

3GPP TSG RAN#8
Dusseldorf, Germany, 21 -23 June, 2000

RP (00)0311

Agenda Item: 6
Source: CWTS
To: RAN#8
Title: Proposed WI " Low Chip Rate TDD Physical Layer "
Document for: Approval

Work Item Description

Title

Low chip rate TDD physical layer

1 3GPP Work Area

X	Radio Access
	Core Network
	Services

2 Linked work items

Low Chip Rate TDD UE radio access capabilities

Low chip rate TDD Layer 2 and Layer 3 protocol aspects

Low chip rate TDD UTRAN architecture aspects

Smart Antenna

RF Radio Transmission/Reception, System Performance Requirements and Conformance Testing

3 Justification

The integration of TDD low chip rate option in Release 2000 was discussed and approved in RAN#6. The work plan of the integration of low chip rate TDD in R00 was discussed in RAN#7. As a feature, the low chip rate TDD is sub-divided into several building blocks via the email discussion. For the low chip rate TDD, it has commonalities but also difference on physical layer with the high chip rate TDD option e.g. chip rate, frame structure, burst structure, some physical layer procedures etc. This paper is to describe one of the low chip rate TDD building blocks – physical layer.

4 Objective

The technical objective of this work item is to clarify the integration work to be done for the physical layer. And this work will affect the specifications for working group on physical layer.

- For physical layer, it includes the following work tasks:
 - Physical Channels and Mapping of Transport Channels onto Physical Channels
 - Multiplexing and Channel Coding
 - Modulation and spreading
 - Physical layer procedures
 - Physical Layer Measurements

Task	Planned Start	Planned Finish
Create possible new TR on low chip rate TDD	01/2000	05/2000
RAN#8 decide whether new specification required	06/2000	06/2000
Drafting new specifications and CRs	06/2000	09/2000
Possible remaining corrections and clarifications	09/2000	12/2000

5 Service Aspects

None

6 MMI-Aspects

None

7 Charging Aspects

None

8 Security Aspects

None

9 Impacts

Affects :	USIM	ME	AN	CN	Others
Yes		X	X		
No	X			X	X
Don't know					

10 Expected Output and Time scale (to be updated at each plenary)

New specifications						
Spec No.	Title	Prime rsp. WG	2ndary rsp. WG(s)	Presented for information at plenary#	Approved at plenary#	Comments
Affected existing specifications						
Spec No.	CR	Subject			Approved at plenary#	Comments
25.201		Physical layer – General description			RAN#9	
25.221		Physical channels and mapping of transport channels onto physical channels (TDD)			RAN#9	
25.222		Multiplexing and channel coding (TDD)			RAN#9	
25.223		Spreading and modulation (TDD)			RAN#9	
25.224		TDD; physical layer procedures			RAN#9	
25.225		Physical layer; measurements			RAN#9	
25.302		Services Provided by the physical layer			RAN#9	
25.944		Channel coding and multiplexing examples			RAN#9	

11 Work item raporteurs

Mr. Guiliang Yang (CATT/CWTS)

12 Work item leadership

RAN WG1

13 Supporting Companies

Ericsson, Fujitsu, IDC, LG, NTT DoCoMo, Panasonic, RFI, Samsung, Siemens

14 Classification of the WI (if known)

	Feature (go to 14a)
X	Building Block (go to 14b)
	Work Task (go to 14c)

14a The WI is a Feature: List of building blocks under this feature

(list of Work Items identified as building blocks)

14b The WI is a Building Block: parent Feature

Low chip rate TDD

14c The WI is a Work Task: parent Building Block

(one Work Item identified as a building block)