others [NRSL\_enh-Core]

#### 11.10.5 High power UE(PC2) for SL [NRSL\_enh-Core]

**R4-2102992 Email discussion summary for [98e][144] NRSL\_enh\_Part\_3**

*Type: other For: Information  
 Source: Moderator (Huawei)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103331.**

**R4-2103331 Email discussion summary for [98e][144] NRSL\_enh\_Part\_3**

*Type: other For: Information  
 Source: Moderator (Huawei)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103249 Way forward on issues related to PC2 NR V2X**

*Type: other For: Approval  
 Source: Huawei*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103250 Way forward on simulation assumptions for PC2 NR V2X**

*Type: other For: Approval  
 Source: Huawei*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103251 Way forward on co-existence simulation assumptions for PC2 NR V2X**

*Type: other For: Approval  
 Source: CATT*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2100420 Discussion on PC2 for SL enhancement**

*Type: discussion For: Approval  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101874 on HPUE signalling issue**

*Type: discussion For: (not specified)  
 Source: Xiaomi*

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 11.10.5.1 TX requirements [NRSL\_enh-Core]

**R4-2100284 PC2 MPR/A-MPR simulation assumptions for NR V2X UE in n47**

*Type: other For: Approval  
 Source: LG Electronics France*

**Abstract:**

Propose detail MPR/A-MPR simulation assumptions for PC2 NR V2X UE in Rel-17

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100785 Discussion on HPUE for NR sidelink enhancement in R17**

*Type: discussion For: Approval  
 Source: vivo*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101873 on HPUE for V2X RF requirements**

*Type: discussion For: (not specified)  
 Source: Xiaomi*

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 11.10.5.2 RX requirements [NRSL\_enh-Core]

#### 11.10.6 Other RF/general requirements for New SL enhancement [NRSL\_enh-Core]

**R4-2100417 Discussion on system parameters for newly introduced SL bands**

*Type: discussion For: Approval  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102344 coexisting simulation assumption for public safety UC**

*Type: other For: Approval  
 Source: Ericsson*

**Abstract:**

In this paper, we present our view on coexisting simulation assumption for public safety UC in band n14 in licensed operation.

**Discussion:**

[report of discussion]

**Decision: Noted.**

## 12 Rel-17 Study Items for NR

### 12.2 Study on supporting NR from 52.6 GHz to 71 GHz [FS\_NR\_52\_to\_71GHz]

#### 12.2.1 Numerology, Channel BW [FS\_NR\_52\_to\_71GHz]

**R4-2102993 Email discussion summary for [98e][145] FS\_NR\_52\_to\_71GHz\_Part\_1**

*Type: other For: Information  
 Source: Moderator (Qualcomm)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103332.**

**R4-2103332 Email discussion summary for [98e][145] FS\_NR\_52\_to\_71GHz\_Part\_1**

*Type: other For: Information  
 Source: Moderator (Qualcomm)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103253 Way forward on NR 52 – 71 GHz: Part 1**

*Type: other For: Approval  
 Source: Qualcomm*

**Abstract:**

**Discussion:**

Chair: please capture all agreements for part 1 into this WF, including numerology and channel bandwidth, band definition and alignment with 802.11ad/ay, etc.

**Decision: Approved.**

**R4-2100364 Discussion on CBW and FR name for above 52.6 GHz**

*Type: other For: Approval  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101561 TP to TR 38.808: Numerology and Channel Bandwidths**

*Type: pCR For: Approval  
 38.808 v1.0.0  
 Source: Ericsson*

**Abstract:**

Adding numerology and channel bandwidth to RAN4 part of TR

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103259.**

**R4-2103259 TP to TR 38.808: Numerology and Channel Bandwidths**

*Type: pCR For: Approval  
 38.808 v1.0.0  
 Source: Ericsson*

**Abstract:**

Adding numerology and channel bandwidth to RAN4 part of TR

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103374.**

**R4-2103374 TP to TR 38.808: Numerology and Channel Bandwidths**

*Type: pCR For: Approval  
 38.808 v1.0.0  
 Source: Ericsson*

**Abstract:**

Adding numerology and channel bandwidth to RAN4 part of TR

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102569 TP to TR 38.808: capturing WF on the min/max CHBW and SCS**

*Type: pCR For: Approval  
 38.808 v1.0.0  
 Source: Huawei*

**Abstract:**

Based on the WF on minimum and maximum channel bandwidths for 52.6 - 71 GHz range as approved last meeting, it is proposed to capture the WF agreements in the TR 38.808.

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102730 Discussion on minimum and maximum channel bandwidth for 52.6 GHz to 71 GHz**

*Type: discussion For: Approval  
 Source: Huawei, HiSilicon*

**Abstract:**

In this contribution, we provide further consideration on minimum and maximum channel bandwidth for 52.6 GHz to 71 GHz.

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 12.2.1.1 General [FS\_NR\_52\_to\_71GHz]

**R4-2100519 Further considerations on the numerology and channel bandwidth sizes for 60GHz frequency range**

*Type: discussion For: Decision  
 Source: Apple Inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100781 Discussion on the minimum and maximum channel bandwidth for B52.6GHz**

*Type: discussion For: Approval  
 Source: vivo*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100803 Discussion on band definition and channel BW for NR in 52.6GHz ~ 71GHz**

*Type: discussion For: Discussion  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101281 On numerology and channel bandwidth in 52.6 – 71 GHz**

*Type: discussion For: Discussion  
 Source: Intel Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102006 Numerology and channel bandwidth discussion for NR beyond 52.6 GHz**

*Type: other For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102609 Views on UL TPC for NR in 60 GHz and above frequency ranges**

*Type: other For: Approval  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 12.2.1.2 General [FS\_NR\_52\_to\_71GHz]

**R4-2101280 On improved transient period for NR 52.6 - 71 GHz**

*Type: discussion For: Discussion  
 Source: Intel Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101863 TP for NR Rel-17 TR 38.808: Time and synchronization impact**

*Type: pCR For: Approval  
 38.808 v1.0.0  
 Source: Ericsson*

**Abstract:**

Analysis of transient cases.

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101955 TP to TR 38.808 Further considerations on timing for 52.6-71GHz**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102009 TP to TR 38.808: Timing considerations for operation between 52.6 and 71 GHz**

*Type: pCR For: Approval  
 38.808 v1.0.0  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103260.**

**R4-2103260 TP to TR 38.808: Timing considerations for operation between 52.6 and 71 GHz**

*Type: pCR For: Approval  
 38.808 v1.0.0  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Approved.**

##### 12.2.1.3 Phase noise [FS\_NR\_52\_to\_71GHz]

**R4-2100782 Comparison of different PN models for B52.6G**

*Type: discussion For: Approval  
 Source: vivo*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101181 TP to TR 38.808: Addition of a set of phase noise models in subclause 4.2.3**

*Type: pCR For: Approval  
 38.808 v1.0.0  
 Source: Ericsson*

**Abstract:**

The text proposal covers not only the phase noise model but also more detailed technical information on how the model was derived in described in Annex C.

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103261.**

**R4-2103261 TP to TR 38.808: Addition of a set of phase noise models in subclause 4.2.3**

*Type: pCR For: Approval  
 38.808 v1.0.0  
 Source: Ericsson*

**Abstract:**

The text proposal covers not only the phase noise model but also more detailed technical information on how the model was derived in described in Annex C.

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102008 TP to TR 38.808: Phase noise considerations**

*Type: pCR For: Approval  
 38.808 v1.0.0  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102839 Text proposal PTRS**

*Type: pCR For: Approval  
 38.808 v1.0.0  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 12.2.2 BS aspect [FS\_NR\_52\_to\_71GHz]

**R4-2102994 Email discussion summary for [98e][146] FS\_NR\_52\_to\_71GHz\_Part\_2**

*Type: other For: Information  
 Source: Moderator (Intel)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103333.**

**R4-2103333 Email discussion summary for [98e][146] FS\_NR\_52\_to\_71GHz\_Part\_2**

*Type: other For: Information  
 Source: Moderator (Intel)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103256 TP to TR 38.808: BS antenna array**

*Type: pCR For: Approval  
 38.808 v1.0.0  
 Source: Nokia*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103257 TP to TR 38.808: BS architecture**

*Type: pCR For: Approval  
 38.808 v1.0.0  
 Source: Huawei*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103258 Way forward on NR 52 – 71 GHz: Part 2**

*Type: other For: Approval  
 Source: Intel*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103356 TP to TR 38.808: UE aspects**

*Type: pCR For: Approval  
 38.808 v1.0.0  
 Source: Intel*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2100383 Discussion on the BS requirements for 52.6-71GHz**

*Type: other For: Approval  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101183 TP to TR 38.808: Addition of technical background for BS in clause 2 and subclause 4.2.5**

*Type: pCR For: Approval  
 38.808 v1.0.0  
 Source: Ericsson*

**Abstract:**

At the end of this contribution a text proposal to TR 38.808, clause 2 and subclause 4.2.5 is attached for approval. The text proposal adds missing parts of technical information to be captured in TR 38.808 to be able to conclude the Study Item.

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102007 TP to TR 38.808: BS RF for NR beyond 52.6 GHz**

*Type: pCR For: Approval  
 38.808 v1.0.0  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102570 TP to TR 38.808: BS aspects**

*Type: pCR For: Approval  
 38.808 v1.0.0  
 Source: Huawei*

**Abstract:**

This contribution provides TP to TR 38.808 on selected BS aspects for 52.6 – 71 GHz range, including BS architecture and BS classes and additional examples of BS antenna array.

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 12.2.3 UE aspect [FS\_NR\_52\_to\_71GHz]

**R4-2102010 UE RF for NR beyond 52.6 GHz**

*Type: other For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102681 TP to TR 38.808: Addition of UE aspects**

*Type: pCR For: Approval  
 38.808 v1.0.0  
 Source: Ericsson*

**Abstract:**

Impact on SCS's on number of transient affected symbols for UE

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102862 Text proposal UE power amplifier and antenna array**

*Type: pCR For: Approval  
 38.808 v1.0.0  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 12.2.4 Others [FS\_NR\_52\_to\_71GHz]

**R4-2100384 Discussion on co-existence for 52.6-71GHz**

*Type: other For: Approval  
 Source: CATT*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100520 Regulatory update for the 60GHz frequency range**

*Type: discussion For: Decision  
 Source: Apple Inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100521 Regulatory update for the 60GHz frequency range**

*Type: draftCR For: Endorsement  
 38.807 v16.0.0  
 Source: Apple Inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100531 Views on 60 GHz testability**

*Type: discussion For: Discussion  
 Source: Apple Inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100911 How to incorperate 52.6-71GHz in specification**

*Type: other For: Discussion  
 Source: Samsung*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101833 Views on Study the testability of 60GHz**

*Type: discussion For: Approval  
 Source: vivo Communication Technology*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101956 Discussion on frequency range definition for 52.6-71GHz**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102043 TP to TR 38.808 on Spectrum regulatory situation**

*Type: pCR For: Approval  
 38.808 v1.0.0  
 Source: Ericsson*

**Abstract:**

TP to TR 38.808 on Spectrum regulatory situation within 52.6 - 71 GHz

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102571 Inputs to the discussion on the FR2-extension vs. FR3 introduction for NR operation in 52.6 - 71 GHz range**

*Type: discussion For: Discussion  
 Source: Huawei*

**Abstract:**

In this contribution we collect observations on the RAN4 specification impact (as well as selected RAN1 and RAN2 aspects) considering FR2-extension and FR3 introduction alternatives for the NR operation in 52.6 – 71 GHz range. This is provided to ease dec

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102866 Specifying 60 GHz as part of FR2**

*Type: discussion For: Discussion  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

### 12.3 Study on Efficient utilization of licensed spectrum that is not aligned with existing NR channel bandwidths [FS\_NR\_eff\_BW\_util]

**R4-2102995 Email discussion summary for [98e][147] FS\_NR\_eff\_BW\_util**

*Type: other For: Information  
 Source: Moderator (Ericsson)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103334.**

**R4-2103334 Email discussion summary for [98e][147] FS\_NR\_eff\_BW\_util**

*Type: other For: Information  
 Source: Moderator (Ericsson)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103263 Way forward on use of larger CBW**

*Type: other For: Approval  
 Source: Skyworks*

**Abstract:**

**Discussion:**

Chair: The first bullet in slide 7 does not imply the use of a BWP equal to the allocated RBs (basically be inline with the rest of the WF)

**Decision: Approved.**

**R4-2103264 Way forward on overlapping CBW method**

*Type: other For: Approval  
 Source: Nokia*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103387.**

**R4-2103387 Way forward on overlapping CBW method**

*Type: other For: Approval  
 Source: Nokia*

**Abstract:**

**Discussion:**

**Decision: Approved.**

#### 12.3.1 General and work plan [FS\_NR\_eff\_BW\_util]

**R4-2100804 Discussion on the general aspects for irregular bandwidth**

*Type: discussion For: Discussion  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101555 Updated TR 38.844 v0.0.2**

*Type: draft TR For: Agreement  
 38.844 v0.0.2  
 Source: Ericsson*

**Abstract:**

Updated TR

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103262.**

**R4-2103262 Updated TR 38.844 v0.0.2**

*Type: draft TR For: Agreement  
 38.844 v0.0.2  
 Source: Ericsson*

**Abstract:**

Updated TR

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 12.3.2 Input on operator licensed channel bandwidths in FR1 that do not align with existing NR channel bandwidths [FS\_NR\_eff\_BW\_util]

#### 12.3.3 Evaluation of use of larger channel bandwidths than operator licensed bandwidth [FS\_NR\_eff\_BW\_util]

**R4-2101556 Utilizing larger bandwidth than the operator licensed bandwidth**

*Type: discussion For: Approval  
 Source: Ericsson*

**Abstract:**

In this contribution, the goal is to focus on operator licensed bandwidths between 5 MHz and 10 MHz cases.

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101959 Discussion on irregular channel bandwidth for NR system**

*Type: other For: Discussion  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 12.3.4 Evaluation of use of overlapping UE channel bandwidths (from both UE and network perspective) [FS\_NR\_eff\_BW\_util]

**R4-2100522 Non-standard spectrum allocations for NR bands**

*Type: discussion For: Decision  
 Source: Apple Inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101507 Consideration for overlapping UE channel bandwidths**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 12.3.4.1 UE perspective [FS\_NR\_eff\_BW\_util]

**R4-2100805 Discussion on overlapping UE channel bandwidths**

*Type: discussion For: Discussion  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101557 Overlapping Channel Bandwidth Approach from UE Perspective**

*Type: discussion For: Discussion  
 Source: Ericsson*

**Abstract:**

In this contribution, the focus will be discussing overlapping bandwidth approach from UE perspective

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102288 Network and UE options for the support of irregular channel bandwidth**

*Type: discussion For: Approval  
 38.101-1 v..  
 Source: Skyworks Solutions Inc.*

**Abstract:**

This contribution discusses the different cases from a Network and UE prospective and provides an analysis of potential solutions and their related constraints.

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102558 On the use of overlapping channel bandwidths from UE perspective**

*Type: other For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Noted.**

##### 12.3.4.2 Network perspective [FS\_NR\_eff\_BW\_util]

**R4-2101459 Handling of Channel Bandwidths That Are Not Multiples of 5MHz**

*Type: discussion For: Discussion  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101558 Overlapping Channel Bandwidth Approach from BS Perspective**

*Type: discussion For: Approval  
 Source: Ericsson*

**Abstract:**

In this contribution, the focus will be discussing overlapping bandwidth approach from network perspective

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 12.3.5 Others [FS\_NR\_eff\_BW\_util]

### 12.4 Study on extended 600MHz NR band [FS\_NR\_600MHz\_ext]

**R4-2102996 Email discussion summary for [98e][148] FS\_NR\_600MHz\_ext**

*Type: other For: Information  
 Source: Moderator (Ericsson)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103335.**

**R4-2103335 Email discussion summary for [98e][148] FS\_NR\_600MHz\_ext**

*Type: other For: Information  
 Source: Moderator (Ericsson)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103266 Way forward on regulatory requirements for protection of other services identified for Region 3 and coexistence with Band 28/n28**

*Type: other For: Approval  
 Source: ZTE*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103268 Way forward on bands plans for further study and duplex filter options**

*Type: other For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103372.**

**R4-2103372 Way forward on bands plans for further study and duplex filter options**

*Type: other For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

**Discussion:**

**Decision: Noted.**

#### 12.4.1 General

**R4-2100055 Study on extended 600MHz NR band**

*Type: Work Plan For: Decision  
 Source: Spark NZ Ltd*

**Abstract:**

The work scope and work plan are presented in this document.

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103270.**

**R4-2103270 Work plan of study on extended 600MHz NR band**

*Type: Work Plan For: Decision  
 Source: Spark NZ Ltd*

**Abstract:**

The work scope and work plan are presented in this document.

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102589 Band Plan for 600MHz SI**

*Type: discussion For: Approval  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 12.4.2 Regulatory study

**R4-2100744 Regulatory study for APT 600 MHz**

*Type: other For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

Regulatory backgroud of APT 600 MHz is presented.

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102162 Extended 600MHz band - Regulatory aspects**

*Type: discussion For: Discussion  
 Source: Ericsson*

**Abstract:**

This contribution is giving an overview of regulatory requirements around the extended 600 MHz band in Region 3

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102572 Regulatory aspects for the 600MHz range in APT region**

*Type: discussion For: Agreement  
 Source: Huawei*

**Abstract:**

In this contribution we provide the inputs on the regulatory overview of 600 MHz range. Related TP to TR is provided for approval.

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103267.**

**R4-2103267 Regulatory aspects for the 600MHz range in APT region**

*Type: discussion For: Agreement  
 Source: Huawei*

**Abstract:**

In this contribution we provide the inputs on the regulatory overview of 600 MHz range. Related TP to TR is provided for approval.

**Discussion:**

[report of discussion]

**Decision: Approved.**

#### 12.4.3 Coexistence study

**R4-2100745 Coexistence for APT 600 MHz**

*Type: other For: Approval  
 Source: Nokia, Nokia Shanghai Bell, CBN*

**Abstract:**

Coexistence requirement of APT 600 MHz is discussed.

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101957 Coexistence study for extended 600MHz NR band**

*Type: other For: Discussion  
 Source: ZTE Corporation, CBN*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102573 Initial considerations on the coexistence studies for 600MHz SI**

*Type: discussion For: Discussion  
 Source: Huawei*

**Abstract:**

In this contribution we provide initial thoughts on the potential co-existence studies required for the extended 600MHz band in Region 3.

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 12.4.4 Study on frequency arrangements (such as options B1 and B2)

**R4-2100056 Frequency band arrangements and duplexer options for extended 600MHz NR band**

*Type: SID new For: Discussion  
 Source: Spark NZ Ltd*

**Abstract:**

The frequency band arrangements are presented in this contribution.

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100057 Blank TR for extended 600MHz NR band**

*Type: SID new For: Decision  
 Source: Spark NZ Ltd*

**Abstract:**

A blank TR to document the ongoing progress of this study item is enclosed

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100090 Blank TR for extended 600MHz NR band**

*Type: SID new For: Decision  
 Source: Spark NZ Ltd*

**Abstract:**

A blank TR to document the ongoing progress of this study item

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100167 Blank TR for extended 600MHz NR band**

*Type: SID new For: Decision  
 Source: Spark NZ Ltd*

**Abstract:**

A blank TR to document the ongoing progress of this study item

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2103265 Blank TR for extended 600MHz NR band**

*Type: draft TR For: Agreement  
 Source: Spark NZ Ltd*

**Abstract:**

A blank TR to document the ongoing progress of this study item

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100501 Consideration on extended 600MHz NR band**

*Type: discussion For: Decision  
 Source: CATT,CBN*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100542 Extended 600MHz NR Duplexer Feasibility and Band Arrangement**

*Type: discussion For: Approval  
 38.101-1 v..  
 Source: Skyworks Solutions Inc.*

**Abstract:**

In this contribution, we analyze the different duplexer options in light of the duplexer implementation of other FDD bands in the same frequency range like band 71 and band 28/68 and make alternative proposals for the support of envisaged 2x40MHz spectrum

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100746 Frequency arrangements for APT 600 MHz**

*Type: other For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

duplexer feasiblity of APT 600 is discussed

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101372 Discussion on frequency arrangement for extended 600MHz NR Band**

*Type: discussion For: Approval  
 Source: Xiaomi*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101958 Discussions on Option B1 and B2 for extended 600MHz**

*Type: other For: Discussion  
 Source: ZTE Corporation, CBN*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102161 Extended 600MHz band - frequency arrangement**

*Type: other For: Approval  
 Source: Ericsson*

**Abstract:**

This contribution is analyzing the 2 proposed options

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102407 600 MHz band for Region 3**

*Type: discussion For: Discussion  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102574 Feasibility analysis of the frequency arrangement in 600MHz range for APT**

*Type: discussion For: Agreement  
 Source: Huawei, CBN*

**Abstract:**

In this contribution we provide the requested feasibility analysis of the possible frequency arrangements for 600MHz range for APT region, based on the pre-defined options B1 and B2. Related TP to TR is provided for approval.

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 12.4.5 Others

**R4-2102575 [DRAFT] Reply LS on technical feasibilities for frequency arrangements for IMT in 470 – 703 MHz band**

*Type: LS out For: Approval  
 to APT Wireless Group, cc TSG RAN  
 Source: Huawei, CBN*

**Abstract:**

In this contribution we provide draft reply LS to the APT Wireless Group LS in RP-202934, based on the discussion on technical feasibilities for frequency arrangements for IMT in 470 – 703 MHz band.

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103269.**

**R4-2103269 [DRAFT] Reply LS on technical feasibilities for frequency arrangements for IMT in 470 – 703 MHz band**

*Type: LS out For: Approval  
 to APT Wireless Group, cc TSG RAN  
 Source: Huawei, CBN*

**Abstract:**

In this contribution we provide draft reply LS to the APT Wireless Group LS in RP-202934, based on the discussion on technical feasibilities for frequency arrangements for IMT in 470 – 703 MHz band.

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103364.**

**R4-2103364 [DRAFT] Reply LS on technical feasibilities for frequency arrangements for IMT in 470 – 703 MHz band**

*Type: LS out For: Approval  
 to APT Wireless Group, cc TSG RAN  
 Source: Huawei, CBN*

**Abstract:**

In this contribution we provide draft reply LS to the APT Wireless Group LS in RP-202934, based on the discussion on technical feasibilities for frequency arrangements for IMT in 470 – 703 MHz band.

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103406.**

**R4-2103406 [DRAFT] Reply LS on technical feasibilities for frequency arrangements for IMT in 470 – 703 MHz band**

*Type: LS out For: Approval  
 to APT Wireless Group, cc TSG RAN  
 Source: Huawei, CBN*

**Abstract:**

In this contribution we provide draft reply LS to the APT Wireless Group LS in RP-202934, based on the discussion on technical feasibilities for frequency arrangements for IMT in 470 – 703 MHz band.

**Discussion:**

[report of discussion]

**Decision: Approved.**

### 12.5 Study on high power UE (power class 2) for one NR FDD band [FS\_NR\_PC2\_UE\_FDD]

**R4-2102997 Email discussion summary for [98e][149] FS\_NR\_PC2\_UE\_FDD**

*Type: other For: Information  
 Source: Moderator (China Unicom)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103336.**

**R4-2103336 Email discussion summary for [98e][149] FS\_NR\_PC2\_UE\_FDD**

*Type: other For: Information  
 Source: Moderator (China Unicom)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103273 Way forward on PC2 for NR FDD band**

*Type: other For: Approval  
 Source: China Unicom*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103274 Way forward on simulation assumptions for system performance evaluation**

*Type: other For: Approval  
 Source: China Unicom*

**Abstract:**

**Discussion:**

**Decision: Approved.**

#### 12.5.1 General

**R4-2100081 Work plan for study on high power UE (power class 2) for one NR FDD band**

*Type: Work Plan For: Approval  
 Source: China Unicom*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103272.**

**R4-2103272 Work plan for study on high power UE (power class 2) for one NR FDD band**

*Type: Work Plan For: Approval  
 Source: China Unicom*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101110 Discussion on HP UE for FDD bands**

*Type: discussion For: Discussion  
 Source: Xiaomi*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102391 On NR FDD HPUE**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102610 Views on HPUE for NR FDD bands**

*Type: other For: Discussion  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102708 Discussion on HPUE in NR FDD band**

*Type: discussion For: Discussion  
 Source: vivo*

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 12.5.2 Scheme(s) to comply with the SAR limits

**R4-2100110 Discussion on SAR schemes for PC2 FDD band**

*Type: discussion For: Discussion  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102135 Discussion on SAR scheme for HPUE FDD**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102186 Discussion on SAR scheme for HPUE FDD**

*Type: other For: Approval  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 12.5.3 Interference issues

#### 12.5.4 UE implementation issues

**R4-2100290 Consideration of current RF components feasibility for FDD PC2 UE**

*Type: other For: Approval  
 Source: LG Electronics France*

**Abstract:**

Provide current RF component state of art technology for PC2 UE in FDD band

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100543 PC2 FDD RFFE Technology, Performance, Thermal and Power Aspects**

*Type: discussion For: Approval  
 38.101-1 v..  
 Source: Skyworks Solutions Inc.*

**Abstract:**

In this contribution we study the impact PC2 operation on the RE front-end in terms of performance, reliability and thermal aspects

**Discussion:**

[report of discussion]

**Decision: Noted.**

#### 12.5.5 System performance evaluations

**R4-2102392 System performance evaluation for FDD HPUE**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102503 Simulation assumptions for FDD HPUE performance evaluations**

*Type: discussion For: (not specified)  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102709 Initial evaulation of PC2 UE for NR FDD**

*Type: discussion For: Discussion  
 Source: vivo*

**Discussion:**

[report of discussion]

**Decision: Noted.**

## 13 Rel-17 Work Items for LTE

**R4-2102233 Work plan of Rel-17 enhancements for NB-IoT and LTE-MTC**

*Type: Work Plan For: Approval  
 Source: Huawei, Ericsson*

**Abstract:**

Work plan of Rel-17 enhancements for NB-IoT and LTE-MTC

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

### 13.1 LTE inter-band Carrier Aggregation for 2 bands DL with 1 band UL [LTE\_CA\_R17\_2BDL\_1BUL]

**R4-2102998 Email discussion summary for [98e][150] LTE\_Baskets**

*Type: other For: Information  
 Source: Moderator (Ericsson)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

#### 13.1.1 Rapporteur Input (WID/TR/CR) [LTE\_CA\_R17\_2BDL\_1BUL-Core/Perf]

**R4-2102494 Revised WID: Rel17 LTE inter-band CA for 2 bands DL with 1 band UL**

*Type: WID revised For: (not specified)  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2102495 Introduction of Rel-17 LTE inter-band CA for 2 bands DL with 1 band UL combinations in TS 36.101**

*Type: CR For: Agreement  
 36.101 v17.0.0 CR-5723 Cat: B (Rel-17)  
  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102496 TR 36.717-02-01 Rel-17 LTE inter-band CA for 2 bands DL and 1 band UL CA**

*Type: draft TR For: Agreement  
 36.717-02-01 v0.2.0  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 13.1.2 UE RF with harmonic, close proximity and isolation issues [LTE\_CA\_R17\_2BDL\_1BUL-Core]

**R4-2102313 draft CR to include 2A-2A-7C, 2A-2A-7A-7A, 2A-2A-13A**

*Type: draftCR For: Endorsement  
 36.101 v17.0.0  
 Source: Ericsson, Bell Mobility*

**Abstract:**

draft CR to include 2A-2A-7C, 2A-2A-7A-7A, 2A-2A-13A

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

#### 13.1.3 UE RF without specific issues [LTE\_CA\_R17\_2BDL\_1BUL-Core]

**R4-2100151 TP to TR 36.717-02-01: Addition of CA\_48-53**

*Type: pCR For: Approval  
 36.717-02-01 v0.1.0  
 Source: Nokia, Globalstar*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100729 TP to TR 36.717-02-01 CA\_7-25**

*Type: other For: Approval  
 36.717-02-01 v..  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

In this contribution, a text proposal to complete E-UTRA CA configurations, CA\_7A-25A, CA\_7A-7A-25, CA\_7C-25A, CA\_7A-25A-25A, CA\_7A-7A-25A-25A, and CA\_7C-25A-25A are provided.

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2100730 TP to TR 36.717-02-01 CA\_25-66**

*Type: other For: Approval  
 36.717-02-01 v..  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

In this contribution, a text proposal to complete E-UTRA CA configurations, CA\_25-66A and CA\_25A-25A-66A, is provided.

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101575 TP for TR 36.717-02-01: CA\_2A-8A**

*Type: pCR For: Approval  
 36.717-02-01 v0.1.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101936 TP to TR 36.717-02-01 Addition of CA\_46-53**

*Type: pCR For: Approval  
 36.717-02-01 v0.1.0  
 Source: Nokia, Globalstar*

**Discussion:**

[report of discussion]

**Decision: Approved.**

### 13.2 LTE inter-band Carrier Aggregation for 3 bands DL with 1 band UL [LTE\_CA\_R17\_3BDL\_1BUL]

#### 13.2.1 Rapporteur Input (WID/TR/CR) [LTE\_CA\_R17\_3BDL\_1BUL-Core/Perf]

**R4-2102830 Revised WID for LTE inter-band CA for 3 bands DL with 1 bands UL**

*Type: WID revised For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102832 Introduction of completed R17 3DL band combinations to TS 36.101**

*Type: CR For: Agreement  
 36.101 v17.0.0 CR-5727 Cat: B (Rel-17)  
  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102833 TR 36.717-03-01 0.2.0**

*Type: draft TR For: Agreement  
 36.717-03-01 v0.1.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 13.2.2 UE RF with harmonic, close proximity and isolation issues [LTE\_CA\_R17\_3BDL\_1BUL-Core]

**R4-2101398 TP for TR 36.717-03-01: CA\_1-8-32**

*Type: pCR For: Approval  
 36.717-03-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101399 TP for TR 36.717-03-01: CA\_1-28-32**

*Type: pCR For: Approval  
 36.717-03-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103096.**

**R4-2103096 TP for TR 36.717-03-01: CA\_1-28-32**

*Type: pCR For: Approval  
 36.717-03-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101400 TP for TR 36.717-03-01: CA\_7-8-28**

*Type: pCR For: Approval  
 36.717-03-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101401 TP for TR 36.717-03-01: CA\_7-8-32**

*Type: pCR For: Approval  
 36.717-03-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101402 TP for TR 36.717-03-01: CA\_7-28-32**

*Type: pCR For: Approval  
 36.717-03-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101403 TP for TR 36.717-03-01: CA\_8-20-32**

*Type: pCR For: Approval  
 36.717-03-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101404 TP for TR 36.717-03-01: CA\_8-28-32**

*Type: pCR For: Approval  
 36.717-03-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101405 TP for TR 36.717-03-01: CA\_20-28-32**

*Type: pCR For: Approval  
 36.717-03-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101907 draft CR to inlcude 7A-12A-66A-66A, 2A-2A-5A-7A, 2A-2A-7A-66A-66A, 2A-2A-7A-7A-13A, 2A-2A-7C-13A, 2A-2A-7A-13A**

*Type: draftCR For: Endorsement  
 36.101 v17.0.0  
 Source: Ericsson, Rogers, Bell Mobility*

**Abstract:**

draft CR to inlcude 7A-12A-66A-66A, 2A-2A-5A-7A, 2A-2A-7A-66A-66A, 2A-2A-7A-7A-13A, 2A-2A-7C-13A, 2A-2A-7A-13A

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

#### 13.2.3 UE RF without specific issues [LTE\_CA\_R17\_3BDL\_1BUL-Core]

**R4-2100731 TP to TR 36.717-03-01 CA\_7-25-66**

*Type: other For: Approval  
 36.717-03-01 v..  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

In this contribution, a text proposal to complete E-UTRA CA configurations, CA\_7A-25A-66A, CA\_7A-7A-25A-66A, CA\_7C-25A-66A, CA\_7A-25A-25A-66A, CA\_7A-7A-25A-25A-66A, and CA\_7C-25A-25A-66A, is provided.

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101516 DraftCR for 36.101 to add CA\_5A-7A-7A-66A, CA\_2A-5A-7A-7A and CA\_7A-7A-13A-66A**

*Type: draftCR For: Endorsement  
 36.101 v17.0.0  
 Source: Huawei, HiSilicon, Bell Mobility, Telus*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

### 13.3 LTE inter-band Carrier Aggregation for x bands DL (x=4, 5) with 1 band UL [LTE\_CA\_R17\_xBDL\_1BUL]

**R4-2101522 TP for TR 36.717-04-01: CA\_3-7-8-20-28**

*Type: pCR For: Approval  
 36.717-04-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101525 TP for TR 36.717-04-01: CA\_1-3-7-8-20-28**

*Type: pCR For: Approval  
 36.717-04-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101544 TP for TR 36.717-04-01: CA\_1-7-8-20-28-32**

*Type: pCR For: Approval  
 36.717-04-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

#### 13.3.1 Rapporteur Input (WID/TR/CR) [LTE\_CA\_R17\_xBDL\_1BUL-Core]

**R4-2100728 Introduction of LTE inter-band Carrier Aggregation for x bands DL (x=4, 5) with 1 band UL to TS36.101**

*Type: CR For: Agreement  
 36.101 v17.0.0 CR-5720 Cat: B (Rel-17)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

This is a big CR for the basket work item on LTE CA 4DL/1UL and 5DL/1UL.

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102438 Revised WID: LTE Advanced inter-band CA Rel-17 for x bands DL (x=4, 5) with 1 band UL**

*Type: WID revised For: Endorsement  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2102439 Updated scope of TR: LTE inter-band CA for 4/5 bands DL with 1 band UL**

*Type: other For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2102440 TR 36.717-04-01 v0.3.0**

*Type: draft TR For: Agreement  
 36.717-04-01 v0.3.0  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 13.3.2 UE RF with 4 LTE bands CA [LTE\_CA\_R17\_xBDL\_1BUL-Core]

**R4-2101406 TP for TR 36.717-04-01: CA\_1A-3A-7C-20A with UL CA\_7C**

*Type: pCR For: Approval  
 36.717-04-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101468 TP for TR 36.717-04-01: CA\_1-3-40-41**

*Type: pCR For: Approval  
 36.717-04-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101469 TP for TR 36.717-04-01: CA\_1-7-8-28**

*Type: pCR For: Approval  
 36.717-04-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101470 TP for TR 36.717-04-01: CA\_1-7-8-32**

*Type: pCR For: Approval  
 36.717-04-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101471 TP for TR 36.717-04-01: CA\_1-7-28-32**

*Type: pCR For: Approval  
 36.717-04-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101472 TP for TR 36.717-04-01: CA\_1-8-20-32**

*Type: pCR For: Approval  
 36.717-04-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101473 TP for TR 36.717-04-01: CA\_1-8-28-32**

*Type: pCR For: Approval  
 36.717-04-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101474 TP for TR 36.717-04-01: CA\_1-20-28-32**

*Type: pCR For: Approval  
 36.717-04-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101475 TP for TR 36.717-04-01: CA\_3-7-8-28**

*Type: pCR For: Approval  
 36.717-04-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101476 TP for TR 36.717-04-01: CA\_3-8-40-41**

*Type: pCR For: Approval  
 36.717-04-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101477 TP for TR 36.717-04-01: CA\_7-8-20-28**

*Type: pCR For: Approval  
 36.717-04-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101478 TP for TR 36.717-04-01: CA\_7-8-20-32**

*Type: pCR For: Approval  
 36.717-04-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101479 TP for TR 36.717-04-01: CA\_7-8-28-32**

*Type: pCR For: Approval  
 36.717-04-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101480 TP for TR 36.717-04-01: CA\_7-20-28-32**

*Type: pCR For: Approval  
 36.717-04-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101481 TP for TR 36.717-04-01: CA\_8-20-28-32**

*Type: pCR For: Approval  
 36.717-04-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101517 DraftCR for 36.101 to add CA\_2A-5A-7A-7A-66A and CA\_2A-7A-7A-13A-66A**

*Type: draftCR For: Endorsement  
 36.101 v17.0.0  
 Source: Huawei, HiSilicon, Bell Mobility, Telus*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101908 draft CR to include 2A-7A-12A-66A-66A, 2A-2A-5A-7A-66A**

*Type: draftCR For: Endorsement  
 36.101 v17.0.0  
 Source: Ericsson, Rogers*

**Abstract:**

draft CR to include 2A-7A-12A-66A-66A, 2A-2A-5A-7A-66A

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2102624 TP to TR 36.717-04-01 Correction of CA\_2-5-7-66-66**

*Type: pCR For: Approval  
 36.717-04-01 v0.2.0  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Approved.**

#### 13.3.3 UE RF with 5 LTE bands CA [LTE\_CA\_R17\_xBDL\_1BUL-Core]

**R4-2101488 TP for TR 36.717-04-01: CA\_1-3-7-8-28**

*Type: pCR For: Approval  
 36.717-04-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101489 TP for TR 36.717-04-01: CA\_1-3-8-20-28**

*Type: pCR For: Approval  
 36.717-04-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101490 TP for TR 36.717-04-01: CA\_1-7-8-20-28**

*Type: pCR For: Approval  
 36.717-04-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101491 TP for TR 36.717-04-01: CA\_1-7-8-20-32**

*Type: pCR For: Approval  
 36.717-04-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101492 TP for TR 36.717-04-01: CA\_1-7-8-28-32**

*Type: pCR For: Approval  
 36.717-04-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101493 TP for TR 36.717-04-01: CA\_1-7-20-28-32**

*Type: pCR For: Approval  
 36.717-04-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101524 TP for TR 36.717-04-01: CA\_7-8-20-28-32**

*Type: pCR For: Approval  
 36.717-04-01 v0.1.0  
 Source: VODAFONE Group Plc*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101582 TP for TR 36.717-04-01: CA\_1A-3A-8A-20A-38A**

*Type: pCR For: Approval  
 36.717-04-01 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101583 TP for TR 36.717-04-01: CA\_1A-3A-7A-8A-38A**

*Type: pCR For: Approval  
 36.717-04-01 v0.2.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Approved.**

### 13.4 LTE inter-band Carrier Aggregation for 2 bands DL with 2 band UL [LTE\_CA\_R17\_2BDL\_2BUL]

#### 13.4.1 Rapporteur Input (WID/TR/CR) [LTE\_CA\_R17\_2BDL\_2BUL-Core]

**R4-2102404 Introduction of completed R17 2DL2UL band combinations to TS 36.101**

*Type: draftCR For: Endorsement  
 36.101 v17.0.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2102405 Revised WID for LTE inter-band CA for 2 bands DL with 2 bands UL**

*Type: WID revised For: Endorsement  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

#### 13.4.2 UE RF with harmonic, close proximity and isolation issues [LTE\_CA\_R17\_2BDL\_2BUL-Core]

#### 13.4.3 UE RF without specific issues [LTE\_CA\_R17\_2BDL\_2BUL-Core]

### 13.5 LTE inter-band Carrier Aggregation for x bands DL (x= 3, 4, 5) with 2 band UL [LTE\_CA\_R17\_xBDL\_2BUL]

#### 13.5.1 Rapporteur Input (WID/TR/CR) [LTE\_CA\_R17\_xBDL\_2BUL-Core]

**R4-2100265 TR 36.717-03-02 v0.2.0 TR Update for LTE-A inter-band CA for x bands (x=3,4,5) DL with 2 bands UL in Rel-17**

*Type: draft TR For: Agreement  
 36.717-03-02 v0.2.0  
 Source: LG Electronics France*

**Abstract:**

Update TR to capture approved TPs in RAN4 #98-e meeting

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100267 Revised WID on LTE-A inter-band CA for x bands (x=3,4,5) DL with 2 bands UL in Rel-17**

*Type: WID revised For: Endorsement  
 Source: LG Electronics France*

**Abstract:**

Revised WID to capture new CA band combos and update status for each CA band

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2100270 Introduction of LTE-A inter-band CA for x bands (x=3,4,5) DL with 2 bands UL to TS36.101**

*Type: CR For: Agreement  
 36.101 v17.0.0 CR-5715 Cat: B (Rel-17)  
  
 Source: LG Electronics France*

**Abstract:**

Big CR tO add new CA band combos for x bands (x=3,4,5) DL with 2 bands UL in Rel-17

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 13.5.2 UE RF with MSD [LTE\_CA\_R17\_xBDL\_2BUL-Core]

**R4-2101576 Draft CR to 36.101 to add UL configuration CA\_3A-8A for CA\_3C-7A-8A**

*Type: draftCR For: Endorsement  
 36.101 v17.0.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

#### 13.5.3 UE RF without MSD [LTE\_CA\_R17\_xBDL\_2BUL-Core]

**R4-2101577 Draft CR to 36.101 to add UL configuration CA\_1A-3A for CA\_1A-3C-38A**

*Type: draftCR For: Endorsement  
 36.101 v17.0.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101578 Draft CR to 36.101 to add UL configuration CA\_3A-8A for CA\_3C-8A-38A**

*Type: draftCR For: Endorsement  
 36.101 v17.0.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101579 TP for TR 36.717-03-02: to add UL configuration CA\_1A-8A for CA\_1A-8A-38A**

*Type: pCR For: Approval  
 36.717-03-02 v0.1.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103098.**

**R4-2103098 TP for TR 36.717-03-02: to add UL configuration CA\_1A-8A for CA\_1A-8A-38A**

*Type: pCR For: Approval  
 36.717-03-02 v0.1.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101580 Draft CR to 36.101 to add UL configuration CA\_1A-3A for CA\_1A-3C-7A-8A**

*Type: draftCR For: Endorsement  
 36.101 v17.0.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

**R4-2101581 Draft CR to 36.101 to add UL configuration CA\_1A-3A for CA\_1A-3C-8A-38A**

*Type: draftCR For: Endorsement  
 36.101 v17.0.0  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Endorsed.**

### 13.6 RRM for LTE CA basket WIs [LTE\_CA\_R17\_xxxx]

#### 13.6.1 RRM Core (36.133) [LTE\_CA\_R17\_xxxx-Core]

#### 13.6.2 RRM Perf (36.133) [LTE\_CA\_R17\_xxxx-Perf]

### 13.7 New WID on Additional LTE bands for UE category M1&M2 and/or NB1&NB2 in Rel-17 [LTE\_bands\_R17\_M1\_M2\_NB1\_NB2]

**R4-2102999 Email discussion summary for [98e][151] LTE\_bands\_R17\_M1\_M2\_NB1\_NB2**

*Type: other For: Information  
 Source: Moderator (Ericsson)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103337.**

**R4-2103337 Email discussion summary for [98e][151] LTE\_bands\_R17\_M1\_M2\_NB1\_NB2**

*Type: other For: Information  
 Source: Moderator (Ericsson)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

#### 13.7.1 Rapporteur Input (WID/TR/CR) [LTE\_bands\_R17\_M1\_M2\_NB1\_NB2-Core]

**R4-2100604 CR of adding LTE B24 for UE category NB1 in R17**

*Type: CR For: Agreement  
 36.307 v13.12.0 CR-4443 Cat: B (Rel-13)  
  
 Source: Ericsson, Ligado Networks*

**Abstract:**

CR of adding LTE B24 for UE category NB1 in R17

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103275.**

**R4-2103275 CR of adding LTE B24 for UE category NB1 in R17**

*Type: CR For: Agreement  
 36.307 v13.12.0 CR-4443 Cat: B (Rel-13)  
  
 Source: Ericsson, Ligado Networks*

**Abstract:**

CR of adding LTE B24 for UE category NB1 in R17

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100605 CR of adding LTE B24 for UE category NB1 in R17**

*Type: CR For: Agreement  
 36.307 v14.9.0 CR-4444 Cat: A (Rel-14)  
  
 Source: Ericsson, Ligado Networks*

**Abstract:**

CR of adding LTE B24 for UE category NB1 in R17

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100606 CR of adding LTE B24 for UE category NB1 in R17**

*Type: CR For: Agreement  
 36.307 v15.6.0 CR-4445 Cat: A (Rel-15)  
  
 Source: Ericsson, Ligado Networks*

**Abstract:**

CR of adding LTE B24 for UE category NB1 in R17

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100607 CR of adding LTE B24 for UE category NB1 in R17**

*Type: CR For: Agreement  
 36.307 v16.2.0 CR-4446 Cat: A (Rel-16)  
  
 Source: Ericsson, Ligado Networks*

**Abstract:**

CR of adding LTE B24 for UE category NB1 in R17

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100608 CR of adding LTE B24 for UE category NB1/NB2 in R17**

*Type: CR For: Agreement  
 36.101 v17.0.0 CR-5716 Cat: B (Rel-17)  
  
 Source: Ericsson, Ligado Networks*

**Abstract:**

CR of adding LTE B24 for UE category NB1/NB2 in R17

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103276.**

**R4-2103276 CR of adding LTE B24 for UE category NB1/NB2 in R17**

*Type: CR For: Agreement  
 36.101 v17.0.0 CR-5716 Cat: B (Rel-17)  
  
 Source: Ericsson, Ligado Networks*

**Abstract:**

CR of adding LTE B24 for UE category NB1/NB2 in R17

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100609 CR of adding LTE B24 for UE category NB1/NB2 in R17**

*Type: CR For: Agreement  
 36.104 v17.0.0 CR-4921 Cat: B (Rel-17)  
  
 Source: Ericsson, Ligado Networks*

**Abstract:**

CR of adding LTE B24 for UE category NB1/NB2 in R17

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103277.**

**R4-2103277 CR of adding LTE B24 for UE category NB1/NB2 in R17**

*Type: CR For: Agreement  
 36.104 v17.0.0 CR-4921 Cat: B (Rel-17)  
  
 Source: Ericsson, Ligado Networks*

**Abstract:**

CR of adding LTE B24 for UE category NB1/NB2 in R17

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100610 CR of adding LTE B24 for UE category NB1/NB2 in R17**

*Type: CR For: Agreement  
 36.133 v17.0.0 CR-7016 Cat: B (Rel-17)  
  
 Source: Ericsson, Ligado Networks*

**Abstract:**

CR of adding LTE B24 for UE category NB1/NB2 in R17

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103278.**

**R4-2103278 CR of adding LTE B24 for UE category NB1/NB2 in R17**

*Type: CR For: Agreement  
 36.133 v17.0.0 CR-7016 Cat: B (Rel-17)  
  
 Source: Ericsson, Ligado Networks*

**Abstract:**

CR of adding LTE B24 for UE category NB1/NB2 in R17

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100612 CR of adding LTE B24 for UE category NB1/NB2 in R17**

*Type: CR For: Agreement  
 37.104 v17.0.0 CR-0921 Cat: B (Rel-17)  
  
 Source: Ericsson, Ligado Networks*

**Abstract:**

CR of adding LTE B24 for UE category NB1/NB2 in R17

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103279.**

**R4-2103279 CR of adding LTE B24 for UE category NB1/NB2 in R17**

*Type: CR For: Agreement  
 37.104 v17.0.0 CR-0921 Cat: B (Rel-17)  
  
 Source: Ericsson, Ligado Networks*

**Abstract:**

CR of adding LTE B24 for UE category NB1/NB2 in R17

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100614 CR of adding LTE B24 for UE category NB1/NB2 in R17**

*Type: CR For: Agreement  
 36.307 v14.9.0 CR-4447 Cat: B (Rel-14)  
  
 Source: Ericsson, Ligado Networks*

**Abstract:**

CR of adding LTE B24 for UE category NB2 in R17

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103280.**

**R4-2103280 CR of adding LTE B24 for UE category NB2 in R17**

*Type: CR For: Agreement  
 36.307 v14.9.0 CR-4447 Cat: B (Rel-14)  
  
 Source: Ericsson, Ligado Networks*

**Abstract:**

CR of adding LTE B24 for UE category NB2 in R17

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100615 CR of adding LTE B24 for UE category NB2 in R17**

*Type: CR For: Agreement  
 36.307 v15.6.0 CR-4448 Cat: A (Rel-15)  
  
 Source: Ericsson, Ligado Networks*

**Abstract:**

CR of adding LTE B24 for UE category NB2 in R17

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100616 CR of adding LTE B24 for UE category NB2 in R17**

*Type: CR For: Agreement  
 36.307 v16.2.0 CR-4449 Cat: A (Rel-16)  
  
 Source: Ericsson, Ligado Networks*

**Abstract:**

CR of adding LTE B24 for UE category NB2 in R17

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 13.7.2 RF [LTE\_bands\_R17\_M1\_M2\_NB1\_NB2-Core]

#### 13.7.3 Others [LTE\_bands\_R17\_M1\_M2\_NB1\_NB2-Perf]

**R4-2100611 CR of adding LTE B24 for UE category NB1/NB2 in R17**

*Type: CR For: Agreement  
 36.141 v17.0.0 CR-1289 Cat: B (Rel-17)  
  
 Source: Ericsson, Ligado Networks*

**Abstract:**

CR of adding LTE B24 for UE category NB1/NB2 in R17

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103281.**

**R4-2103281 CR of adding LTE B24 for UE category NB1/NB2 in R17**

*Type: CR For: Agreement  
 36.141 v17.0.0 CR-1289 Cat: B (Rel-17)  
  
 Source: Ericsson, Ligado Networks*

**Abstract:**

CR of adding LTE B24 for UE category NB1/NB2 in R17

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100613 CR of adding LTE B24 for UE category NB1/NB2 in R17**

*Type: CR For: Agreement  
 37.141 v17.0.0 CR-0960 Cat: B (Rel-17)  
  
 Source: Ericsson, Ligado Networks*

**Abstract:**

CR of adding LTE B24 for UE category NB1/NB2 in R17

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103282.**

**R4-2103282 CR of adding LTE B24 for UE category NB1/NB2 in R17**

*Type: CR For: Agreement  
 37.141 v17.0.0 CR-0960 Cat: B (Rel-17)  
  
 Source: Ericsson, Ligado Networks*

**Abstract:**

CR of adding LTE B24 for UE category NB1/NB2 in R17

**Discussion:**

[report of discussion]

**Decision: Agreed.**

### 13.8 Modification of LTE Band 24 specifications to comply with updated regulatory emission limits [LTE\_B24\_mod]

#### 13.8.1 General and rapporteur input [LTE\_B24\_mod-Core]

#### 13.8.2 UE RF [LTE\_B24\_mod-Core]

**R4-2100254 CR for 36.101: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 36.101 v10.28.0 CR-5714 Cat: F (Rel-10)  
  
 Source: Ligado Networks, Nokia, Skyworks Solutions Inc.*

**Abstract:**

Changes to TS 36.101 related to recent Band 24 regulatory updates

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103379.**

**R4-2103379 CR for 36.101: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 36.101 v10.28.0 CR-5714 Cat: F (Rel-10)  
  
 Source: Ligado Networks, Nokia, Skyworks Solutions Inc.*

**Abstract:**

Changes to TS 36.101 related to recent Band 24 regulatory updates

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102909 CR for 36.101: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 36.101 v11.25.0 CR-5728 Cat: A (Rel-11)  
  
 Source: Ligado Networks*

**Abstract:**

Changes to 36.101 related to Band 24 regulatory updates

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103380.**

**R4-2103380 CR for 36.101: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 36.101 v11.25.0 CR-5728 Cat: A (Rel-11)  
  
 Source: Ligado Networks*

**Abstract:**

Changes to 36.101 related to Band 24 regulatory updates

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102910 CR for 36.101: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 36.101 v12.25.0 CR-5729 Cat: A (Rel-12)  
  
 Source: Ligado Networks*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103381.**

**R4-2103381 CR for 36.101: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 36.101 v12.25.0 CR-5729 Cat: A (Rel-12)  
  
 Source: Ligado Networks*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102911 CR for 36.101: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 36.101 v17.0.0 CR-5730 Cat: A (Rel-17)  
  
 Source: Ligado Networks*

**Discussion:**

[report of discussion]

**Decision:** The document was **withdrawn**.

**R4-2102913 CR for 36.101: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 36.101 v14.17.0 CR-5731 Cat: A (Rel-14)  
  
 Source: Ligado Networks*

**Abstract:**

Changes to 36.101 related to Band 24 regulatory updates

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103382.**

**R4-2103382 CR for 36.101: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 36.101 v14.17.0 CR-5731 Cat: A (Rel-14)  
  
 Source: Ligado Networks*

**Abstract:**

Changes to 36.101 related to Band 24 regulatory updates

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102914 CR for 36.101: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 36.101 v15.13.0 CR-5732 Cat: A (Rel-15)  
  
 Source: Ligado Networks*

**Abstract:**

Changes to 31.101 related to Band 24 regulatory updates

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103383.**

**R4-2103383 CR for 36.101: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 36.101 v15.13.0 CR-5732 Cat: A (Rel-15)  
  
 Source: Ligado Networks*

**Abstract:**

Changes to 31.101 related to Band 24 regulatory updates

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102915 CR for 36.101: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 36.101 v16.8.0 CR-5733 Cat: A (Rel-16)  
  
 Source: Ligado Networks*

**Abstract:**

Changes to 31.101 related to Band 24 regulatory updates

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103384.**

**R4-2103384 CR for 36.101: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 36.101 v16.8.0 CR-5733 Cat: A (Rel-16)  
  
 Source: Ligado Networks*

**Abstract:**

Changes to 31.101 related to Band 24 regulatory updates

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102916 CR for 36.101: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 36.101 v17.0.0 CR-5734 Cat: A (Rel-17)  
  
 Source: Ligado Networks*

**Abstract:**

Changes to 31.101 related to Band 24 regulatory updates

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103385.**

**R4-2103385 CR for 36.101: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 36.101 v17.0.0 CR-5734 Cat: A (Rel-17)  
  
 Source: Ligado Networks*

**Abstract:**

Changes to 31.101 related to Band 24 regulatory updates

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102918 CR for 36.101: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 36.101 v13.19.1 CR-5735 Cat: A (Rel-13)  
  
 Source: Ligado Networks*

**Abstract:**

Changes to 31.101 related to Band 24 regulatory updates

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103386.**

**R4-2103386 CR for 36.101: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 36.101 v13.19.1 CR-5735 Cat: A (Rel-13)  
  
 Source: Ligado Networks*

**Abstract:**

Changes to 31.101 related to Band 24 regulatory updates

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 13.8.3 BS RF [LTE\_B24\_mod-Core]

**R4-2100255 CR for 37.105: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 37.105 v15.11.0 CR-0215 Cat: F (Rel-15)  
  
 Source: Ligado Networks*

**Abstract:**

Changes to TS 37.105 related to Band 24 regulatory updates

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100532 CR for 37.105: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 37.105 v16.6.0 CR-0217 Cat: A (Rel-16)  
  
 Source: Ligado Networks*

**Abstract:**

Corrections to TS 37.105 related to Band 24 regulatory updates

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100533 CR for 37.105: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 37.105 v17.0.0 CR-0218 Cat: A (Rel-17)  
  
 Source: Ligado Networks*

**Abstract:**

Changes to TS 37.105 related to Band 24 regulatory updates

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102452 CR to 36.104: Correction to Band 24 requirements (Rel-10)**

*Type: CR For: Agreement  
 36.104 v10.13.0 CR-4928 Cat: F (Rel-10)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103207.**

**R4-2103207 CR to 36.104: Correction to Band 24 requirements (Rel-10)**

*Type: CR For: Agreement  
 36.104 v10.13.0 CR-4928 Cat: F (Rel-10)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102453 CR to 36.104: Correction to Band 24 requirements (Rel-11)**

*Type: CR For: Agreement  
 36.104 v11.17.0 CR-4929 Cat: A (Rel-11)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102454 CR to 36.104: Correction to Band 24 requirements (Rel-12)**

*Type: CR For: Agreement  
 36.104 v12.13.0 CR-4930 Cat: A (Rel-12)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102455 CR to 36.104: Correction to Band 24 requirements (Rel-13)**

*Type: CR For: Agreement  
 36.104 v13.13.0 CR-4931 Cat: A (Rel-13)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102456 CR to 36.104: Correction to Band 24 requirements (Rel-14)**

*Type: CR For: Agreement  
 36.104 v14.9.0 CR-4932 Cat: A (Rel-14)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102457 CR to 36.104: Correction to Band 24 requirements (Rel-15)**

*Type: CR For: Agreement  
 36.104 v15.10.0 CR-4933 Cat: A (Rel-15)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102458 CR to 36.104: Correction to Band 24 requirements (Rel-16)**

*Type: CR For: Agreement  
 36.104 v16.8.0 CR-4934 Cat: A (Rel-16)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102459 CR to 36.104: Correction to Band 24 requirements (Rel-17)**

*Type: CR For: Agreement  
 36.104 v17.0.0 CR-4935 Cat: A (Rel-17)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102468 CR to 37.104: Correction to Band 24 requirements (Rel-10)**

*Type: CR For: Agreement  
 37.104 v10.14.0 CR-0925 Cat: F (Rel-10)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103208.**

**R4-2103208 CR to 37.104: Correction to Band 24 requirements (Rel-10)**

*Type: CR For: Agreement  
 37.104 v10.14.0 CR-0925 Cat: F (Rel-10)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102469 CR to 37.104: Correction to Band 24 requirements (Rel-11)**

*Type: CR For: Agreement  
 37.104 v11.14.0 CR-0926 Cat: A (Rel-11)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102470 CR to 37.104: Correction to Band 24 requirements (Rel-12)**

*Type: CR For: Agreement  
 37.104 v12.13.0 CR-0927 Cat: A (Rel-12)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102471 CR to 37.104: Correction to Band 24 requirements (Rel-13)**

*Type: CR For: Agreement  
 37.104 v13.8.0 CR-0928 Cat: A (Rel-13)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102472 CR to 37.104: Correction to Band 24 requirements (Rel-14)**

*Type: CR For: Agreement  
 37.104 v14.6.0 CR-0929 Cat: A (Rel-14)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102473 CR to 37.104: Correction to Band 24 requirements (Rel-15)**

*Type: CR For: Agreement  
 37.104 v15.12.0 CR-0930 Cat: A (Rel-15)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102474 CR to 37.104: Correction to Band 24 requirements (Rel-16)**

*Type: CR For: Agreement  
 37.104 v16.8.0 CR-0931 Cat: A (Rel-16)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102475 CR to 37.104: Correction to Band 24 requirements (Rel-17)**

*Type: CR For: Agreement  
 37.104 v17.0.0 CR-0932 Cat: A (Rel-17)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 13.8.4 RRM and others [LTE\_B24\_mod-Core/Perf]

**R4-2100256 CR for 37.145-1: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 37.145-1 v13.11.0 CR-0235 Cat: F (Rel-13)  
  
 Source: Ligado Networks*

**Abstract:**

Changes to TS 37.145-1 related to Band 24 regulatory updates

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100535 CR for 37.145-1: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 37.145-1 v14.9.0 CR-0238 Cat: A (Rel-14)  
  
 Source: Ligado Networks*

**Abstract:**

Changes to 37.145-1 related to Band 24 regulatory updates

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100536 CR for 37.145-1: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 37.145-1 v15.8.0 CR-0239 Cat: A (Rel-15)  
  
 Source: Ligado Networks*

**Abstract:**

Changes to 37.145-1 related to Band 24 regulatory updates

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100537 CR for 37.145-1: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 37.145-1 v16.5.0 CR-0240 Cat: A (Rel-16)  
  
 Source: Ligado Networks*

**Abstract:**

Changes to 37.145-1 related to Band 24 regulatory updates

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100538 CR for 37.145-1: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 37.145-1 v17.0.0 CR-0241 Cat: A (Rel-17)  
  
 Source: Ligado Networks*

**Abstract:**

Changes to 37.145-1 related to Band 24 regulatory updates

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100257 CR for 37.145-2: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 37.145-2 v15.9.0 CR-0269 Cat: F (Rel-15)  
  
 Source: Ligado Networks*

**Abstract:**

Changes to 37.145-2 related to Band 24 regulatory updates

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103215.**

**R4-2103215 CR for 37.145-2: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 37.145-2 v15.9.0 CR-0269 Cat: F (Rel-15)  
  
 Source: Ligado Networks*

**Abstract:**

Changes to 37.145-2 related to Band 24 regulatory updates

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100539 CR for 37.145-2: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 37.145-2 v16.6.0 CR-0274 Cat: A (Rel-16)  
  
 Source: Ligado Networks*

**Abstract:**

Changes to 37.145-2 related to Band 24 regulatory updates

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100540 CR for 37.145-2: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 37.145-2 v17.0.0 CR-0275 Cat: A (Rel-17)  
  
 Source: Ligado Networks*

**Abstract:**

Changes to 37.145-2 related to band 24 regulatory updates

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2100534 CR for 37.145-1: Corrections related to Band 24 regulatory updates**

*Type: CR For: Agreement  
 37.145-1 v13.11.0 CR-0237 Cat: A (Rel-13)  
  
 Source: Ligado Networks*

**Abstract:**

Changes to 37.145-1 related to regulatory updates

**Discussion:**

[report of discussion]

**Decision:** The document was **withdrawn**.

**R4-2102460 CR to 36.141: Correction to Band 24 requirements (Rel-10)**

*Type: CR For: Agreement  
 36.141 v10.14.0 CR-1296 Cat: F (Rel-10)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103217.**

**R4-2103217 CR to 36.141: Correction to Band 24 requirements (Rel-10)**

*Type: CR For: Agreement  
 36.141 v10.14.0 CR-1296 Cat: F (Rel-10)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102461 CR to 36.141: Correction to Band 24 requirements (Rel-11)**

*Type: CR For: Agreement  
 36.141 v11.17.0 CR-1297 Cat: A (Rel-11)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102462 CR to 36.141: Correction to Band 24 requirements (Rel-12)**

*Type: CR For: Agreement  
 36.141 v12.14.0 CR-1298 Cat: A (Rel-12)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102463 CR to 36.141: Correction to Band 24 requirements (Rel-13)**

*Type: CR For: Agreement  
 36.141 v13.15.0 CR-1299 Cat: A (Rel-13)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102464 CR to 36.141: Correction to Band 24 requirements (Rel-14)**

*Type: CR For: Agreement  
 36.141 v14.12.0 CR-1300 Cat: A (Rel-14)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102465 CR to 36.141: Correction to Band 24 requirements (Rel-15)**

*Type: CR For: Agreement  
 36.141 v15.11.0 CR-1301 Cat: A (Rel-15)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102466 CR to 36.141: Correction to Band 24 requirements (Rel-16)**

*Type: CR For: Agreement  
 36.141 v16.8.0 CR-1302 Cat: A (Rel-16)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102467 CR to 36.141: Correction to Band 24 requirements (Rel-17)**

*Type: CR For: Agreement  
 36.141 v17.0.0 CR-1303 Cat: A (Rel-17)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102476 CR to 37.141: Correction to Band 24 requirements (Rel-10)**

*Type: CR For: Agreement  
 37.141 v10.14.0 CR-0965 Cat: F (Rel-10)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103216.**

**R4-2103216 CR to 37.141: Correction to Band 24 requirements (Rel-10)**

*Type: CR For: Agreement  
 37.141 v10.14.0 CR-0965 Cat: F (Rel-10)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102477 CR to 37.141: Correction to Band 24 requirements (Rel-11)**

*Type: CR For: Agreement  
 37.141 v11.15.0 CR-0966 Cat: A (Rel-11)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102478 CR to 37.141: Correction to Band 24 requirements (Rel-12)**

*Type: CR For: Agreement  
 37.141 v12.13.0 CR-0967 Cat: A (Rel-12)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102479 CR to 37.141: Correction to Band 24 requirements (Rel-13)**

*Type: CR For: Agreement  
 37.141 v13.14.0 CR-0968 Cat: A (Rel-13)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102480 CR to 37.141: Correction to Band 24 requirements (Rel-14)**

*Type: CR For: Agreement  
 37.141 v14.12.0 CR-0969 Cat: A (Rel-14)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102481 CR to 37.141: Correction to Band 24 requirements (Rel-15)**

*Type: CR For: Agreement  
 37.141 v15.13.0 CR-0970 Cat: A (Rel-15)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102482 CR to 37.141: Correction to Band 24 requirements (Rel-16)**

*Type: CR For: Agreement  
 37.141 v16.8.0 CR-0971 Cat: A (Rel-16)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

**R4-2102483 CR to 37.141: Correction to Band 24 requirements (Rel-17)**

*Type: CR For: Agreement  
 37.141 v17.0.0 CR-0972 Cat: A (Rel-17)  
  
 Source: Nokia, Nokia Shanghai Bell*

**Discussion:**

[report of discussion]

**Decision: Agreed.**

## 14 Rel-17 Study Items for LTE

### 14.1 High-power UE operation for fixed-wireless/vehicle-mounted use cases in LTE bands 5 and 12 and NR band n71 [FS\_LTE\_NR\_HPUE\_FWVM]

**R4-2103000 Email discussion summary for [98e][152] FS\_LTE\_NR\_HPUE\_FWVM**

*Type: other For: Information  
 Source: Moderator (Nokia)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103338.**

**R4-2103338 Email discussion summary for [98e][152] FS\_LTE\_NR\_HPUE\_FWVM**

*Type: other For: Information  
 Source: Moderator (Nokia)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103283 TR 37.880 V0.3.0: High-power UE operation for fixed-wireless/vehicle-mounted use cases in Band 12, Band 5, and Band n71**

*Type: draft TR For: Agreement  
 37.880 v0.3.0  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

**Discussion:**

**Decision: Agreed.**

#### 14.1.1 General

**R4-2101798 Revised Work Plan for Study on High-power UE operation for fixed-wireless/vehicle-mounted use cases in Band 12, Band 5, and Band n71**

*Type: other For: Approval  
 Source: Nokia, Nokia Shanghai Bell, T-Mobile USA, U.S. Cellular*

**Abstract:**

This contribution provides a revised work plan according to the current progress. In view of the cancelled physical meetings and the current progress of this study item, it is proposed to request at RAN#91 to extend the study item for one quarter to compl

**Discussion:**

[report of discussion]

**Decision: Approved.**

**R4-2101799 TR 37.880 V0.2.0: High-power UE operation for fixed-wireless/vehicle-mounted use cases in Band 12, Band 5, and Band n71**

*Type: draft TR For: Agreement  
 37.880 v0.2.0  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

Updated TR for Study on High-power UE operation for fixed-wireless/vehicle-mounted use cases in Band 12, Band 5, and Band n71.

**Discussion:**

[report of discussion]

**Decision: Agreed.**

#### 14.1.2 Coexistence study

**R4-2101800 TP to TR 37.880: Coexistence Simulation Results for High-power UE Vs NB-IoT guard band operation for fixed-wireless/vehicle-mounted use cases in Band 12, Band 5, and Band n71**

*Type: pCR For: Approval  
 37.880 v0.1.0  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

This contribution provides the coexistence simulation results for this scenario according to the agreed assumptions and a text proposal for approval to record the simulation results and observations into TR 37.880.

**Discussion:**

[report of discussion]

**Decision: Revised to R4-2103284.**

**R4-2103284 TP to TR 37.880: Coexistence Simulation Results for High-power UE Vs NB-IoT guard band operation for fixed-wireless/vehicle-mounted use cases in Band 12, Band 5, and Band n71**

*Type: pCR For: Approval  
 37.880 v0.1.0  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

This contribution provides the coexistence simulation results for this scenario according to the agreed assumptions and a text proposal for approval to record the simulation results and observations into TR 37.880.

**Discussion:**

[report of discussion]

**Decision: Approved.**

#### 14.1.3 UE RF

**R4-2100131 HPUE for bands 5, 12 and n71 UE RF aspects.**

*Type: pCR For: Approval  
 37.880 v0.0.1  
 Source: Nokia*

**Discussion:**

[report of discussion]

**Decision: Approved.**

## 15 Liaison and output to other groups

### 15.1 R17 related

**R4-2103003 Email discussion summary for [98e][155] NR\_reply\_LS\_Part\_2**

*Type: other For: Information  
 Source: Moderator (China Telecom)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103341.**

**R4-2103341 Email discussion summary for [98e][155] NR\_reply\_LS\_Part\_2**

*Type: other For: Information  
 Source: Moderator (China Telecom)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103288 Reply LS on PUCCH and PUSCH repetition**

*Type: LS out For: Approval  
 Source: Qualcomm*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103393.**

**R4-2103393 Reply LS on PUCCH and PUSCH repetition**

*Type: LS out For: Approval  
 Source: Qualcomm*

**Abstract:**

**Discussion:**

Chair: RAN4 can further study if phase continuity can be met for the scenario of other physical signals/channels in-between PUCCH or PUSCH repetitions from the UE perspective, e.g., SRS or PUCCH transmission in-between the PUSCH repetition for the UE.

**Decision: Approved.**

**R4-2103289 Way forward on phase continuity and power consistency for PUCCH and PUSCH repetition**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103363.**

**R4-2103363 Way forward on phase continuity and power consistency for PUCCH and PUSCH repetition**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2100159 Discussion on phase continuity for PUSCH and PUCCH repetitions for LS reply**

*Type: other For: Approval  
 Source: InterDigital Communications*

**Abstract:**

Discussion on phase continuity for PUSCH and PUCCH repetitions for LS reply. We propose answers for each question of the LS received from RAN1.

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100889 Discussion on LS on PUCCH and PUSCH repetition**

*Type: other For: Approval  
 Source: Qualcomm Incorporated*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102347 Reply LS on PUCCH and PUSCH repetition**

*Type: other For: Approval  
 Source: Ericsson*

**Abstract:**

RAN1 LS (R1-2009784) is discussed and LS reply is proposed

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102630 on phase continuity for PUCCH and PUSCH repetition and reply LS**

*Type: other For: Approval  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100547 Discussion on LS on questions to RAN WGs on dual Radio UE (2Rx/2Tx or 2Rx/1Tx) support for simultaneous communication with both SNPN and PLMN**

*Type: other For: Approval  
 Source: Sony*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2103004 Email discussion summary for [98e][156] NR\_reply\_LS\_Part\_3**

*Type: other For: Information  
 Source: Moderator (Samsung)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103342.**

**R4-2103342 Email discussion summary for [98e][156] NR\_reply\_LS\_Part\_3**

*Type: other For: Information  
 Source: Moderator (Samsung)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103290 Reply LS on Beam switching gaps for Multi-TRP UL transmission**

*Type: LS out For: Approval  
 Source: Samsung*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2101017 Discussion and Draft Reply LS to RAN1 on beam switching gap**

*Type: discussion For: Discussion  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2101157 Discussion reply LS on Beam switching gaps for Multi-TRP UL transmission**

*Type: discussion For: Discussion  
 Source: MediaTek inc.*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102389 Discussion on reply LS on Beam switching gaps for Multi-TRP UL transmission**

*Type: discussion For: Discussion  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102390 draft reply LS on Beam switching gaps for Multi-TRP UL transmission**

*Type: LS out For: Approval  
 to RAN1  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2102710 Discussion and Reply LS on Beam switching gaps for Multi-TRP UL transmission**

*Type: discussion For: Discussion  
 Source: vivo*

**Discussion:**

[report of discussion]

**Decision: Noted.**

### 15.2 Others

## 16 Revision of the Work Plan

### 16.1 Simplification of band combinations in RAN4 specifications

**R4-2103001 Email discussion summary for [98e][153] BC\_simplification**

*Type: other For: Information  
 Source: Moderator (NTT DOCOMO)*

**Abstract:**

**Discussion:**

**Decision: Revised to R4-2103339.**

**R4-2103339 Email discussion summary for [98e][153] BC\_simplification**

*Type: other For: Information  
 Source: Moderator (NTT DOCOMO)*

**Abstract:**

**Discussion:**

**Decision: Noted.**

**R4-2103285 Way forward on Handling of agreements about band combinations**

*Type: other For: Approval  
 Source: ZTE*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2103286 Way forward on Simplification on ΔTIB,c and ΔRIB,c tables for band combinations**

*Type: other For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

**Discussion:**

**Decision: Approved.**

**R4-2100089 Handling of agreements about band combinations**

*Type: other For: Approval  
 Source: Nokia, Nokia Shanghai Bell*

**Abstract:**

Continuation of discussion on RP-202863

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100120 On optimization for band combination in RAN4 specifications**

*Type: discussion For: Approval  
 Source: ZTE Corporation*

**Abstract:**

This paper if for further discussion on optimization for band combination in RAN4 specifications

**Discussion:**

[report of discussion]

**Decision: Noted.**

**R4-2100121 CR to TS 38.101-1 on optimization on delta TIB and RIB for band combinations (Rel-16)**

*Type: CR For: Agreement  
 38.101-1 v16.6.0 CR-0590 Cat: F (Rel-16)  
  
 Source: ZTE Corporation*

**Abstract:**

This CR is for optimization on delta TIB and RIB for band combinations in 38.101-1

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2100122 CR to TS 38.101-1 on optimization on delta TIB and RIB for band combinations (Rel-17)**

*Type: CR For: Agreement  
 38.101-1 v17.0.0 CR-0591 Cat: A (Rel-17)  
  
 Source: ZTE Corporation*

**Abstract:**

This CR is for optimization on delta TIB and RIB for band combinations in 38.101-1

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100123 CR to TS 38.101-2 on optimization on delta RIB for inter-band CA (Rel-16)**

*Type: CR For: Agreement  
 38.101-2 v16.6.0 CR-0316 Cat: F (Rel-16)  
  
 Source: ZTE Corporation*

**Abstract:**

This CR is for optimization on delta RIB for inter-band CA in 38.101-2

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2100124 CR to TS 38.101-2 on optimization on delta RIB for inter-band CA (Rel-17)**

*Type: CR For: Agreement  
 38.101-2 v17.0.0 CR-0317 Cat: A (Rel-17)  
  
 Source: ZTE Corporation*

**Abstract:**

This CR is for optimization on delta RIB for inter-band CA in 38.101-2

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2100125 CR to TS 38.101-3 on optimization on delta TIB and RIB for inter-band EN-DC (Rel-16)**

*Type: CR For: Agreement  
 38.101-3 v16.6.0 CR-0433 Cat: F (Rel-16)  
  
 Source: ZTE Corporation*

**Abstract:**

This CR is for optimization on delta TIB and RIB for inter-band EN-DC in 38.101-3

**Discussion:**

[report of discussion]

**Decision: Not pursued.**

**R4-2100126 CR to TS 38.101-3 on optimization on delta TIB and RIB for inter-band EN-DC (Rel-17)**

*Type: CR For: Agreement  
 38.101-3 v17.0.0 CR-0434 Cat: A (Rel-17)  
  
 Source: ZTE Corporation*

**Abstract:**

This CR is for optimization on delta TIB and RIB for inter-band EN-DC in 38.101-3

**Discussion:**

[report of discussion]

**Decision: Withdrawn.**

**R4-2101818 Draft LS on change of methodology for new LTE-CA REL-17 combinations**

*Type: LS out For: Approval  
 to RAN5  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision: Approved.**

### 16.2 R17 new proposals

#### 16.2.1 Spectrum related

**R4-2100101 Motivation for new WI on air-to-ground network for NR**

*Type: WID new For: Information  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2100102 New WID on air-to-ground network for NR**

*Type: WID new For: Information  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2100887 New WID on Introduction of FR2 FWA UE with maximum TRP of 23dBm for band n259**

*Type: discussion For: Information  
 Source: SoftBank Corp., Rakuten Mobile*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2100888 Motivation on new WID on Introduction of FR2 FWA UE with maximum TRP of 23dBm for band n259**

*Type: discussion For: Information  
 Source: SoftBank Corp., Rakuten Mobile*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2100940 Motivation on new WI of intra-band non-contiguous NR-DC using band n77**

*Type: discussion For: Information  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2101819 New WID on Support of full bandwidth combinations for inter-band EN-DC combinations**

*Type: WID new For: Information  
 Source: Huawei, HiSilicon*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2102940 Motivation paper for Rail Mobile Radio (RMR)**

*Type: discussion For: Information  
 Source: UIC*

**Abstract:**

**Discussion:**

**Decision:** The document was **not treated**.

**R4-2102941 WID for 900MHz spectrum block**

*Type: WID new For: Information  
 Source: UIC*

**Abstract:**

**Discussion:**

**Decision:** The document was **not treated**.

**R4-2102942 WID for 1900MHz spectrum block**

*Type: WID new For: Information  
 Source: UIC*

**Abstract:**

**Discussion:**

**Decision:** The document was **not treated**.

#### 16.2.2 Non-spectrum related

**R4-2100103 Motivation for new WI on PC1.5 for NR band n79**

*Type: WID new For: Information  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2100104 WID on High power UE (power class 1.5) for NR band n79**

*Type: WID new For: Information  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2100105 Motivation for new WI on PC2 for NR band n34**

*Type: WID new For: Information  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2100106 WID on High power UE (power class 2) for NR band n34**

*Type: WID new For: Information  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2100107 Motivation for new WI on PC2 for NR band n39**

*Type: WID new For: Information  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2100108 WID on High power UE (power class 2) for NR band n39**

*Type: WID new For: Information  
 Source: CMCC*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2100195 Proposal to extend R17 FeRRM WI scope**

*Type: discussion For: Information  
 38.133 v..  
 Source: Apple*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2100362 Discussion on EMC Test Simplification for Rel-17 EMC enhancement**

*Type: discussion For: Discussion  
 Source: Ericsson*

**Abstract:**

Discussion paper on EMC test simplification for Rel 17 EMC enhancement

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2100363 New WID proposal on RAN4 Rel-17 EMC enhancement**

*Type: WID new For: Information  
 Source: Ericsson, Xiaomi*

**Abstract:**

Proposal on a WID for Rel-17 EMC enhancement

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2100941 Motivation for supporting non-colocated scenarios for band 42 and n77/n78**

*Type: discussion For: Information  
 Source: SoftBank Corp.*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2101115 Discussion on NR demodulation performance in the scenario of LTE-NR coexist**

*Type: discussion For: Discussion  
 Source: ZTE Corporation*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2101728 Revised WID for NR RF Enhancement for FR2**

*Type: WID revised For: Information  
 Source: Ericsson, Sony*

**Abstract:**

Revised WID to include further work on beam correspondence

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2102583 Motivation for WI: Introduction of UE TRP (Total Radiated Power) and TRS (Total Radiated Sensitivity) requirements and test methodologies for FR1 (NR SA and EN-DC)**

*Type: discussion For: Information  
 Source: vivo*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2102584 New WID: Introduction of UE TRP (Total Radiated Power) and TRS (Total Radiated Sensitivity) requirements and test methodologies for FR1 (NR SA and EN-DC)**

*Type: WID new For: Information  
 Source: vivo, OPPO, CMCC, CAICT, Rohde&Schwarz*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

### 16.3 Others

## 17 Any other business

**R4-2102236 Inclusive language review in TS 36.133**

*Type: CR For: Agreement  
 36.133 v17.0.0 CR-7035 Cat: F (Rel-17)  
  
 Source: Ericsson*

**Abstract:**

Inclusive language review of TS 36.133 according to decision in RP-202179.

**Discussion:**

[report of discussion]

**Decision:** To be email approved.

## 18 Close of the E-meeting

**R4-2100029 Incoming LSs**

*Type: other For: Information  
 Source: ETSI MCC*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2100030 Incoming LSs**

*Type: other For: Information  
 Source: ETSI MCC*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2100031 Incoming LSs**

*Type: other For: Information  
 Source: ETSI MCC*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2100032 Incoming LSs**

*Type: other For: Information  
 Source: ETSI MCC*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2100033 Incoming LSs**

*Type: other For: Information  
 Source: ETSI MCC*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2100034 Incoming LSs**

*Type: other For: Information  
 Source: ETSI MCC*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2100035 Incoming LSs**

*Type: other For: Information  
 Source: ETSI MCC*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2100036 Incoming LSs**

*Type: other For: Information  
 Source: ETSI MCC*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2100037 Incoming LSs**

*Type: other For: Information  
 Source: ETSI MCC*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2100038 Incoming LSs**

*Type: other For: Information  
 Source: ETSI MCC*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2100039 Incoming LSs**

*Type: other For: Information  
 Source: ETSI MCC*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

**R4-2100040 Incoming LSs**

*Type: other For: Information  
 Source: ETSI MCC*

**Discussion:**

[report of discussion]

**Decision:** The document was **not treated**.

Report prepared by: Kai-Erik Sunell

## BACKUP

**R4-21AAAAA Way forward on XXXX**

*Type: other For: Approval  
 Source:*

**Abstract:**

**Discussion:**

**Decision: Return to.**