Agenda item

Title: Final Report of 3GPP TSG RAN WG1 #55bis v3.0.0

(Ljubljana, Slovenia, 12 – 16 January, 2009)

Document for: Approval

Source: MCC Support



### **Fact Summary**

Meeting: 3GPP TSG RAN WG1 #55bis

Dates: 12<sup>th</sup> through 16<sup>th</sup> January, 2009

Venue: Grand Hotel Union in Ljubljana, SLOVENIA

Host: European Friends of 3GPP

Attendees: 159 delegates

Documents: 543 (including some withdrawn and post-meeting artefacts)

Patrick Mérias ETSI Mobile Competence Center F-06921 Sophia Antipolis Cedex Tel: +33 4 92 94 42 06

Patrick.merias@etsi.org



## **Table of contents**

Exec	cutive summary	3
1. 1.1	Opening of the meeting	5 5
2.	Approval of the agenda	5
3.	Approval of the minutes from previous meeting	5
4.	Liaison statement handling	6
5.	Maintenance of UTRA Release 99 – Release 8	10
6. 6.1 6.2 6.3 6.4	Maintenance of Evolved UTRA Release 8  Corrections for TS 36.211  Corrections for TS 36.212  Corrections for TS 36.213  Corrections for TS 36.214	
7.	Continuous Connectivity for packet data users for 1.28Mcps TDD	33
8.	MIMO for 1.28Mcps TDD	34
9.	Discussion on UTRA Multi-Carrier Evolution	35
10.	Positioning Support for LTE	37
11.	Study Item on E-UTRAN Mobility Evaluation & Enhancement	38
12. 12.1 12.2 12.3 12.4 12.5 12.5.	Study Item on LTE-Advanced  UL transmission scheme  Bandwidth extension  Coordinated Multipoint Transmission/Reception (COMP)  UL MIMO extension up to 4x4  DL MIMO extension up to 4x4  1 DL MIMO extension up to 4x4 (ad-hoc)  Relaying	
13.	Closing of the meeting	60
Anne	ex A: List of participants at RAN1 #55bis	61
Anne	ex B: TSG RAN WG1 meetings in 2009	62
Anne	ex C: List of CRs agreed at RAN1#55bis	63
Anne	ex D: List of Outgoing LSs from RAN1#55bis	67
Anne	ex E: List of Tdocs at RAN1 #55bis	68
Anne	ex F: List of actions	60

## **Executive summary**

3GPP TSG WG RAN1 #55bis meeting took place in Grand Hotel Union, Ljubljana, SLOVENIA.

The meeting started at 9:20 on Monday 12th January and finished at 17:00 on Friday 16th January 2009.

The week was scheduled as follows:

- Monday: Common session on Agenda items 1, 2, 3, 4, 6, 6.1 and 6.2.
- Tuesday: Parallel sessions. On one hand, session dedicated to corrections to TS36.213 (AI 6.3) chaired by Sadayuki Abeta and on the other hand, session on Agenda items 5,7,8 and 9 chaired by Dirk Gerstenberger.
- Wednesday morning: Parallel sessions on Agenda items 12 and 12.2 chaired by Dirk Gerstenberger and Agenda item 12.5 (DL MIMO in LTE-A) chaired by Juho Lee
- Wednesday afternoon: Common session on Agenda item 12.1 chaired by Dirk Gerstenberger.
- Thursday morning: Parallel sessions on Agenda items 12.3 and 12.6 chaired by Dirk Gerstenberger and Agenda items 12.4 and 12.5 chaired by Juho Lee
- Friday morning: Common session on Agenda items 10 and 11.
- Friday afternoon: Revisions

The list of action points that required RAN1 close follow-up is listed in Annex F (end of document).

The number of contribution documents for this meeting was 529, and those documents were categorized as followed.

Agenda Item	Input Document	Discussed Document
Liaison statement handling	28	25
Maintenance of UTRA R99 – Rel-8	33	30
Maintenance of Evolved UTRA Rel-8	148	
Continuous Connectivity for Packet Data users for 1.28Mcps TDD	7	7
MIMO for 1.28Mcps TDD	7	7
UTRA Multi-Carrier Evolution	22	21
Positioning support for LTE	4	4
Study Item on E-UTRAN Mobility Evaluation & Enhancement	5	3
Study Item on LTE-A	20	10
Study Item on LTE-A: UL transmission scheme	35	19
Study Item on LTE-A: Bandwidth extension	57	5
Study Item on LTE-A: COMP	44	5
Study Item on LTE-A: UL MIMO extension up to 4x4	28	1
Study Item on LTE-A: DL MIMO extension up to 8x8	46	20
Study Item on LTE-A: Relaying	45	3

Note: The amount of documents includes those discussed during the email discussion session post meeting.



-----, ----, -- ----, **-**-----

The following document are missing. The corresponding contributions have not been handed over by companies.

R1-090097	UL A/N Multiplexing for Carrier aggregation	Samsung	
R1-090212	Codebook-based PMI Restriction for LTE-advanced system	LG Electronics	
R1-090324	Supporting Asymmetric Carrier Aggregation and Non Rel-8 Carriers in LTE-A (TBD)	Motorola	
R1-090376	Evaluation of UE specific RS for COMP schemes	Ericsson	
R1-090378	Downlink SU-MIMO in LTE-A	Ericsson	

------, ----, --- ----, **,**, ----

## Opening of the meeting

Mr. Dirk Gerstenberger (RAN1 Chairman) welcomed the participants to the 55<sup>th</sup> RAN WG1 bis meeting and opened the meeting at 09:20. Highlight was put on the 10<sup>th</sup> year of existence of 3GPP starting with first meeting in Espoo, Finland in January 1999.

Eric Hardouin from Orange welcomed the delegates on behalf of European Friends of 3GPP and informed them about logistic issues during the week.

### 1.1 Call for IPR

The Chairman drew attention to Members' obligations under the 3GPP Partner Organizations' IPR policies. Every Individual Member organization is obliged to declare to the Partner Organization or Organizations of which it is a member any IPR owned by the Individual Member or any other organization which is or is likely to become essential to the work of 3GPP.

The attention of the members of this Technical Specification Group is 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 members take note that they are hereby invited:

- to investigate in their company whether their company does own IPRs which are, or are likely to become Essential in respect of the work of the Technical Specification Group.
- to notify the Director-General, or the Chairman of their **respective** Organizational Partners, of all potential IPRs that their company may own, by means of the IPR Statement and the Licensing declaration forms (e.g. see the ETSI IPR forms <a href="http://webapp.etsi.org/lpr/">http://webapp.etsi.org/lpr/</a>).

## Approval of the agenda

R1-090001	Draft Agenda for RAN1#55bis meeting	RAN1 Chairman	1

Dirk Gerstenberger (Chairman) proposed the agenda for the meeting.

**Discussion (Question / Comment): Decision:** The agenda was approved.

## 3. Approval of the minutes from previous meeting

R1-090002	Draft report of RAN1#55 meeting	MCC Support	

The document was presented by Patrick Mérias and draws the minutes from last meeting with special attention to RAN1 email approval issues not resolved prior to RAN1#55b meeting, namely:

- LTE 55/10: on path loss definition
- LTE 55/18: on CQI reporting for trnasmission mode 7
- LTE-A 55/1 (resp. LTE-A 55/3) on TP for evaluation methodology (resp. for default antenna tilt)

**Discussion** (**Question** / **Comment**): Mr Chairman confirmed that August 2009 meeting was of course co-located the same week as the other WGs (due to confusion in recent email on the reflector).



# DOCKET

# Explore Litigation Insights



Docket Alarm provides insights to develop a more informed litigation strategy and the peace of mind of knowing you're on top of things.

## **Real-Time Litigation Alerts**



Keep your litigation team up-to-date with **real-time** alerts and advanced team management tools built for the enterprise, all while greatly reducing PACER spend.

Our comprehensive service means we can handle Federal, State, and Administrative courts across the country.

### **Advanced Docket Research**



With over 230 million records, Docket Alarm's cloud-native docket research platform finds what other services can't. Coverage includes Federal, State, plus PTAB, TTAB, ITC and NLRB decisions, all in one place.

Identify arguments that have been successful in the past with full text, pinpoint searching. Link to case law cited within any court document via Fastcase.

### **Analytics At Your Fingertips**



Learn what happened the last time a particular judge, opposing counsel or company faced cases similar to yours.

Advanced out-of-the-box PTAB and TTAB analytics are always at your fingertips.

### API

Docket Alarm offers a powerful API (application programming interface) to developers that want to integrate case filings into their apps.

#### **LAW FIRMS**

Build custom dashboards for your attorneys and clients with live data direct from the court.

Automate many repetitive legal tasks like conflict checks, document management, and marketing.

#### **FINANCIAL INSTITUTIONS**

Litigation and bankruptcy checks for companies and debtors.

### **E-DISCOVERY AND LEGAL VENDORS**

Sync your system to PACER to automate legal marketing.

