Source:	**N3 Chairman**
	Norbert Klehn
	Siemens AG
	norbert.klehn@icn.siemens.de
Title:	**Meeting Report N3 #3**
Document for:	**Information**
Attention:	**Agenda item 5.1**

Joint TSG-CN3/SMG3 WPD ~~N3-99076~~

Sophia Antipolis, France

13 – 15 April 1999

Title: Draft Report of the TSG-CN3 #3

1. Opening the Meeting

The third TSG-CN3 meeting took place from 13th to 15th of April in Sophia Antipolis hosted by ETSI. The meeting was opened by the Chairman. The draft agenda (doc. 50) was agreed. Available documents were registered and assigned to agenda items.

2. Reports

The report from the last meeting TSG-CN3#2 was already discussed via e-mail and agreed. The final version is contained in document 52.

Latest information related to the structure of the 3GPP specifications series were presented for information (doc. 51).

3. Technical Work: GSM

3.1 Circuit switched data streamlining for GSM R'99

A LS was received from SMG1 indicating changes concerning the deletion of GSM services for GSM R'99 (doc 58). This document and the attached CRs were discussed. Comments were summarised in a LS back to SMG1. This response is contained in document 66 and was prepared by Erik Colban (Ericcson).

The impact on GSM specifications that are under the responsibility of SMG3 WPD will be studied after the approval of the SMG1 CRs by SMG plenary. The rapporteurs are requested to provide some input.

3.2 Work Items

The Work Items for GSM were reviewed.

A LS indication that the WI "GPRS Interworking with ISDN/PSTN" was handed over from SMG4 to SMG3 WPD was received and noted (doc. 55). At the moment two alternatives exist for the provision of this service, an OSP based and an H.323 based solution. The H.323 based solution has preferences. It was clarified in the discussion that further progress depends on actions in other groups.

The WI "Access to ISPs and Intranets – Wireless/Remote access to LANs" needed some clarification concerning the status. Later in the meeting the WI description sheet (doc. 69), already approved in SMG4 and handed over to SMG3 WPD, was presented for information by Graham Heaton (Vodafone). The goal of this WI is to provide an end-to-end DHCP between MS and GGSN. Contributions are expected for the next meetings in order to make progress.

A new WI description sheet on "an asyn-syn HDLC service for CS data" (doc 64) was presented by Erik Colban (Ericsson). The technical background was discussed in very detail. Open issues are related

- to questions of Flow Control between the radio interface link and the fixed network link,

- signalling needs and

- the protocol stack architecture.

These issues have to be investigated.

A revised version of the WI description sheet is contained in document 71. Although only 3 companies support this WI at the moment, it was decided to bring this WI to CN for approval.

3.3 Clarification on RLP

Two Liaison Statements were received from SMG7 (docs. 61 and 62) with questions concerning the interpretation of GSM 04.22. These documents were discussed and answers were found. They were summarised by Norbert Klehn (Siemens) in an LS back to SMG7 in doc. 67, revised in doc. 70.

3.4 EDGE

A lot of CRs for circuit switched EDGE were already agreed during the last meeting (still in SMG4 IW) that will be presented by SMG4 to SMG plenary. It was found that there is still a CR to 07.03 missing. This CR was presented in document 63 by Erik Colban (Ericsson). This CR was agreed. It was decided to put this CR together with the already existing ones hold by SMG4 waiting for decisions by SMG2 on channel codings. Therefore, an LS was sent to SMG4 indicating this fact (doc. 68).

4. Technical Work: UMTS

4.1 Terminal Capabilities

Two Liaison Statements (docs. 53 and 57) were received from TSG-T2 concerning the definition of terminal capabilities. The results of the discussion were summarised by Achim Braun (Alcatel) in an LS that is sent back to TSG-T2 (doc. 73).

4.2 Call Control and Session Management

TSG-S2 has sent a Liaison Statement (docs. 54) to TSG-CN1 with copy to TSG-CN3 et al. concerning the UMTS call control and session management. TSG-CN1 is requested to make some decisions concerning CC/SM. It was found to response to this LS because

- some of our Work Items depends on the decisions made by TSG-CN1and

- not only CC/SM is relevant for handover between GSM and UMTS, but also traffic channel matters.

This LS contained in document 72 was produced by Peter Mason (BT).

4.3 Link and Adaptation Layers in UMTS Phase 1

A Liaison Statement received from SMG12 (doc. 75) was noted. No further actions are required.

4.4 Facsimile

4.4.1 Real-time NT Facsimile based on GSM 03.46

Janichirow Hagiwara (NTT DoCoMo) presented document 59 containing a WI description sheet for the provision of a real-time non-transparent facsimile service in UMTS. It was found that a definition of the term "real-time" should be added to avoid confusions because it is used in combination with the term "non-transparent". It was clarified by Mitsuru Murata (NTT DoCoMo), that a real-time solution based on an enhanced GSM 03.46 is preferred against a T.38 based solutions because of the following weak points:

- mobile terminated facsimile calls will not work with the existing T.38

- T.38 needs a two step dialling that is inconvenient for the user

It was responded by Erik Colban (Ericsson) that these weak points exist, but can be solved and overcome. Some work has to be still done to provide a real-time facsimile solution based on T.38. Ian Harris (Vodafone) expressed his serious doubts on enhancements of GSM 03.46 based on his experience with facsimile solutions in GSM.

The WI description sheet was amended in document 74 and finally agreed to be presented to CN for approval although there are only two supporting companies until now. Two further companies will be added soon.

Miss Ryoko Okigi (NTT DoCoMo) presented document 60 by means of the slide presentation showing the proposed improvements for GSM 03.46. Mitsuru Murata (NTT DoCoMo) emphasised in the discussion that these proposals are already in operation in PCS networks. There are two access configurations for facsimile service:

- a T.30 enabled Fax device is connected via an adapter to the MS and

- a portable Fax device that combines the functions of the Fax adapter and the T.30 Fax device.

However, a re-use of the existing devices is not possible for the 3rd generation mobile system.

Achim Braun (Alcatel) mentioned that the validations of Fax NT according to GSM 03.46 have shown that the main problem with time constraints were found during the message phase of T.30 but not during the BSC phase where enhancements are proposed by NTT DoCoMo to overcome this problem. These arguments were noted by NTT DoCoMo. Some other technical details were clarified and discussed. Ian Harries (Vodafone) requested a CR to 03.46 to clarify in detail what changes are foreseen and to understand the proposed solution. NTT DoCoMo has accepted to provide such information. However, this cannot be considered as final CR because the architecture of the underlying layers are unknown for circuit switched services in UMTS until now.

4.4.2 Real-time Facsimile based on ITU-T T.38

As requested in the last CN3 meeting, Erik Colban (Ericsson) provided supplementary information on T.38 especially focused on the delays that T.38 implementations can handle. This information is needed in order to assess whether T.38 is suitable in a mobile context.

How the delays are handled is not subject to the T.38 recommendation, but depends on the implementations. Therefore, it is not possible to give accurate results, the results presented in document 65 are based on simulations performed by Ericsson for a T.38 gateway not specifically designed to be used in the in a mobile context. However, they may give some indication on the effects that delay has on the performance of the protocol.

As next step it was found to be useful to compare these values with values derived from GPRS implementations.

4.5 Other Work Items

4.5.1 Service Control (CAMEL) support for GPRS / ISDN interconnect services

CN3 is still waiting for responses to a sent LS asking for consideration and opinions related to the proposed WI. Peter Mason (BT), the originator the WI, mentioned that he is of the opinion the major work has to be done by CN1 and CN3, so that it could be decided in CN plenary where should get the prime responsibility for this WI.

4.5.2 Parameters for bearer and teleservices for PIAFS services

This WI was initiated by NEC in the first CN3 meeting. The meeting has requested more information that have not been provided until now. However, it should be checked whether this WI could become a part of the general WI on CC/SM in UMTS.

.

5. Results

5.1 Work Items

TSG-CN3 / SMG3 WPD has the following Work Items for GSM R'99:

- GPRS Interworking with ISDN and PSTN

- Access to ISPs and Intranets in GPRS Phase 2 - Wireless/Remote Access to LANs (R99)

- An asynch-to-synch HDLC service for circuit switched data (proposal, for approval)

The following Work Items are proposes for UMTS:

- Service Control (CAMEL) support for GPRS / ISDN interconnect services (work split has to be defined)

- Real-time non-transparent facsimile (proposal, for approval)

- Parameters for bearer and teleservices for the provision of the PIAFS service (32 and 64 kbit/s) (proposal, has to be checked whether it can be included in general WI on CC/SM for UMTS)

Other Work Items have to be checked whether TSG-CN3 has to contribute.

A WI is expected after S2 has made decisions on the architecture of circuit switched services in UMTS. CN3 has to contribute according to the work split between TSG-R and TSG-CN.

5.2 Liaison Statements

The following Liaison Statements will be sent:

N3-99066	LS to SMG1 on streamlining of data services for GSM R'99
N3-99068	LS to SMG4 on introduction of EDGE (with doc. N3-99063 attached)
N3-99070	LS to SMG7 on clarification on GSM 04.22
N3-99072	LS to CN1 on CC/SM
N3-99073	LS to T2, S2 on Terminal Capabilities

6. Organisational Issues

6.1 Election

During the second CN3 meeting it was not possible to elect Vice-Chairmen because of missing candidatures. For this meeting there was a candidate (doc 56). Achim Braun (Alcatel) was elected as Vice-Chairman of TSG-CN3 per acclamation because he was the only candidate.

6.2 Meeting Support

A secretary has not been assigned to TSG-CN3. So during the meeting, this function was performed by the Chairman himself. Meeting support was given by Claire Millot (ETSI).

6.3 Meeting Schedule

The meeting in May was cancelled. The meeting schedule is now as follows:

Meeting	Date	Host
TSG-CN3#4	14-18 June, 1999	NEC, Abiko, Japan
TSG-CN3#5	13-17 September, 1999	no host
TSG-CN3#6	19-21 October, 1999	no host
TSG-CN3#7	29 Nov -03 Dec, 1999	no host

7. Any other business

The Chairman thanked ETSI for hosting the meeting, Miss Claire Millot for the meeting support given and the delegates which made it possible to make progress in work.

8. Participants List

	name	company	org. partner	email address
1.	BRAUN Achim	Alcatel	ETSI	achim.braun@alcatel.de
2.	COLBAN Erik	Ericsson	ETSI	erik.a.colban@ericsson.no
3.	DANIEL Elizabeth	Lucent Technologies	ETSI	**Error! Bookmark not defined.**
4.	FRUSCIO Giovanni	Telecom Italia S.p.A	ETSI	gfruscio@tim.it
5.	HAGIWARA Junichirow	NTTDoCoMo	TTC	**Error! Bookmark not defined.**
6.	HARRIS Ian	Vodafone	ETSI	ian.harris@vads.vodafone.co.uk
7.	HEATON Graham	Vodafone Value Added + Data Services	ETSI	graham.heaton@vads.vodafone.co.uk
8.	HORINO Haruko	NTT DoCoMo	TTC	**Error! Bookmark not defined.**
9.	JANSON Loeiz	France Telecom	ETSI	**Error! Bookmark not defined.**
10.	KLEHN Norbert	Siemens AG	ETSI	norbert.klehn@icn.siemens.de
11.	MASON Peter	BT	ETSI	**Error! Bookmark not defined.**
12.	MURATA Mitsuru	NTT DoCoMo	TTC	**Error! Bookmark not defined.**
13.	OKIGI Ryoko	NTT DoCoMo	TTC	**Error! Bookmark not defined.**
14.	PETRONE Valentina	Telecom Italia S.p.A.	ETSI	**Error! Bookmark not defined.**
15.	RÄSÄNEN Juha	Nokia Corporation	ETSI	juha.rasanen@ntc.nokia.com

9. List of Documents

9.1 List of Input Documents

DOC	Subject	Source
N3-99050	Draft Agenda and Proposed Meeting Schedule	CN3 Chairman
N3-99051	Structure of the 3GPP specifications series	3GPP support
N3-99052	Report of the CN3 #2 Meeting	CN3 Convenor
N3-99053	LS on Principles for the continued work with Terminal Capabilities	TSG-T2
N3-99054	LS on UMTS Call Control and Session Management	TSG-S2
N3-99055	LS on Interworking issues for GPRS phase 2	SMG4 GPRS / TSG-CN3
N3-99056	Candidate for Vice-Chairman, Achim Braun	Alcatel SEL
N3-99057	Message on Reviewing Terminal Capabilities	TSG-T
N3-99058	Collection of available LSs and CRs concerning GSM clean up R'99	CN3 Chairman
N3-99059	Real-time NT Fax (Enhancements for GSM 03.46) in UMTS/IMT-2000 WI description – proposal	NTT DoCoMo
N3-99060	Enhancements of GSM 03.46 in UMTS/IMT-2000	NTT DoCoMo
N3-99061	LS from SMG7: General Clarification of RLP Core Specification GSM 04.22,	SMG7
N3-99062	LS from SMG7: Request for clarification of GSM 04.22, vers. 4.5.0, section 5.3.3.2: Treatment of errors during numbered information transfer.	SMG7
N3-99063	CR to 07.03 on EDGE	Ericsson

N3-99064	WI description sheet for ASHDLC	Ericsson
N3-99065	Information to T.38	Ericsson
N3-99066	LS to SMG1 on streamlining of data services for GSM R'99	Ericsson
N3-99067	LS to SMG7 on clarification on GSM 04.22	Siemens
N3-99068	LS to SMG4 on introduction of EDGE	Ericsson
N3-99069	WI description sheet for Access to ISPs and Intranets in GPRS Phase 2 - Wireless/Remote Access to LANs.	Vodafone
N3-99070	LS to SMG7 on clarification on GSM 04.22 (rev. of doc. 67)	Siemens
N3-99071	WI description sheet for ASHDLC	Ericsson
N3-99072	LS to CN1 on CC/SM	BT
N3-99073	LS to T2, S2 on Terminal Capabilities	Alcatel
N3-99074	WI on real-time NT Fax (rev. of doc. 59)	NTT DoCoMo
N3-99075	LS from S2 on Link and Adaptation Layer	TSG-T2/SMG12
N3-99076	Report of CN3 #3 Meeting	CN3 Chairman

9.2 List of Output Documents

DOC	Subject	Source
N3-99063	CR to 07.03 on EDGE (attached to doc. N3-99068)	SMG3 WPD
N3-99066	LS to SMG1 on streamlining of data services for GSM R'99	SMG3 WPD
N3-99068	LS to SMG4 on introduction of EDGE (with doc. N3-99063 attached)	SMG3 WPD
N3-99070	LS to SMG7 on clarification on GSM 04.22	SMG3 WPD
N3-99071	WI description sheet for ASHDLC	SMG3 WPD
N3-99072	LS to CN1 on CC/SM	CN3
N3-99073	LS to T2, S2 on Terminal Capabilities	CN3
N3-99074	WI on real-time NT Fax	CN3
N3-99076	Report of CN3 #3 Meeting	CN3 Chairman