



Third Generation Partnership Project

MEETING REPORT v3.0.0

3GPP TSG-CN3 / ETSI SMG3 WPD

Meeting # 11

10th - 14th July 2000
Oslo, Norway



Hosted by Ericsson

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1 Opening of the Meeting

The 11th CN3 meeting took place from 10th – 14th July at the Bristol Hotel, Oslo in Norway

Erik Colban of Ericsson welcomed the N3 delegates to Oslo on behalf of the host, and explained the logistical details for the week.

Ericsson also kindly organised a highly enjoyable social event on the Wednesday evening to the *Holmenkollen* ski jump.

The N3 Chairman Mr. Norbert Klehn, opened the meeting at 09:00 on Monday 10th July. He set the objectives for the meetings as follows:

- Start work on Release 2000
- Remove Fax related material from Release 1999

Norbert also informed the delegates that the N3 vice chair Graham Heaton, has changed company and is obliged to resign as vice chair of N3 and chair of the N3 Packet sub-working group. Norbert thanked Graham for all of his work over the past years. A request for nominations for the CN3 Vice chairman will be sent out to the N3 exploder.

2 Approval of the Agenda

N3-000281: N3#11 Draft Meeting Agenda. Presented by the N3 Chairman.

Content: Contains the draft Agenda for CN3#11 Meeting.

DISCUSSION: Norbert introduced the agenda document and outlined the schedule of the meeting for the rest of the week. It was agreed that due to the nature of the documents presented for discussion, there would not be parallel Packet and Circuit sessions.

RESULT: The Agenda and schedule of work was **APPROVED**.

3 Registration of documents

The meeting documents are available on the 3GPP server at:
ftp://ftp.3gpp.org/TSG_CN/WG3_interworking/TSGN3_11/tdocs/

All additional input documents were assigned to the draft agenda at the beginning of the meeting.

N3-000281: Draft Meeting Agenda. Presented by the N3 Chairman.

DISCUSSION: The draft agenda also shows the allocation of the temporary documents to the agenda various items. The initial allocation was discussed at the beginning of the meeting, and the allocations agreed and/or modified. This exercise is reflected in the structure of this meeting report and the original Agenda document is not revised.

Norbert also created another document with the allocation of documents to agenda items. This also showed the source and title of the documents, similar to the practice in CN plenary. Delegates expressed their wish to use this document as basis for their notes rather than the agenda that only contains the document numbers. So, this document was distributed and updated throughout the week (N3-000355, N3-000376, N3-000386). However the chairman's' personal notes were removed before the document was distributed to the delegates.

RESULT: The allocation of documents was **APPROVED**.

4 Reports

4.1 CN3#10 Meeting Report, (Hawaii)

The meeting report can be found at: ftp://ftp.3gpp.org/TSG_CN/WG3_interworking/TSGN3_10/Report/

N3-000283: CN3#10 Draft Meeting Report. Presented by David Boswarthick, MCC.

CONTENT: Contains the latest version of the draft meeting report for the CN3#10 meeting held in Hawaii, May 2000.

DISCUSSION: The CN3#10 report was completed and distributed at the end of the meeting. There was the usual 2-week deadline for comments by e-mail, and these comments have been integrated in the revised meeting report presented in this document.

RESULT: The document was **APPROVED**.

N3-000316 N3 Status Report as presented to the CN Plenary. Presented by Norbert, N3 Chairman.

CONTENT: Contains the Chairman's status report as presented to the CN Plenary.

RESULT: The document was **NOTED**.

4.2 Reports from TSG_N#8 (Düsseldorf)

N3-000282: Brief Notice from CN#8. Presented by Norbert, N3 Chairman.

CONTENT: Contains the e-mail notice sent by Norbert to the N3 exploder following the N_Plenary. Hi-lights from the TSG_N#8 are given below.

The status report given in NP-000215 was accepted. The reports provided in NP-000216 and 217 were noted.

Fax: Version 2.0.0 of TS 23.146 was approved and lifted to version 4.0.0. The CR against 27.001 in NP-000225 related to Fax was not agreed for R99 but for R00 (NP-000382). CN3 is urged to provide CRs for R99 to remove 3G real-time NT Fax related material. All specifications of concern will be lifted to version 4.0.0.

All of the other CN3's change requests were approved. GSM CRs were already approved by SMG3 and SMG.

The Work Item Description Sheets on "Service Modification without Pre-notification" (NP-000220 and 221) were already presented to the "Joint CN/S2 workshop on R00 Work Items" that took place in Sophia Antipolis on 14/15 June, 2000. This meeting requested to combine both of the Work Items. A combined Work Item (NP-000224) was presented to CN#8. A revised version in NP-000381 was approved.

The Terms of Reference were briefly discussed. Some improvements are still necessary, e.g. to incorporate the decisions on the work split between CN3 and CN4 for the CS domain recently agreed during the "Joint CN/S2 workshop on R00 Work Items". The decision is as follows:

- CN4 is responsible for the interface between the MSC Server and the Gateway MSC Server.
- The MGW/MGW interface consists of the control and a transport part. CN3 is responsible for the transport part. For the control part CN3 has prime responsibility, whereas CN4 has second responsibility.
- CN4 has first responsibility for the interface between the MSC Server and the MGW. Their work is mainly related to protocol issues. CN3 has here second responsibility and concentrates on the definition of parameters and parameter values to control the MGW.

The CN Vice Chairman Dr. Masami Yabusaki (NTT DoCoMo Europe) has resigned. Election of a new Vice Chairman will take place at CN#9.

RESULT: The document was **NOTED**.

N3-000317: CN#8 Draft Meeting Report. Presented by David Boswarthick, MCC.

CONTENT: Contains the draft meeting report for the CN#8 meeting held in Düsseldorf, June 2000.

DISCUSSION: The draft report has not yet been distributed to TSG_CN for approval, and this document is for information only to N3.

RESULT: The document was **NOTED**.

N3-000318: CN Status – summary presentation. Presented by Norbert, N3 Chairman.

CONTENT: Contains the Summary presentation as provided to the SA Plenary by Stephen Hayes, CN Chairman.

DISCUSSION: Norbert hi-lighted the discussion on 2G/3G terminology. For R99 CN will continue to use GSM/UMTS.

Also there was a discussion on the table showing the CN estimates for completion of R00 work items.

- Question on Security minimal / full solution.

- *The Minimal Solution includes only MAP security.*

- *Full Solution includes the securing of other network interfaces.*

- *Key management is covered under a separate WI.*

3 months duration for service modification without pre-notification is considered too short by the N3 delegates.

Norbert stressed that it was difficult to identify the dependencies and responsibly working groups for work items that have not yet been fully defined by S1/S2.

RESULT: The document was **NOTED**.

N3-000343: N3/ N4 Work split. Presented by Norbert, N3 chairman

CONTENT: Document showing the split of work between N3 and N4. It summarises the results of the discussion that took place in the joint CN/S2 meeting, in chairmen's ad hoc evening meeting and which was finally agreed in TSG_CN.

CN4 is responsible for the specification of protocols within the PLMN, e.g. MAP, CAP.

CN3 is responsible for the PLMN interworking towards fixed networks. The nature of this work includes the mapping of parameters and parameter values between the different signalling systems. This includes further, the determination of needed parameters and parameter values needed in the PLMN and the definition of possible combinations to define a certain service. It also includes the selection or definition of appropriate data transmission protocols for the user plane depending on the information derived from the control plane.

The separation of control and transport for the CS domain in R00 yields to some overlapping between the work in CN3 and CN4. This is shown as a diagram in the document.

DISCUSSION: Erik raised a question on the parameter values. The parameter values for which N3 are responsible, relate only to data services but not to speech. It was responded that such split is not foreseen at the moment. But this has to be clarified (see discussion to N3-000285).

Juha proposed that N3 should also be dealing with Multimedia i.e. Video codecs.

Igarashi-San asked if N3 will have the responsibility for H.248. Norbert clarified that N3 will only have the responsibility of the parameters used with H.248. N4 have the responsibility of this protocol or extensions to this, respectively.

Question for clarification; We define fixed networks as ISDN, PSTN, ATM and IP. It does not include interworking to various PLMNs (e.g. IS.41).

Niaz H. Syed asked about interworking to All IP network. It was clarified that this work split is for the CS domain.

RESULT: The document was **DISCUSSED**.

4.3 Reports from Other Groups

N3-000286: New Homes for Old Specs. Presented by Norbert, N3 Chairman.

CONTENT: Contains the proposal for moving GSM Radio activities into 3GPP.

DISCUSSION: The list of specifications under N3 responsibility was checked during the meeting.

Note: 03.43, 03.44 are the responsibility of T2, as agreed last year.

Rapporteurs are required for 03.45, 03.46, 03.54, 03.70. [07.60, 09.61 – Graham resigned]. N3 delegates are requested to nominate Rapporteurs for these specifications by N3#12 meeting.

It is expected that new specifications will be required for 3G for such functions as Media Gateway.

N3s' review showed that the list of specifications under its' responsibility is correct.

RESULT: The document was **DISCUSSED**.

N3-000309: Transfer of GSM specs to 3GPP. Presented by Norbert, N3 chairman.

CONTENT: The 3GPP Organizational Partners have agreed in principle to the transfer of all remaining GSM specifications from ETSI TC SMG to 3GPP. (It is possible that some of the 11. and 13. series will in fact be transferred to ETSI TC MSG, but this aspect will not be covered in the present contribution.) The final decision on the precise modalities of the transfer will be taken in July, but it is necessary that concrete plans are made prior to that time, and that the present TSGs are in accord with the future operational aspects of the transfer.

With the closure of TC SMG (meeting number 32, 19-20 June 2000 is the last scheduled meeting), the SMG area on the ETSI "docbox" fileserver will be frozen. Once all the files (tdocs, specs, report, ...) resulting from that meeting are in place, no further additions to the SMG area will be made. Eventually (but not in the short term), the SMG area will be "archived" in a similar way to the areas for other defunct committees.

DISCUSSION: **Norbert** hi-lighted the numbering issue (section 4). An offset of 40 will be added to the series value). Thus 08.33 becomes 48.033. 2G specs are distinguishable by having their exponent in the range 40.bbb to 53.bbb, whilst 3G specs are in the range 20.bbb to 39.bbb. Also the directory structure on the server will change.

N3 delegates are requested to read this document and familiarise themselves with the changes.

RESULT: The document was **NOTED**.

N3-000310: CR to 22.002 on lower user rates. Presented by Norbert, N3 chairman.

CONTENT: This document was presented to N3 for information because N3 was involved in the preparation of this document. It contains the SA1 CR to 22.022 that aligns with N3 for Lower User Rates in UMTS for Circuit Switched Data Services. Corrections and clarifications based on N3 proposal. This CR aligns stage 1 with R99 system functionality.

The change request was agreed by SA plenary #8.

The CR was previously resented to N3 in the Berlin meeting. A related CR to 29.007 was subsequently approved at the CN#8 plenary and has been incorporated in the latest version of the specification.

RESULT: The document was **NOTED**.

- N3-000311:** **CR to 22.060 on X.25 / IHOSS.** Presented by Norbert, N3 chairman.
- CONTENT:** This document was presented to N3 for information because N3 was involved in this topic. The document contains the SA1 CRs to GPRS, 22.060 deleting IHOSS and X.25. as a result of the request from CN3.
- DISCUSSION:** The change requests were agreed by SA plenary #8. N3 have already performed the required changes to 27.060 and 29.061.
- RESULT:** The document was **NOTED.**
-
- N3-000312:** **CR to 21.905 on 3G Vocabulary.** Presented by Norbert, N3 chairman.
- CONTENT:** Contains the CR to 21.905 as presented to SA#8, as well as the resulting 21.905v310.
- DISCUSSION:** Presented for information only. N3 delegates are invited to check that the changes proposed by N3 have been correctly incorporated.
- RESULT:** The document was **NOTED.**
-
- N3-000313:** **TR 21.901 v400 Drafting Rules.** Presented by Norbert, N3 chairman.
- CONTENT:** Contains the latest version of Specification drafting rules, as approved at SA#8.
- DISCUSSION:** Presented for information. N3 shall adopt these drafting rules for all CRs and new specifications.
- RESULT:** The document was **NOTED.**
-
- N3-000314:** **3GPP Specification list at end of TSG#8.** Presented by Norbert, N3 chairman.
- CONTENT:** Contains the a status list of 3GPP Specifications as presented to SA#8. The list reflects the expected status after the Plenary #8.
- DISCUSSION:** **DAB will check the information for the N3 specifications and inform JMM of any anomalies.**
- RESULT:** The document was **NOTED.**
-
- N3-000315:** **CR 21.900 on specification and Work Item Handling.** Presented by Norbert, N3 chairman.
- CONTENT:** Contains the CR to 21.900 where specific elements on handling specifications have been eliminated to avoid duplication with 21.100; and on software tools to avoid duplication with 21.801.
- DISCUSSION:** Provided for information. N3 delegates are requested to consider 21.900 with regards to 3GPP working methods.
- RESULT:** The document was **NOTED.**

5 Liaisons from other groups

Status Check on LSs sent from Previous N3 Meetings

DOC N3-00	Subject	To	Cc	Attachment	Sent	Status
0170	Clarification on Transfer Delay value for the streaming class.	S2		None	17/04/00	Response from S2 in N3-000330
0195	Bearer Modification without Pre-notification	N1, N4, T2		N3-000198	17/04/00	Noted by N1 in meeting #12 Response from N4 in N3-000253 Response from T2 in N3-000251
280	Comments to 22.976 v1.4.0	S1				S1#9 meeting 17-21st July 2000
278	Service Modification without pre-notification	S1, S2		0271, 0269, 0279		S2#14 meeting 4-8th Sept 2000 S1#9 meeting 17-21st July 2000

N3-000330: LS from SA2 regarding Clarification on Transfer Delay value for the streaming class. Presented by Erik of Ericsson.

CONTENT: Contains the response to our LS N3-000170 on Transfer Delay value for the streaming class.

SA2 accepts CN3's choice and consequently leaves the value ranges for UMTS bearer service attributes and radio access bearer service attributes as they are currently specified in TS 23.107, i.e. the minimum value for the transfer delay attribute for the streaming class is **250ms**.

DISCUSSION: Note this parameter is subject to operator tuning, but as 250ms is the minimum, there can only be tuning in the upwards direction.

N3 will study the impact of this information on their specifications.

RESULT: The LS was **NOTED**.

N3-000354: LS on specifying luUP PDU Type in 3G TS 26.102. Presented by Erik of Ericsson.

CONTENT: Non-transparent cs data services require lu UP support mode. Based on the PDU type selection mechanism outlined above PDU type 1 (without payload CRC) is likely to be selected according to the low SDU error ratio requirements given in the table of 3G TS 27.001, chapter B.1.13.2. **CN WG3 is asked to express their opinion.**

DISCUSSION: The zip file also contains the CR to 25.415 that removes ambiguities regarding which PDU type to use for user data transmission. The PDU type is chosen by UTRAN based on the reliability attributes and indicated in the Initialisation frame.

If this CR is not accepted then UTRAN and CN may make a different decision on which PDU type is used for user data transmission

Comments: UTRAN does not know what type of PDU type is to be used, and the core network does not provide this information to UTRAN, only the QoS requirements to be used.

A solution where the selection criteria is specified is preferred by N3, to guarantee that PDU type 1 is used for NT data services

A reply is contained in the LS to RAN3 in document 0377, and this will be copied to SA4.

RESULT: The LS was **DISCUSSED**.

⇓ **RELATED DOCUMENT** ⇓

N3-000377: **LS to RAN3 on specifying luUP PDU Type in 3G TS 26.102.** Presented by Erik of Ericsson.

CONTENT: LS communicating N3's opinion that it would be preferable to specify the criteria for selecting PDU type in order to avoid vendor dependent product discrepancies and to guarantee that PDU type 1 is always selected by the UTRAN for the CS NT data services.

DISCUSSION: Suggested to have stronger wording to express the necessity to specify the criteria. Also addition of the RAN3 LS tdoc reference was added

RESULT: The LS was **REVISED to 0390.**

⇓ **REVISED** ⇓

N3-000390: **Rev. LS to RAN3 and SA4 on specifying luUP PDU Type in 3G TS 26.102.** Presented by Erik of Ericsson.

RESULT: The LS was **APPROVED.**

6 Administrative issues

6.1 Project Co-ordination.

N3-000285: **3GPP Project Plan v1.3.0.**

CONTENT: Contains the latest version of the 3GPP project plan, as approved at SA#8 plenary.

DISCUSSION: The project plan was discussed, and the Work Items where N3 have responsibilities were verified.

Comments to “Evolution of the Transport in the CN”

Following the decisions on work split between N3 and N4 detailed in N3-000343 it was agreed that “User/signalling data transport on TCP/RTP/UDP/IP based bearers (Nb/Nc)” and “User/signalling data transport on ATM/AAL2 bearers (Nb/Nc)”, should be allocated to **N4/N3.**

N3 shall await the work item sheet to be produced by N4.

Comments to “Real Time QoS for packet services including VoIP”

N3 shall await the work item sheet to be produced by S2.

Comments to “Facsimile”

Norbert raised the question on the progress of T2s work to this work Item.

CN consider Facsimile as complete. However the status in T2 is unknown.

NTT DoCoMo checked with their T2 delegates and reported that there is no plan to change the AT commands. However Erik mentioned that Ericsson *may* propose new AT commands for this service in the future.

Comments to AMR Implementation in CN

It was initially agreed that N1 should have the responsibility for Bearer Capability negotiation. N3 would only become involved if there are any multimedia impacts. However the responsibility for speech codec negotiation needs to be examined.

Norbert will discuss with Hannu (N1 chairman), on the responsibility of N3 and N1 for the negotiation of speech codecs. Also, N3 delegates will check with their N1 colleagues to ensure that the expertise for this work is within N3 and not N1. Comments should be sent back to Norbert by e-mail.

RESULT: The document was **DISCUSSED.**

N3-000287: Security Work Plan v0.0.4.

CONTENT: Contains S3s work plan document as presented and discussed at the joint S3/CN meeting in Sophia.

DISCUSSION: Graham Heaton has reviewed the Work Plan and sent a mail to Norbert for consideration. He suggests that that N3 has involvement in **at least** 3.1.1.1, 3.1.1.2 and 3.1.2.1.

for 3.1.1.1: Access security for IP-based services

N3 concluded that with the *condition* that Access Security for IP based services refers only to the additional security on the radio link (MS to SGSN) – N3 have no responsibility.

for 3.1.1.2: Network-based end-to-end security

DAB will check on the progress of well-defined and understandable system architecture concepts and principles, that S2 will/have presented to S3.

End to End security, goes beyond the GGSN, and hence there *may be* some interworking function that involves N3. This can only be understood when the system architecture is available from S2. **N3 will await the output from S2.**

for 3.1.2.1: for FIGS N3 will await the output from S2.

The decision on N3s' involvement in the SECURITY issues is postponed until S2 provide further information including system architecture.

Lucy Yang, Motorola will present some contributions relating to N3s' involvement to security issues at the next meeting.

RESULT: The document was **DISCUSSED**.

N3-000288: List of IGCs and Contact Persons.

CONTENT: SA has extended the number of IGCs from 6 in R99 to 12 in R00 to cover all issues. Each IGC monitors a set of features and creates a project plan. TSG_CN has urged the working groups to nominate contact persons for each of the IGCs.

DISCUSSION: The Contact person shall represent N3s interest to each of the IGCs and report progress back to each N3 meeting, and to the N3 mail exploder.

IGC	Convenor	N3 Contact Person
Bearer and Access Stratum	François Courau, Alcatel	Norbert Klehn, Siemens
QoS	Oscar Lopez-Torres, T-Mobil	Achim Braun, Alcatel
CC and roaming	Alexander Milinski, Siemens	Juha Räsänen, Nokia
Codecs	Ian Doig, Motorola	Daisuke Igarashi, NTT DoCoMo
Messaging	Martin Guntermann, Mannesmann Mobilfunk	Not Required in N3 (at this time)
Terminal local features	Paul Voskar, Nokia	Not Required in N3 (at this time)
Service platforms	Christophe Gourraud, Ericsson	Not Required in N3 (at this time)
Security	Chris Pudney, Vodafone-Airtouch	Norbert Klehn, Siemens
Billing, charging and management	Yukio Hiramatsu, NTT	Not Required in N3 (at this time)
Testing	Ian Doig (acting), Motorola	Not Required in N3 (at this time)
Location related issues	Jan Kall, Nokia	Not Required in N3 (at this time)
Overall Co-ordination and general issues	Alain Sultan, MCC	David Boswarthick, MCC david.boswarthick@etsi.fr

The above delegates volunteered to represent N3 in the IGCs as indicated in the table above. It is expected that the relevant IGC mailing lists will be created in the near future (if this has not already been done).

RESULT: The document was **DISCUSSED**

6.2 Terms of Reference / Future Work

N3-000284: N3 Draft accommodated Terms of Reference and Dependencies to Other Groups.

CONTENT: The original version of this document was agreed in N3#10 and presented to TSG_N#8. Comments were made to the ToR and the document was sent back to N3 for further study.

DISCUSSION: The term BHC is unknown and it was suggested it be modified to BICC

RESULT: The document was **REVISED to 0352.**

⇓ **REVISED** ⇓

N3-000352: Rev.N3 Draft accommodated Terms of Reference and Dependencies to Other Groups.

RESULT: The document was **AGREED to be presented to TSG_N#9.**

6.3 Next meetings, allocation of hosts

N3-000308: CN Meetings Calendar. Presented by Norbert.

CONTENT: Contains the Calendar of Meetings (2000/2001), for TSG_CN and it's working groups.

RESULT: The document was **NOTED.**

N3-000320: N3 meetings for 2000. Presented by Norbert.

CONTENT: Contains the listing year 2000 meetings for N3 as well as other CN WGs.

DISCUSSION: Due to the large amount of postponed issues, it was decided to hold the August meeting in Seattle. Norbert will send a mail to the host, and also ensure that the invitation is issued quite soon.

ETSI will host the November meeting

RESULT: The document was **NOTED.**

N3-000321: N3 meetings for 2001. Presented by Norbert.

CONTENT: Contains the listing year 2001 meetings for N3 as well as other CN WGs.

DISCUSSION: During week 20 in 2001 Norway has a public holiday – it was agreed to move the N3 meeting forward to 23rd – 27th April.

David suggested moving the September meeting from week 37 to week 36. This will allow 2 weeks to prepare N3 input to the September CN Plenary. This was agreed by N3.

It should be noted that these is only one working group meeting between Plenaries. Ad Hocs will be organised as required to resolve specific issues.

David B, will ensure these dates are input to the 3GPP meeting calendar.

RESULT: The document was **REVISED to 0353.**

⇓ **REVISED** ⇓

N3-000353: Rev. N3 meetings for 2001. Presented by Norbert.

CONTENT: Contains the revised listing year 2001 meetings for N3 as well as other CN WGs.

There are presently no hosts, and Norbert invites the delegates to consider the possibility of hosting N3 meetings in 2001.

RESULT: The document was **AGREED**.

Meeting	Date	Host, Location	Delta to previous meetings	Comments
TSG-CN3#12	28 th Aug – 1 st Sept	T1P1 – USA (Seattle)	6 weeks	
TSG-CN3#13	16 th – 20 th Oct 2000	Alcatel, Stuttgart	6 weeks	Extended to 5 days
TSG-CN3#14	13 th – 17 th Nov 2000	ETSI, Sophia	3 weeks	
TSG-CN3#15	19 th – 23 rd Feb 2001	Host required	15 weeks	
TSG-CN3#16	23 rd – 27 th April 2001	Host required	8 weeks	
TSG-CN3#17	9 th – 13 th July 2000	Host required	10 weeks	
TSG-CN3#18	3 rd – 7 th Sept 2000	Host required	7 weeks	
TSG-CN3#19	12 th – 16 th Nov 2001	Host required	9 weeks -	

7 Release 99 and earlier:

7.1 T.E.I

7.1.1 CS Bearers

7.1.1.1 Transparent 32kbit/s data rate with I.460 rate adaptation

N3-000289: Discussion document, Transparent 32kbit/s data rate with I.460 rate adaptation. Presented by Juha of Nokia.

CONTENT: Contains a discussion document on Transparent 32 kbit/s data rate with I.460 rate adaptation. Instead of ATRAU' the I.460 rate adaptation should be used for 32 kbit/s. The resulting data stream is transparent for the IWF.

It was agreed to follow the proposal. The related CRs are treated.

RESULT: The document was **NOTED**.

N3-000290: CR to 29.007 R99, Transparent 32kbit/s data rate with I.460 rate adaptation. Presented by Juha of Nokia.

CONTENT: Contains a CR to 29.007 that provides clarification on the use of I.460 rate adaptation instead of the A-TRAU' protocol for 32 kbit/s.

DISCUSSION: **Achim:** Comment to Table 11: Do we use the radio interface user rate 32 kbit/s only in the transparent case? Juha replied that we are only using it with the transparent case.

Daisuke: The Nokia proposal does not apply to PIAFS. **Juha** proposes removing 32kbit/s from table 11 to comply with PIAFS.

Norbert: Comment to 11.3: Do we use A-TRAU' for non transparent 32kbit/s? **Juha:** 32kbit/s is used only towards the fixed network. The text in 11.3 is correct as it refers to the transparent case.

Replace Data Rate in table 11 with Air Interface User Rate.

It is noted that a R00 CR is also required. This is provided in **0357**.

RESULT: The document was **REVISED to 0356**.

⇓ **REVISED** ⇓

N3-000356: Rev. CR to 29.007 R99, Transparent 32kbit/s data rate with I.460 rate adaptation. Presented by Juha of Nokia.

DISCUSSION: Addition of other specs affected

RESULT: The document was **AGREED**.

⇓ **RELATED DOCUMENT** ⇓

N3-000357: Rev. CR to 29.007 R00, Transparent 32kbit/s data rate with I.460 rate adaptation. Presented by Juha of Nokia.

RESULT: The document was **AGREED**.

N3-000291: CR to 23.910 R99, Transparent 32kbit/s data rate with I.460 rate adaptation. Presented by Juha of Nokia.

CONTENT: Contains an equivalent CR to 23.910 for Transparent 32kbit/s data rate with I.460 rate adaptation.

DISCUSSION: Replace Data Rate in table 11 with Air Interface

It is noted that a R00 CR is also required. This is provided in **0359**.

RESULT: The document was **REVISED to 0358**.

↓ REVISED ↓

N3-000358: Rev CR to 23.910 R99, Transparent 32kbit/s data rate with I.460 rate adaptation. Presented by Juha of Nokia.

RESULT: The document was **AGREED**.

↓ RELATED DOCUMENT ↓

N3-000359: CR to 23.910 R00, Transparent 32kbit/s data rate with I.460 rate adaptation. Presented by Juha of Nokia.

RESULT: The document was **AGREED**.

7.1.1.2 Cleanup of RAB parameter setting

N3-000361: CR to 23.910 R99: Cleanup of RAB parameter setting. Presented by Erik of Ericsson.

CONTENT: Reason for Change:

- 1) Upon recommendation from N3 to S2 to keep the streaming traffic class for NT data services (LS N3-000170), S2 has agreed to keep the value range as defined in 23.107, specifying a transfer delay minimum value of 250 ms. (LS answer S2-000995). This minimum value does not match with the currently specified value in table B.1.13.2, specifying < 250 ms. To align 23.107 with 23.910, and further on, to avoid interpretation of 250 ms being a maximum value, it is proposed to remove the inequality sign from the transfer delay value. It is also proposed to remove the inequality sign from the SDU error ratio.
- 2) According to agreed CR N3-000261, SDU sizes for T data need to be aligned accordingly.
- 3) According to agreed CR R3-0001454, a note has been added clarifying the relation between RAB subflow combination bit rates and maximum bit rate values.

DISCUSSION: **Hagiwara-San:** Reports on GSM Association. The 28.8kbit/s has been finalised and the SDU size will be 576bits. The SDU sizes for 32 kbit/s and 33.3kbit/s are soon to be defined also.

The CR was revised in order to updated the SDU size for 28.8kbit/s to 576bits.

It is noted that a R00 CR is also required. This is provided in **0369**.

RESULT: The document was **REVISED to 0368**.

↓ REVISED ↓

N3-000368: Rev. CR to 23.910, R99: Cleanup of RAB parameter setting. Presented by Erik of Ericsson.

DISCUSSION: **Norbert:** concerns were raised (unofficially) at the CN plenary on term 'waiting for decision from GSM Assoc. Hagiwara-San believes that 33.6kbit/s will be decided in the near future and this text may be removed. NTT DoCoMo will prepare a CR when this is resolved.

RESULT: The document was **AGREED**.

↓ RELATED DOCUMENT ↓

N3-000369: CR to 23.910, R00: Cleanup of RAB parameter setting. Presented by Erik of Ericsson.

RESULT: The document was **AGREED**.

N3-000362: **CR to 27.001 R99: Cleanup of RAB parameter setting.** Presented by Erik of Ericsson.

CONTENT: **Reason for Change:**

- 1) *Upon recommendation from N3 to S2 to keep the streaming traffic class for NT data services (LS N3-000170), S2 has agreed to keep the value range as defined in 23.107, specifying a transfer delay minimum value of 250 ms. (LS answer S2-000995). This minimum value does not match with the currently specified value in table B.1.13.2, specifying < 250 ms. To align 23.107 with 27.001, and further on, to avoid interpretation of 250 ms being a maximum value, it is proposed to remove the inequality sign from the transfer delay value. It is also proposed to remove the inequality sign from the SDU error ratio value.*
- 2) *According to agreed CR N3-000261, SDU sizes for T data need to be aligned accordingly.*
- 3) *According to agreed CR R3-0001454, a note has been added clarifying the relation between RAB subflow combination bit rates and maximum bit rate values.*

DISCUSSION: It is noted that a R00 CR is also required. This is provided in **0371**.

RESULT: The document was **REVISED to 0370**.

⇓ **REVISED** ⇓

N3-000370: **Rev. CR to 27.001 R99: Cleanup of RAB parameter setting.** Presented by Erik of Ericsson.

RESULT: The document was **AGREED**.

⇓ **RELATED DOCUMENT** ⇓

N3-000371: **CR to 27.001 R00: Cleanup of RAB parameter setting.** Presented by Erik of Ericsson.

RESULT: The document was **AGREED**.

7.1.1.3 UMTS clean up

N3-000363: **CR to 27.001 R99: UMTS clean up.** Presented by Erik of Ericsson.

CONTENT: **Reason for Change:**

- 1) *Extended BC-IE (containing octets 6d-6g) may be sent by the MS in the CALL CONFIRMED message.*
- 2) *H.223&H245 is also supported in GSM*

DISCUSSION: A mobile terminated call will fail in the case of single numbering when the MSC does not send a BC in the SETUP message to the MS and the MS has to provide the BC in the CALL CONFIRMED message. This BC to be responded must contain some of the octets 6d-6g in UMTS. But according to 27.001 a MS must not respond these octets if they are not offered by the MSC. This rule was established for HSCSD where the MS must not require HSCSD in the case it is not offered by the network.

This CR proposes to remove this rule and allows calls to succeed when the MS sends the 6d-6g octet in the CALL CONFIRM message even they are not offered by the MSC. With this, a MSC that is R98 or earlier, for a R99 mobile station the MSCs' analysis of the BC will result in rejection of the call. **This means they are not backwards compatible.**

As a compromise it was agreed to keep the existing rule for the case a BC is offered by the MSC without octets 6d-6g. The MS may return these octets if no BC is offered by the MSC. However, this solution is still not backwards compatible for the case that a BC is not offered by the MSC but it allows the provision of MT single numbering calls in UMTS.

Addition of a warning in the *reason for change* that single numbering calls will fail if this CR is not approved.

Additional CR requested for R00. This is presented in **0392**

RESULT: The document was **REVISED to 0391**.

⇓ **REVISED** ⇓

N3-000391: **Rev CR to 27.001 R99: UMTS clean up.** Presented by Erik of Ericsson.

CONTENT: **Reason for Change:**

1) *The MS in the CALL CONFIRMED message may send extended BC-IE (containing octets 6d-6g) when no BC-IE is received. This change is needed in order to allow PSTN originated Mobile terminated calls in case of single numbering in UMTS. **Note that this CR introduces a backward compatibility problem.***

2) *H.223&H245 is also supported in GSM*

RESULT: The document was **AGREED**.

⇓ **RELATED DOCUMENT** ⇓

N3-000392: **CR to 27.001 R00: UMTS clean up.** Presented by Erik of Ericsson.

CONTENT: R00 equivalent of the above CR

RESULT: The document was **AGREED**.

7.1.1.4 Correction of RCR transmission from the network to MS

N3-000364: **CR to 27.001 R99 CAT A: RCR is not indicated from the network to the MS.**
Presented by Erik of Ericsson.

CONTENT: **Reason for Change:** *Radio Channel Requirement (RCR) is a BC-IE parameter that is indicated by the MS to the network. The network does not indicate any RCR to the MS.*

DISCUSSION: Corresponding changes also required to earlier versions of the specification. Erik will examine which versions require this change, and produce the required CRs.

During Coffee Norbert made a study of previous versions of 07.01, and he deduces that changes would be required back to phase 2. (07.01 v5.8.0). However, in phase 2 07.01 a note was found that the MS has to ignore the RCR sent by the MSC. This would make the proposed CR unnecessary. But this note has been removed from later releases. The inconsistencies between the specifications has to be investigated more in detail.

This issue will be discussed over the N3 email exploder and will be finalised in the Seattle meeting. The issue must be resolved hard deadline must be before N#9 starting 20th Sept 2000.

RESULT: The document was **POSTPONED until N3#12**.

N3-000365: **CR to 29.007 R00 [CAT A]: RCR is not indicated from the network to the MS.**
Presented by Erik of Ericsson.

CONTENT: Equivalent to the above CR for R00

RESULT: The document was **POSTPONED until N3#12**.

7.1.1.5 RLP Version

N3-000367: **CR to 24.022 R99: Relevance of GSM specific BC-IE parameters for negotiating RLP version in UMTS.** Presented by Erik of Ericsson.

CONTENT: **Reason for Change:** *Certain parameters in the BC-IE are specific to the GSM radio channel. These have no relevance for the UTRAN radio access bearer. However, in order to avoid renegotiating the RLP version during a call in case of handover to GSM, they may be used by the RLP entities to negotiate the proper version. This CR also ensures that version 2 is negotiated when EDGE channels are used.*

RESULT: The document was **AGREED**.

N3-000366: **CR to 27.001 R99: Relevance of GSM specific BC-IE parameters for negotiating RLP version in UMTS.** Presented by Erik of Ericsson.

CONTENT: **Reason for Change:** *Certain parameters in the BC-IE are specific to the GSM radio channel. These have no relevance for the UTRAN radio access bearer. However, in order to avoid renegotiating the RLP version during a call in case of handover to GSM, they may be used by the RLP entities to select the proper version to negotiate*

DISCUSSION: It is noted that a R00 CR is also required. This is provided in **0372**.

RESULT: The document was **AGREED**.

↓ **RELATED DOCUMENT** ↓

N3-000372: **CR to 27.001 R00: Relevance of GSM specific BC-IE parameters for negotiating RLP version in UMTS.** Presented by Erik of Ericsson.

RESULT: The document was **AGREED**.

7.1.2 Call Handling

N3-000292: **Discussion document, Behaviour of HLR in a mobile terminated call.** Presented by Juha of Nokia.

CONTENT: Contains some background material that clarifies the behaviour of the VMSC in a mobile terminated call when the VMSC receives an ISDN BC indicating a speech call.

The we agreed a change in N3#10 with a CR to TS 29.007. However Nokia consider that it does not correct the problem, when the unwanted ISUP interworking takes place in the fixed network, i.e. the GMSC receives an unwanted speech BC in the IAM message from the fixed network. In this case the ISDN BC received by the HLR indicates speech and the BC sent by the HLR to the VLR is a speech BC. Consequently, the BC received by the VMSC from the VLR is a speech BC.

A further change, concerning the behaviour of the HLR, is required in the TS 29.007, reflecting that the HLR must not use the ISDN BC if it indicates speech. This change is presented in **0293**

DISCUSSION: Additional problem with ISDN for the Single numbering case MS does not get service information and may try to set up a data call, when in fact the originator wanted to make a speech call. This CR cannot resolve the above issue.

Clarification: if the ISDN-BC indicates speech the HLR service information shall be used, if the ISDN-BC indicates something else (data) then we take the ISDN BC-IE.

Achim: Stated that most of the speech calls will be sent out without any BC.

It was agreed to postpone this issue so that delegates can examine this solution off-line, and come back to the next meeting with solutions.

RESULT: The document was **POSTPONED to N3#12**.

N3-000293: **CR to 29.007, Behaviour of HLR in a mobile terminated call.** Presented by Juha of Nokia.

CONTENT: **Reason for Change:** *The agreed change in TS 29.007 on the behaviour of the VMSC in an MT call does not correct the "speech vs. data" problem, if the unwanted ISUP interworking takes place in the fixed network, i.e. the GMSC receives an unwanted speech BC in the IAM message from the fixed network. In this case the ISDN BC received by the HLR indicates speech and the BC sent by the HLR to the VLR is a speech BC. Consequently, the BC received by the VMSC from the VLR is a speech BC.*

DISCUSSION: Agreed to be examined off-line and solutions proposed to the next N3 meeting.

RESULT: The document was **POSTPONED to N3#12.**

7.1.3 Multimedia

7.1.3.1 Multimedia 32 kbit/s UDI/RDI

N3-000294: **Discussion document, 32 kbit/s UDI/RDI multimedia.** Presented by Juha of Nokia.

CONTENT: The 32kbit/s rate has been specified for UMTS. The availability of the 32kbit/s UDI/RDI multimedia call is justified also in GSM. The discussion document presents some arguments for this. CN3 is requested to consider the issue and take necessary actions, e.g. liaise with S1 and SMG2 and possibly other relevant groups and refine the related draft CRs.

DISCUSSION: **Erik:** 04.21 and 08.20 should also be considered. Juha noted this action.

N3 agree to the proposal to include 32kbit/s UDI/RDI multimedia call in GSM.

A question raised up whether this work should be done as a new work item or can it be done under TEI? In order to clarify this and indicating the interest in this work as well as outlining the architectural issues, N3 will send a LS to SMG2/GERAN and S1. The LS is contained in **0373**.

Although N3 has agreed to the proposal, it was also agreed to agree to the CRs only to a complete set of CRs. However, the existing CRs were reviewed but agreement is postponed.

RESULT: The document was **NOTED.**

N3-000373: **Draft LS to SA1 and SMG2 / GERAN on 32 kbit/s UDI/RDI multimedia.** Presented by Juha of Nokia.

CONTENT: Contains the LS asking TSG-SA1 and SMG2/GERAN to check the impact of the 32 kbit/s UDI/RDI GSM multimedia on their specifications and evaluate the feasibility of making the required changes.

RESULT: The document was **APPROVED.**

N3-000295: **CR to 29.007 R99, 32 kbit/s UDI/RDI multimedia.** Presented by Juha of Nokia.

CONTENT: **Reason for Change:** *Improvement of intersystem compatibility and GSM efficiency by removing restrictions to use the 32 kbit/s UDI/RDI multimedia in GSM.*

DISCUSSION: **Norbert:** Questioned the limitations implied by Note 21 to table 7a. It was agreed to remove the note 21 as long as the text is present in 27.001. Juha will check this.

The agreement of this CR is postponed to N3#12 meeting, when we should have received responses to the LS.

RESULT: The document was **Postponed to N3#12.**

- N3-000296:** **CR to 27.001 R99: 32 kbit/s UDI/RDI multimedia.** Presented by Juha of Nokia.
- CONTENT:** **Reason for Change:** *Improvement of intersystem compatibility and GSM efficiency by removing restrictions to use the 32 kbit/s UDI/RDI multimedia in GSM.*
- The agreement of this CR is postponed to N3#12 meeting, when we should have received responses to the LS.
- DISCUSSION:** Some issues with usage of channel coding. Erik suggests addition of text to B5a to show the dependencies and add 32 kbit/s. Norbert stated that the diagrams should also be updated to show this information.
- Add UR to Multimedia. Correct line 32kbit/s in Table B.5a
- RESULT:** The document was **Postponed to N3#12.**
-
- N3-000297:** **CR to 22.022 kbit/s UDI/RDI multimedia.** Presented by Juha of Nokia.
- CONTENT:** **Reason for Change:** *Improvement of intersystem compatibility and GSM efficiency by removing restrictions to use the 32 kbit/s UDI/RDI multimedia in GSM.*
- Document was presented for information only.
- The agreement of this CR is postponed to N3#12 meeting, when we should have received responses to the LS.
- RESULT:** The document was **NOTED.**
-
- N3-000298:** **CR to 24.008 32 kbit/s UDI/RDI multimedia.** Presented by Juha of Nokia.
- CONTENT:** **Reason for Change:** *Improvement of intersystem compatibility and GSM efficiency by removing restrictions to use the 32 kbit/s UDI/RDI multimedia in GSM.*
- DISCUSSION:** Agreed not to inform N1 before N3 have received the answer to the LS from SA1.
- Document was presented for information only.
- RESULT:** The document was **NOTED.**
-
- N3-000299:** **CR to 08.08 32 kbit/s UDI/RDI multimedia.** Presented by Juha of Nokia.
- CONTENT:** **Reason for Change:** *Improvement of intersystem compatibility and GSM efficiency by removing restrictions to use the 32 kbit/s UDI/RDI multimedia in GSM*
- The CR modifies the channel type for transparent, and adds a new code point for 32kbit/s for bit transparent.
- DISCUSSION:** The CR was produced by the Nokia SMG2 experts. It is presented to N3 for information only. It will be presented by Nokia directly to the next GERAN meeting.
- Achim** suggests that a related change is required to 03.10. Juha will check this before the next meeting.
- Document was presented for information only.
- RESULT:** The document was **NOTED.**

7.1.3.2 Multimedia 33.6 kbit/s Audio

- N3-000307:** **Discussion document, 3.1 kHz multimedia calls at 33.6 kbit/s data rate.** Presented by Juha of Nokia.
- CONTENT:** The usability of the 3.1 kHz multimedia service at 33.6 kbit/s user rate, as currently specified, is poor. The usability can be improved with simple corrective measures. Two alternative ways are described in this document. The described solution would cause slight changes in TSs 24.008, 22.002, 27.001 and 29.007 and in TR 23.910.
- DISCUSSION:** **Achim:** Question to the modify procedure – does it always produce an immediate change to the radio interface.
- Presently this is done with the assign request procedure to the BSS. The modify procedure will result in the establishment of a new user rate and possibly new channel coding.
- The document proposes two solutions. **Juha** mentions that there is little difference. The second solution is more harmonized, although it does require more text. **Juha** prefers the second solution.
- Achim:** Possible 3rd solution, not to consider 31.2 kbit/s and simply default to 28.8 kbit/s. **Juha** replied that he had considered this, but it is not possible with 'standard' modems where you can only specify upper/lower limits.
- Erik** – the solution should not be too restricted to V.34, considering that there are new modem types with a symmetric operation on the horizon. **Juha** clarified that the proposed solution is not considered as restrictive.
- The concept is not finally agreed by CN3.
- The CRs are presented below.
- RESULT:** The document was **DISCUSSED**.
- N3-000338:** **CR to 29.007R99, 3.1 kHz multimedia calls at 33.6 kbit/s data rate.** Presented by Juha of Nokia.
- CONTENT:** **Reason for Change:** *Improvement of the usability of 33.6 kbit/s multimedia service.*
- DISCUSSION:** **Achim:** we should clarify that this is H.324M flag stuffing. Noted by Juha.
- Erik:** Modify procedure is usually used to change channel. Here we use it to change the data rate on the same channel. **Juha** clarified that the modification of parameters is a standard procedure in 24.008.
- Due to these concerns N3 will seek guidance from N1 who are responsible for the Modify procedure.
- The CR is CAT A, however Reason for change is not complete enough *Improvement of the usability*. Norbert requested stronger text for presentation to the Plenary.
- This is covered in a LS to N1 in **0375**.
- RESULT:** The document was **POSTPONED until N3#12**.
- N3-000339:** **CR to 27.001 R99, 3.1 kHz multimedia calls at 33.6 kbit/s data rate.** Presented by Juha of Nokia.
- CONTENT:** **Reason for Change:** *Improvement of the usability of 33.6 kbit/s multimedia service.*
- DISCUSSION:** The term flag stuffing will be clarified as being H.324M flag stuffing.
- Also a stronger wording for the reason for change will be employed.
- 8.3.3.1 – we need to introduce the MODIFY REJECT response.
- RESULT:** The document was **POSTPONED until N3#12**.

N3-000340: **CR to 23.910 R99, 3.1 kHz multimedia calls at 33.6 kbit/s data rate.** Presented by Juha of Nokia.

CONTENT: **Reason for Change:** *Improvement of the usability of 33.6 kbit/s multimedia service.*

DISCUSSION: Stronger wording for the reason for change will be employed.

Erik suggested changing Data rates to FNUR for additional clarity.

Text to 5.1.1 to be added as a **NOTE**.

Change term 'can' to 'may' – Juha will check the Drafting Rules for the correct terminology throughout the Nokia CRs before they are presented again.

RESULT: The document was **POSTPONED until N3#12**.

N3-000341: **CR to 24.008 R99, 3.1 kHz multimedia calls at 33.6 kbit/s data rate.** Presented by Juha of Nokia.

CONTENT: **Reason for Change:** *Improvement of the usability of 33.6 kbit/s multimedia service.*

DISCUSSION: Just for information to N3.

New code point required for the FNUR 31.2 kbit/s Recommendation V.34 – shown in table 10.5.112.

RESULT: The document was **NOTED**.

N3-000342: **Very Draft CR to 22.002, 3.1 kHz multimedia calls at 33.6 kbit/s data rate.** Presented by Juha of Nokia.

CONTENT: **Reason for Change:** *Improvement of the usability of 33.6 kbit/s multimedia service.*

DISCUSSION: Juha is not convinced this modification is required to 22.022, but the CR is provided to N3 for their information.

Achim thinks this change is not required. Only FNUR at set-up should be listed similar to non transparent. **Erik** supported this view.

As N3 consider there is no change required to 22.022, no LS will be sent to S1 on this subject.

RESULT: The document was **NOTED**.

N3-000375: **LS to N1 on 3.1 kHz multimedia calls at 33.6 kbit/s data rate.** Presented by Juha of Nokia.

CONTENT: In this LS, N3 ask N1 to verify the usability of the MODIFY procedure for changing the radio interface user rate, and also check the impact of the solution on TS 24.008 and to evaluate the feasibility of introducing the required changes as corrections in R99 rather than as a new feature or function in R00.

DISCUSSION: N3 have not yet agreed on this procedure, and the LS does not mention this. Suggested wording to reflect the fact that N3 has not yet finalised the choice of such a solution.

Also some textual modifications were made to type errors.

RESULT: The document was **REVISED to 0389**.

⇓ **REVISED** ⇓

N3-000389: **Rev. LS to N1 on 3.1 kHz multimedia calls at 33.6 kbit/s data rate.** Presented by Juha of Nokia.

RESULT: The document was **APPROVED**.

7.1.3.3 Use of LLC and BC for Multimedia

N3-000348: CR 29.007 R99: Correction of the use of BC and LLC for multimedia service.
Presented by Igarashi-San of NTT DoCoMo.

CONTENT: Reason for Change:

- (1) *It should be clarified that "H.223 and H.245" UIL1P that contained in the LLC IE shall be used to make the PLMN BC IE if the ISDN BC IE does not contain "H.223 and H.245" UIL1P in the mobile terminating call.*
- (2) *Any transit networks dose not support "H.223 and H.245" code point, because "H.223 and H.245" code point is defined in ITU-T Q.931 that is defined in 1998. So, it should be allowed that "H.223 and H.245" UIL1P in the PLMN BC IE is not mapped to the UIL1P in the ISDN BC IE. Additionally, it should be allowed that the network insert the "H.223 and H.245" LLC IE when the network dose not map "H.223 and H.245" UIL1P in the PLMN BC IE to the UIL1P in the ISDN.*
- (3) *It should be allowed that the LLC IE with "H.223 and H.245" and the ISDN BC IE with "32kbit/s" User Rate and "V.110, I.460/X.30" UIL1P are used in order to describe 32kbit/s UDI multimedia service. Therefore, the mapping between the "32kbit/s UDI multimedia service" PLMN BC IE and the above mentioned compatibility information is added to mapping functions*

DISCUSSION: Juha: why not indicate the Multimedia in **BOTH** the BC-IE or in the LLC?

Achim: for Mobile originated calls have to include the LLC (as defined in 27.001).

Juha: we must clearly specify that the MS send the LLC. This needs to be examined.

Change to Note 26 is not agreed by N3.

Juha: is not convinced the ISDN extension should reject the call if there are unknown parameters.

Norbert: Note 30 is a special case of note 29 and can be combined into a single note.

This topic needs more investigation and NTT DoCoMo are to provide additional information.

RESULT: The document was **POSTPONED to N3#12.**

7.1.4 GPRS

N3-000306: CR to 29.061 R99 GPRS Mobile IP interworking. Presented by Achim of Alcatel.

CONTENT: Reason for change: *This CR provides some clarifications/corrections on the PDP activation procedure when using MobileIPv4. Clarifications on the PPP connection phase is added to ensure consistency with other section of the specification (i.e. non-transparent access).*

DISCUSSION: Claire: question to figure 11e. If there is no PPP Authentication, how do we do RADIUS Authentication. Achim needs to check this with the author of the CR.

Achim checked with the author of the CR. The RADIUS server is in the home network and the authentication is on TI and home network in the MIP procedure. Hence no PPP authentication is required.

Addition of the term 'example of a signalling scheme' was added to the title of figure 11e. The value of an example in a specification was questioned. It was mentioned that this specification contains many examples that provide clarification.

RESULT: The document was **REVISED to 0393.**

⇓ **REVISED** ⇓

N3-000393: Rev. CR to 29.061 R99 GPRS Mobile IP interworking. Presented by Achim of Alcatel.

DISCUSSION: Delete send - send. Modify WI GPRS to TEI, and change Reason for change.

RESULT: The document was **REVISED to 0394.**

↓ REVISED ↓

N3-000394: Rev. CR to 29.061 R99 GPRS Mobile IP interworking. Presented by Achim of Alcatel.

RESULT: The document was **AGREED**

N3-000382: Discussion document PDP Context Deactivation due to DHCP renewal procedure.
Presented by Claire of France Telecom.

CONTENT: This document is aimed to open a discussion on the different ways to deactivate the PDP Context in this particular case and to identify the impacts. Proposes two solutions and Claire hopes that the discussion will result in the final choice of a single solution.

DISCUSSION: In this document Claire proposes two solutions to the deactivation of the PDP Context. Achim mentioned that this was already discussed in the N3 meeting in Berlin, and it was agreed that the 2nd solution could not be used. because the GGSN extra workload will decrease significantly the GGSN performance

Lucy: it is not advisable to use non standard ITU-T protocols, as this may lead to compatibility problems.

The document generated a lot of discussion, but a solution could not be reached. It was proposed to study the RFCs, and further discuss a final solution via the email exploder. Lucy will drive the email discussion.

This issue will be resolved in the Seattle meeting. At this time N3 will liase with T2 and S2 to inform them of the topic.

RESULT: The document was **DISCUSSED.**

N3-000351: CR 29.061 R99: DHCP. Presented by Achim of Alcatel.

CONTENT: Reason for change: *Clarifications needed on the lease time configuration and the behaviour when the lease expires.*

DISCUSSION: Already discussed via e-mail, and comments are incorporated in this CR from Alcatel.

Lucy: commented that DHCP works only with the IP. Erik clarified that Packet domain in this context refers to one of the 3GPP domains, and the text in the CR is correct.

The term SHALL cannot be introduced into the last paragraph of the change because defining DHCP is outside of the scope of 23.910.

Norbert: reason for change is not strong enough to classify this CR as a correction for the CN plenary. **Erik** proposed some text that was incorporated into the revised version.

Subject: modified to 'Implications of DHCP lease renewal process'

New text 'procedures starting with PDP context activation' added to text.

Erik this CR makes changes to the MS, and a corresponding CR is therefore required to 27.060. Achim will check this, and the decision on this CR is postponed until we have this information.

The corresponding R00 CR is presented in **0379**

RESULT: The document was **REVISED to 0378.**

↓ REVISED ↓

N3-000378: Rev CR 29.061 R99: DHCP. Presented by Achim of Alcatel.

RESULT: The document was **Postponed to N3#12.**

N3-000379: CR to 27.060 R99. Implications of DHCP lease renewal process . Presented by Achim of Alcatel.

Discussion: Due to the discussion on DHCP, it was decided to postpone this issue and this CR.

RESULT: The document was **Postponed to N3#12.**

8 Release 2000:

8.1 CS Multimedia Swap and Fallback

No input in this meeting.

8.2 RT Facsimile

8.2.1 Deletion of UMTS NT-RT FAX from R'99

N3-000300: CR to 29.007 R99, Deletion of UMTS NT-RT FAX from R'99. Presented by Hagiwara-San of NTT DoCoMo.

CONTENT: Reason for change: As above,

DISCUSSION: Cat. change A to F.

RESULT: The document was **AGREED**.

N3-000302: CR to 23.910, Deletion of UMTS NT-RT FAX from R'99. Presented by Hagiwara-San of NTT DoCoMo.

CONTENT: Reason for change: As above,

DISCUSSION: Cat. change A to F.

Delegates should note the requirement to remove error messages in the headers of future CRs.

RESULT: The document was **AGREED**.

N3-000303: CR to 27.001, Deletion of UMTS NT-RT FAX from R'99. Presented by Hagiwara-San of NTT DoCoMo.

CONTENT: Reason for change: As above,

DISCUSSION: Cat. change A to F.

RESULT: The document was **AGREED**.

N3-000327: CR to 27.002, Deletion of UMTS NT-RT FAX from R'99. Presented by Hagiwara-San of NTT DoCoMo.

CONTENT: Reason for change: As above,

DISCUSSION: Cat. change A to F.

RESULT: The document was **AGREED**.

N3-000328: CR to 27.003, Deletion of UMTS NT-RT FAX from R'99. Presented by Hagiwara-San of NTT DoCoMo.

CONTENT: Reason for change: As above,

DISCUSSION: Erik: This CR is not required against 27.003

Rune: CR 002 to 27.003 introduces NT Faxes. There may be other such cases in all the N3 specifications that need to be identified and possibly removed.

Hagiwara-San: The existing CRs have been considered, although it is difficult to remove ALL changes to give an understandable text in the specifications.

Delegates are invited to examine the text of our specifications to ensure that references to 3GPP fax have been removed.

RESULT: The document was **WITHDRAWN**.

8.2.2 Corrections for UMTS NT-RT FAX for R'00

N3-000329: CR to 29.007, Correction of incomplete part related to introduction of UMTS NT-RT FAX. Presented by Hagiwara-San of NTT DoCoMo.

CONTENT: Corrects an incomplete part in 10.3.1 related to the introduction of UMTS NT-RT FAX

DISCUSSION: ME is not effected.

RESULT: The document was **AGREED**.

N3-000304: CR to 23.146 R00, Correction to SDL diagrams. Presented by Hagiwara-San of NTT DoCoMo.

CONTENT: Reason for Change: *Editorial modification and correction of SDL diagrams*

DISCUSSION: Revised to include all SDL source files. Change to cover page, and category.

RESULT: The document was **REVISED to 0380**.

↓ **REVISED** ↓

N3-000380: Rev CR to 23.146 R00, Correction to SDL diagrams. Presented by Hagiwara-San of NTT DoCoMo.

CONTENT: In addition to the CR the zip file contains SDL source files. **The specification on the server shall include the SDL source files.**

RESULT: The document was **AGREED**.

N3-000301: CR to 23.146 R00, Modification from V.25bis to V.250 . Presented by Miura-San of NTT DoCoMo.

CONTENT: Reason for Change: *V.25bis is outdated. References to V.25bis procedures need to be replaced by corresponding procedures based on V.250 and 3G TS 27.007.*

DISCUSSION: **Rune:** The deletion of V.25bis has not been reflected in the reference section.

Norbert: V.25bis has only been removed on the interface between the MT and FA. Is it still required for the interface between the IWF and the remote network for call set-up? The answer said that this is no more required and therefore the reference can be removed from 23.146.

An additional change is required to remove the V.25bis reference

This CR also deletes the Data Call Direction content. However as the calling and called packets are NOT the same, we have non-symmetric messages. For FAX polling the signalling is reversed, and the IWF resolves this using the DCD. However, the DCD is no more required because the CED and CNG messages come from the MS whereas in GSM the MODIFY message was the only indication for switching from speech to fax and the IWF had to create the CED and CNG tones depending on call set-up direction and DCD indication.

- Requirement to change CCITT to ITU-T throughout the document.

- Add reference for V250

- Also the synchronization phase before call set up must be removed.

- Modification to front sheet – clauses affected should include annex C. Rewording of the Reason for change and subject to reflect the above changes.

Some comments from Daisuke Lucent on AT commands – this needs to be checked and a proposal will be made to the next meeting if necessary.

RESULT: The document was **REVISED to 0381**.

↓ **REVISED** ↓

N3-000381: **Rev. CR to 23.146 R00, Modification from V.25bis to V.250 .** Presented by Miura-San of NTT DoCoMo.

RESULT: The document was **AGREED**.

N3-000326: **CR to 27.001 R00, Modification from V.25bis to V.250.** Presented by Hagiwara-San of NTT DoCoMo.

CONTENT: **Reason for Change:** *V.25bis is outdated. References to V.25bis procedures need to be replaced by corresponding procedures based on V.250 and 3G TS 27.007.*

DISCUSSION: NTT DoCoMo do not consider that corresponding CRs are required against 27.002 and 27.003 for UMTS.

Norbert: There is a requirement for replace V25bis for GSM data services. **Erik** proposes to present this to N3#12.

The CR was agreed in principle. It was agreed to combine the DoCoMo CR into the Ericsson CR, that will presented to N3#12.

RESULT: The document was **POSTPONED to N3#12**.

8.3 Service Modification without pre-notification

N3-000322: **Combined Work Item Sheet for Service Modification without pre-notification.** Presented by Yahagi-San of NEC.

CONTENT: Two WI sheets were presented to the joint CN/S2 meeting, one for audio and one for UDI/Audio using BICC. It was agreed to combine the two WI sheets into one. This was done by Norbert in agreement with the WI author.

This merged W.I sheet was presented to the CN plenary along with the original separate WI sheets. CN Plenary agreed to use a single work item making the changes that are shown in document 0322. This merged work item for Service Modification without pre-notification was **AGREED** by CN plenary #8.

DISCUSSION: The document was cleaned to remove all revision marks and provide the final Work Item sheet on which future work shall be based.

RESULT: The document was **REVISED to 0388**.

⇓ **REVISED** ⇓

N3-000388: **Rev. Combined Work Item Sheet for Service Modification without pre-notification.**

RESULT: The document was **AGREED by N3, although it has already been agreed by CN plenary [with revision marks]**.

N3-000349: **BC IE parameter negotiation during the call.** Presented by Yahagi-San of NEC.

CONTENT: Contains a discussion document that presents BC IE negotiation procedure on Service Modification without pre-notification.

One of the BC IE negotiation procedures was also submitted into N1 due to the fact that this procedure is out of scope of N3.

N1 suggested keeping the procedure in the same way as in GSM messages, to prevent adding a new message if the same principle applies here.

This procedure had been introduced to negotiate BC IE between requesting node and requested node. The signalling sequence is proposed in this paper.

DISCUSSION: N3 prefer a solution similar to that used in GSM, as an existing message is re-used.

N3 will await a decision from N1.

RESULT: The document was **NOTED**.

8.4 Text telephony

N3-000323: WI: Global Text Telephony. Presented by Norbert the N3 chairman.

CONTENT: Contains the WI produced by SA2 on Global Text Telephony. The originator of the WI is Ericsson. It should be noted that this is a FEATURE.

Deaf, hard-of-hearing and speech-impaired persons use specific "Text Telephone" equipment in the fixed network since many years to transmit text and speech through ordinary speech traffic channels. The US government in form of the FCC requires an urgent solution for all emergency (911) calls for one specific text telephone version ("Baudot"). The proposed work item shall address these FCC requirements quickly, but shall result in a global solution for all text telephony systems world wide, including support for multimedia calls with text.

DISCUSSION: Modifications to V.18 modems will result in 29.007 and 27.001 also being affected.

Erik mentioned that draft versions of Stage 1 and 2 specifications are available, and will be discussed in the next S1 meeting. N3 will study these documents as a basis for N3s' future work in this area.

Erik will provide the latest versions of 22.226 and 23.226 to the CN3#12 meeting.

FCC requirements require Baudot coding, and this is considered as URGENT. **Erik will provide the relevant parts of the FCC requirement by mail.**

Delegates are invited to study the requirements for Text Telephony in their own countries, (EU/Japan, other).

RESULT: The document was **NOTED**.

8.5 Interworking between IM Subsystems and CS

N3-000374: Discussion document on IM domain Interworking. Presented by Kevin of BT.

CONTENT: Explains some of the issues that need to be examined by N3 for IM domain interworking, and proposes a time schedule to ensure this is complete for R00.

The initial output of this work will be a TR which will identify the interworking principles and the areas where change requests or new Technical Specifications are needed. CRs and new specifications should be presented to CN plenary #11 in March 2001 to ensure that they are incorporated in Release 00.

DISCUSSION: Juha: Interworking between CS Multimedia services and IM domain needs to be included in the scope of these work items. This must be added to the work item sheets.

The document states that it is quite late for CN3 to start for R00. **Norbert** mentioned that for R00 the S1 requirements for this work are not yet approved by SA, and that we are still in the process of handing over the work to CN from SA1 and SA2. Also, the responsibilities of some components (such as CSCF) have not yet been finally agreed. Work in N3 is dependant on input from many other groups.

Lucy: Layer 3 transport protocols must also be addressed. **Norbert:** modifications of layer 3 protocols is the responsibility of N4. N3 may be responsible of the mapping of layer 3 protocols to the fixed network.

RESULT: The document was **NOTED**.

N3-000324: Draft WI: Interworking between Multimedia Domain & Legacy Networks. Presented by Kevin of BT.

CONTENT: Draft work item sheet for Interworking between Multimedia Domain & Legacy Networks that has already presented to the joint CN/S2 meeting and the TSG_N.

DISCUSSION: UMTS CS network cannot be considered as a legacy network, and the WI title will be modified to reflect interworking with UMTS CS networks. The term legacy will be replaced with CS throughout the document. The term IM subsystem of the PS domain should be used.

SA4 are affected because there is a requirement for the mapping of Codecs in the MGW.

Technical requirements only should be identified in the title of the WI and TS in table 10. The title of the TR will be modified to Technical requirements for CS interworking

TR 23.821 will be split into CRs to various other specifications, and N3 may not need to modify this TR. The reference was however left in the table.

Kevin Bye, BT agreed to be rapporteur.

Nokia, Motorola and Alcatel agreed to be supporting companies.

Kevin will check the project plan to ensure building blocks are up to date.

RESULT: The document was **REVISED to 0383**.

⇓ **REVISED** ⇓

N3-000383: **Rev. WI Technical requirements for Interworking between multimedia domain and circuit switched networks..** Presented by Kevin of BT.

CONTENT: Contains the revisions requested to 0324.

DISCUSSION: Modifications to the titles of the TR, TS and the Work Item.

Add the terms 'IM domain of the UMTS network' and circuit switched' to the objectives.

RESULT: The document was **REVISED to 0387**.

⇓ **REVISED** ⇓

N3-000387: **Rev. WI Technical requirements for Interworking between multimedia domain and circuit switched networks.** Presented by Kevin of BT.

RESULT: The document was **AGREED**.

8.6 Interworking between IM Subsystems with IP

N3-000325: **WI: Interworking between Multimedia Domain & IP Networks.** Presented by Kevin of BT.

CONTENT: Draft work item sheet for Interworking between Multimedia Domain & IP networks that has already presented to the joint CN/S2 meeting and the TSG_N.

DISCUSSION: Modification to the title of the TR – technical requirements for IP interworking. Kevin mentioned that this may be combined into one TR with the WI for Multimedia Domain & Legacy Networks.

Related work items End to End QoS in packet domain, and Security. Juha suggested there may be some overlap.

Agreed to remove UE and various TE types from the objectives section.

Kevin Bye, BT agreed to be rapporteur.

Motorola agreed to be supporting company.

RESULT: The document was **REVISED to 0384**.

⇓ **REVISED** ⇓

N3-000384: **Rev. WI: Technical Requirements for Interworking between multimedia domain and IP networks.** Presented by Kevin of BT.

DISCUSSION: Change to the Title of the Work Item and some minor modifications to the text.

N3 will discuss via E-mail inclusion of Security as related work item.

RESULT: The document was **REVISED to 0385.**

↓ **REVISED** ↓

N3-000385: **Rev. WI: Technical Requirements for Interworking between multimedia domain and IP networks.** Presented by Kevin of BT.

DISCUSSION: Requires two more supporting companies and delegates are requested to check with their companies on this issue.

RESULT: The document was **AGREED.**

8.7 Other Work Items

N3-000344: **WI: Enable bearer independent circuit-switched network architecture.** Presented by Norbert, N3 chairman.

CONTENT: Contains the draft WI from S2 for Enable bearer independent circuit-switched network architecture. This is a WI for a FEATURE.

The objective of the work item is to evolve the R99 circuit switched domain (CS domain), so that it is transport network independent to allow the use of different transport resources (ATM, IP, STM).

DISCUSSION: **Note:** The stage 2 work is planned for finalisation in November 2000.

It has to be clarified whether this WI should cover only SA2's work or also CN work.

Norbert will contact the CN WGx chairs, and the WI rapporteur regarding the WI description work split.

Note during reporting: There is already a CN4 work item proposed to next CN4 meeting covering the CN3 and CN4 work.

RESULT: The document was **NOTED.**

N3-000345: **WI: Architecture for Call control and roaming to support IP-based multimedia services in UMTS.** Presented by Norbert, N3 chairman.

CONTENT: Contains the draft WI from S2 for Architecture for Call control and roaming to support IP-based multimedia services in UMTS. This is a WI for a BUILDING BLOCK.

The objective is to define a new network subsystem (defined in S2 as IP Multimedia CN subsystem), which comprises all CN elements for provision of IP Multimedia services. This enables new services with multiple media components per call based on non-UMTS IP multimedia call control standards (e.g. H.323, SIP). Also, services comparable to that of the CS domain can be offered

DISCUSSION: This S2 WI links to the N3 work item agreed in document **0385 and 0387.**

RESULT: The document was **NOTED.**

N3-000346: **WI: Support of IP multimedia services.** Presented by Norbert, N3 chairman.

CONTENT: Contains the draft WI from S1 for Enable bearer independent circuit-switched network architecture. This is a WI for a FEATURE.

The objective is to define concepts regarding general service requirements and service features for Release 2000, consisting of an evolved Release 99, and IM (IP Multimedia) services. IP multimedia services shall support multiple media components per call based on existing multimedia call control standards.

DISCUSSION: N3 shall consider this work item, especially the output (TRs), along with that provided by S2.

The latest versions of these TRs will be presented to N3#12.

N3 need to reference these WI in the interworking related work items. This will be done at the next meeting.

RESULT: The document was **NOTED**.

9 Output of CN3#11 Meeting

9.1 Work Items

The following new Work items were agreed by N3 to be sent to the next TSG_N plenary for Approval:

DOC N3-00	Subject	Release	1 st Respo.	2 nd Respo.	Delivery
387	Technical requirements for Interworking between multimedia domain and circuit switched networks	R00	N3		03-2001
385	Technical Requirements for Interworking between multimedia domain and IP networks	R00	N3		03-2001

9.2 Liaison Statements

The following Liaison Statements were agreed to be sent by N3:

DOC N3-00	Subject	To	Cc	Attachment	Sent
373	32 kbit/s UDI/RDI multimedia	SA1 SMG2/GERAN		none	17 th July 2000
389	3.1 kHz multimedia calls at 33.6 kbit/s data rate	N1			17 th July 2000
390	Specifying luUP PDU Type in 3G TS 26.102	R3	S4	none	17 th July 2000

9.3 Change Requests

The following CRs were agreed by N3 to be sent to the next TSG CN Plenary for approval:-

TDoc #	Spec	CR #	Rel	Tdoc Title	CAT	C_Version	WI
N3-000300	29.007		R99	Deletion of UMTS NT-RT FAX from R'99	F	3.5.0	T.E.I
N3-000302	23.910		R99	Deletion of UMTS NT-RT FAX from R'99	F	3.1.0	T.E.I
N3-000303	27.001		R99	Deletion of UMTS NT-RT FAX from R'99	F	3.5.0	Facsimile
N3-000327	27.002		R99	Deletion of UMTS NT-RT FAX from R'99	F	3.4.0	TEI
N3-000329	29.007		R00	Correction of incomplete part related to introduction of UMTS NT-RT FAX	F	3.5.0	Facsimile
N3-000356	29.007		R99	Transparent 32kbit/s data rate with I.460 rate adaptation	F	3.5.0	T.E.I
N3-000357	29.007		R00	Transparent 32kbit/s data rate with I.460 rate adaptation	A	3.5.0	T.E.I
N3-000358	23.910		R99	Transparent 32kbit/s data rate with I.460 rate adaptation	F	3.1.0	T.E.I
N3-000359	23.910		R00	Transparent 32kbit/s data rate with I.460 rate adaptation	A	3.1.0	T.E.I
N3-000366	27.001		R99	Relevance of GSM specific BC-IE parameters for negotiating RLP version in UMTS	F	3.5.0	T.E.I
N3-000367	24.022		R99	Relevance of GSM specific BC-IE parameters for negotiating RLP version in UMTS	F	3.3.0	T.E.I
N3-000368	23.910		R99	Cleanup of RAB parameter setting	F	3.1.0	T.E.I
N3-000369	23.910		R00	Cleanup of RAB parameter setting	A	3.1.0	T.E.I
N3-000370	27.001		R99	Cleanup of RAB parameter setting	F	3.5.0	T.E.I
N3-000371	27.001		R00	Cleanup of RAB parameter setting	A	3.5.0	T.E.I
N3-000372	27.001		R00	Relevance of GSM specific BC-IE parameters for negotiating RLP version in UMTS	A	3.5.0	T.E.I
N3-000380	23.146		R00	Correction of SDL Diagrams	F	4.0.0	Facsimile
N3-000381	23.146		R00	Modification from V.25bis to V.250		4.0.0	Facsimile

TDoc #	Spec	CR #	Rel	Tdoc Title	CAT	C_Version	WI
N3-000391	27.001		R99	UMTS clean-up	F	3.5.0	T.E.I
N3-000392	27.001		R00	UMTS clean-up	A	3.5.0	T.E.I
N3-000394	29.061		R99	GPRS Mobile IP interworking	F	3.3.0	TEI

9.4 New TRs / TSs

None.

9.5 Other

DOC N3-00	Type	Numb	Version	Title
352	ToR			DRAFT ToR for TSG CN WG3
353	Dates			CN3 meeting dates for 2001

10 Any other business

There was no other business raised at this point.

11. Close of meeting

The CN3 chairman closed the meeting on Thursday 13th July at 18:30.

Norbert thanked the host for the excellent meeting location and arrangements. He also thanked all of the N3 delegates and David the N3 MCC support who have actively participated in the meeting.

Annex A: <PS SWG Report>

None in this Meeting.

Annex B: List of N3 Meeting Participants

The following delegates attended the CN3#11 meeting.

First Name	Last Name	Company	Status	Telephone	email
Juha	Rasanen	Nokia Corporation	3GPPMEMBER - ETSI	+358 40 543 9058	juha.a.rasanen@nokia.com
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Annex C: List of documents

Full details can be found in the file [CN3#11-Tdoclist](#) on the meeting server.

TDoc #	Tdoc Title	Type	Spec	Rel	Status
N3-000281	Draft Agenda for CN3_11	AGENDA			Approved
N3-000282	Brief notice from CN#8 plenary relevant for CN3	e-mail			Noted
N3-000283	Draft Meeting report CN3#10 Hawaii	REPORT			Approved
N3-000284	Terms of Reference	ToR			Revised to 0352
N3-000285	3GPP Project Plan for R00 v.1.3	Project Plan			Discussed
N3-000286	New Homes for old Specifications	Discussion document			Discussed
N3-000287	Security Work Plan Vers. 0.0.4	Work Plan			Discussed
N3-000288	List of IGCs and contact person	List			Discussed
N3-000289	Transparent 32kbit/s data rate with 1.460 rate adaptation",	Discussion document			Discussed
N3-000290	"Transparent 32kbit/s data rate with 1.460 rate adaptation"	CR	29.007	R99	Revised to 0356
N3-000291	Transparent 32kbit/s data rate with 1.460 rate adaptation"	CR	23.910	R99	Revised to 0358
N3-000292	Behavior of HLR in a mobile terminated call	Discussion document			Postponed to N3#12
N3-000293	Behavior of HLR in a mobile terminated call	CR	29.007	R99	Postponed to N3#12
N3-000294	32 kbit/s UDI/RDI multimedia	Discussion document			Noted
N3-000295	32 kbit/s UDI/RDI multimedia	CR	29.007	R99	Postponed to N3#12
N3-000296	32 kbit/s UDI/RDI multimedia	CR	27.001	R99	Postponed to N3#12
N3-000297	32 kbit/s UDI/RDI multimedia	[CR]	22.022		Noted
N3-000298	32 kbit/s UDI/RDI multimedia	[CR]	24.008		Noted
N3-000299	32 kbit/s UDI/RDI multimedia	[CR]	08.08		Noted
N3-000300	Deletion of UMTS NT-RT FAX from R'99	CR	29.007	R99	Agreed
N3-000301	Modification from V.25bis to V.250	CR	23.146	R00	Revised to 0381
N3-000302	Deletion of UMTS NT-RT FAX from R'99	CR	23.910	R99	Agreed
N3-000303	Deletion of UMTS NT-RT FAX from R'99	CR	27.001	R99	Agreed
N3-000304	Correction of SDL Diagrams	CR	23.146	R00	Revised to 0380
N3-000305	Interworking with DHCP	CR	29.061	R99	Withdrawn
N3-000306	GPRS Mobile IP interworking	CR	29.061	R99	Revised to 0393
N3-000307	3.1 kHz multimedia calls at 33.6 kbit/s data rate	Discussion document			Discussed
N3-000308	3GPP Calendar of meetings	Calendar			Noted
N3-000309	Proposals for procedures related to transfer of GSM specifications to 3GPP	REPORT			Noted
N3-000310	CR 22.002 on lower user rates	[CR]	22.002		Noted
N3-000311	CR 22.060 on X.25 / IHOSS	[CR]	22.060		Noted
N3-000312	CR 21.905 on 3G vocabulary	[CR]	21.905		Noted
N3-000313	TR 21.901 v 4.0.0: Drafting Rules	TR			Noted

TDoc #	Tdoc Title	Type	Spec	Rel	Status
N3-000314	3GPP Specifications Status List at end of TSG#8	REPORT			Noted
N3-000315	CR 21.900 on specification and work item handling	[CR]	21.900		Noted
N3-000316	Status Report of CN3 to CN#8	REPORT			Noted
N3-000317	Report of CN#8	REPORT			Noted
N3-000318	CN Status Summary Presentation	REPORT			Noted
N3-000319	CN Status Report	REPORT			Withdrawn
N3-000320	N3 Meeting Dates 2000	Discussion document			Noted
N3-000321	N3 Meeting Dates 2001	Discussion document			Revised to 0353
N3-000322	WI: Service Modification without Pre-notification	W.I SHEET			Revised to 0388
N3-000323	WI: Global Text Telephony	W.I SHEET			Noted
N3-000324	WI: Interworking between Multimedia Domain & Legacy Networks	W.I SHEET			Revised to 0383
N3-000325	WI: Interworking between Multimedia Domain & IP Networks	W.I SHEET			Revised to 0384
N3-000326	Modification from V.25bis to V.250	CR	27.001	R99	Postponed to N3#12
N3-000327	Deletion of UMTS NT-RT FAX from R'99	CR	27.002	R99	Agreed
N3-000328	Deletion of UMTS NT-RT FAX from R'99	CR	27.003	R99	Withdrawn
N3-000329	Correction of incomplete part related to introduction of UMTS	CR	29.007	R00	Agreed
N3-000330	Clarification on Transfer Delay value for the streaming class	LS IN			Noted
N3-000331	Cleanup of RAB parameter setting	CR	23.910	R99	Withdrawn
N3-000332	Cleanup of RAB parameter setting	CR	27.001	R99	Withdrawn
N3-000333	UMTS clean-up	CR	27.001	R99	Withdrawn
N3-000334	RCR is not indicated from the network to the MS	CR	29.007	R99	Withdrawn
N3-000335	RCR is not indicated from the network to the MS	CR	27.001	R99	Withdrawn
N3-000336	Relevance of GSM specific BC-IE parameters for negotiating RLP version in UMTS	CR	27.001	R99	Withdrawn
N3-000337	Relevance of GSM specific BC-IE parameters for negotiating RLP version in UMTS	CR	24.022	R99	Withdrawn
N3-000338	3.1 kHz multimedia calls at 33.6 kbit/s data	CR	29.007	R99	Postponed to N3#12
N3-000339	3.1 kHz multimedia calls at 33.6 kbit/s data	CR	27.001	R99	Postponed to N3#12
N3-000340	3.1 kHz multimedia calls at 33.6 kbit/s data	CR	23.910	R99	Postponed to N3#12
N3-000341	3.1 kHz multimedia calls at 33.6 kbit/s data	[CR]	24.008		Noted
N3-000342	3.1 kHz multimedia calls at 33.6 kbit/s data	[CR]	22.002		Noted
N3-000343	work split N3 / N4	Discussion document			Noted
N3-000344	WI on Enable bearer independent circuit-switched network architecture	W.I SHEET			Noted
N3-000345	An architecture for Call control and roaming to support IP-based multimedia services in UMTS	W.I SHEET			Noted
N3-000346	Support of IP multimedia services	W.I SHEET			Noted
N3-000347	Service Modification without pre-notification	CR	29.007	R99	Withdrawn
N3-000348	Correction of the use of BC and LLC for multimedia service.	CR	29.007	R99	Postponed to N3#12

TDoc #	Tdoc Title	Type	Spec	Rel	Status
N3-000349	BC IE parameter negotiation	Discussion document			Noted
N3-000350	Service Modification without pre-notification	CR	27.001	R99	Withdrawn
N3-000351	Interworking with DHCP	CR	29.061	R99	Revised to 0378
N3-000352	Terms of Reference	ToR			Agreed
N3-000353	N3 Meeting Dates 2001	Discussion document			Agreed
N3-000354	LS on specifying luUP PDU Type in 3G TS 26.102	LS IN			Discussed
N3-000355	Allocation of documents to agenda items at the beginning of Day2	REPORT			Revised to 0376
N3-000356	Transparent 32kbit/s data rate with 1.460 rate adaptation	CR	29.007	R99	Agreed
N3-000357	Transparent 32kbit/s data rate with 1.460 rate adaptation	CR	29.007	R00	Agreed
N3-000358	Transparent 32kbit/s data rate with 1.460 rate adaptation	CR	23.910	R99	Agreed
N3-000359	Transparent 32kbit/s data rate with 1.460 rate adaptation	CR	23.910	R00	Agreed
N3-000360	Spare	Spare			Spare
N3-000361	Cleanup of RAB parameter setting	CR	23.910	R99	Revised to 0368
N3-000362	Cleanup of RAB parameter setting	CR	27.001	R99	Revised to 0370
N3-000363	UMTS clean-up	CR	27.001	R99	Revised to 0391
N3-000364	RCR is not indicated from the network to the MS	CR	27.001	R99	Postponed to N3#12
N3-000365	RCR is not indicated from the network to the MS	CR	29.007	R99	Postponed to N3#12
N3-000366	Relevance of GSM specific BC-IE parameters for negotiating RLP version in UMTS	CR	27.001	R99	Agreed
N3-000367	Relevance of GSM specific BC-IE parameters for negotiating RLP version in UMTS	CR	24.022	R99	Agreed
N3-000368	Cleanup of RAB parameter setting	CR	23.910	R99	Agreed
N3-000369	Cleanup of RAB parameter setting	CR	23.910	R00	Agreed
N3-000370	Cleanup of RAB parameter setting	CR	27.001	R99	Agreed
N3-000371	Cleanup of RAB parameter setting	CR	27.001	R00	Agreed
N3-000372	Relevance of GSM specific BC-IE parameters for negotiating RLP version in UMTS	CR	27.001	R00	Agreed
N3-000373	LS to SMG2 / GERAN and S1 on 32 kbit/s UDI/RDI multimedia	LS OUT			Approved
N3-000374	IM domain Interworking	Discussion document			Noted
N3-000375	LS to N1 on 3.1 kHz multimedia calls at 33.6 kbit/s data rate	LS OUT			Revised to 0389
N3-000376	Allocation of documents to agenda items at the beginning of Day 3	REPORT			Revised to 0386
N3-000377	LS to RAN3 SA4 on luUP PDU Type in 3G TS 26.102	LS OUT			Revised to 0390
N3-000378	Interworking with DHCP	CR	29.061	R99	Postponed to N3#12
N3-000379	Implications of DHCP lease renewal process	CR	27.060	R99	Postponed to N3#12
N3-000380	Correction of SDL Diagrams	CR	23.146	R00	Agreed
N3-000381	Modification from V.25bis to V.250	CR	23.146	R00	Agreed
N3-000382	PDP Context Deactivation due to DHCP renewal procedure	Discussion document			Discussed
N3-000383	WI: Interworking between Multimedia Domain & Legacy Networks	W.I SHEET			Revised to 0387

TDoc #	Tdoc Title	Type	Spec	Rel	Status
N3-000384	WI: Interworking between Multimedia Domain & IP Networks	W.I SHEET			Revised to 0385
N3-000385	WI: Interworking between Multimedia Domain & IP Networks	W.I SHEET			Agreed
N3-000386	Allocation of documents to agenda items at the beginning of Day 4	REPORT			Noted
N3-000387	WI: Interworking between Multimedia Domain & Legacy Networks	W.I SHEET			Agreed
N3-000388	WI: Service Modification without Pre-notification	W.I SHEET			Agreed
N3-000389	LS to N1 on 3.1 kHz multimedia calls at 33.6 kbit/s data rate	LS OUT			Approved
N3-000390	LS to RAN3 SA4 on luUP PDU Type in 3G TS 26.102	LS OUT			Approved
N3-000391	UMTS clean-up	CR	27.001	R99	Agreed
N3-000392	UMTS clean-up	CR	27.001	R00	Agreed
N3-000393	GPRS Mobile IP interworking	CR	29.061	R99	Revised to 0394
N3-000394	GPRS Mobile IP interworking	CR	29.061	R99	Agreed

Annex D: Status of N3 Specifications after TSG_N#8

	2G	TITLE	R96	R97	R98	R99	Last CR	3G TR / TS	TITLE	R99	Last CR	Rapporteur Company	Comments
TS	03.10	GSM PLMN Connection Types	5.4.0	6.0.0	7.0.1	8.1.0	A011	23.910	Circuit switched data services	3.1.0	008-	Achim Braun, Alcatel	
TS	03.45	Technical Realization of Fax G.3 Service-transparent	5.2.1	6.0.1	7.0.0	8.0.0	A004 r1	X	X	X	X		GSM ONLY including R99
TS	03.46	Technical Realization of Fax G.3 Service-Non-transparent	5.0.0	6.0.0	7.0.0	8.0.0	A012	23.146	Technical realization of facsimile group 3 non-transparent	4.0.0	-	J. Hagiwara, NTT	
TS	03.54	Description of the use of a shared interworking function in a PLMN S2	5.2.0	6.0.0	7.0.0	X	A007	23.054	Description for the use of a Shared Inter Working Function (SIWF) in a GSM PLMN - Stage 2	3.0.0	-	Tommy Röstö, Telia	
TS	03.70	Routeing of calls to / from Public data Network (PDN)	5.0.0	6.0.0	7.0.0	X	A002	X	X	X	X		GSM ONLY - Not required after R98
TS	04.21	Rate Adaptation on MS-BSS Interface	5.7.0	6.1.0	7.1.0	8.1.0	A018	X	X	X	X	Juha Räsänen, Nokia	GSM ONLY including R99
TS	04.22	Radio Link Protocol for Data and Telematic services on the MS-BSS and the MS-MSC Interfaces	5.6.0	6.2.0	7.1.0	X	A026 r1	24.022	Radio Link Protocol for Data and Telematic services on the MS-BSS and the MS-MSC Interfaces	3.3.0	004	N. Klehn, Siemens	
TS	07.01	General on Terminal Adaptation Functions (TAF) for Mobile Stations	5.9.1	6.1.0	7.1.1	X	A038	27.001	General on Terminal Adaptation Functions (TAF) for Mobile Stations	3.5.0	023r1	Erik Colban, Ericsson	
TS	07.02	TAF for services using Asynch bearer capabilities	5.5.1	6.0.0	7.0.1	X	A014	27.002	TAF for services using Asynch bearer capabilities	3.4.0	004	Erik Colban, Ericsson	
TS	07.03	TAF for services using Synch bearer capabilities	5.4.1	6.0.0	7.0.0	X	A011	27.003	TAF for services using Synch bearer capabilities	3.4.0	006	Erik Colban, Ericsson	
TS	07.60	Mobile Station (MS) Supporting GPRS	5.1.0	6.5.0	7.1.0	X	A020	27.060	Mobile Station (MS) supporting Packet Switched Services	3.5.0	021	Graham Heaton, Brand	
TS	08.20	Rate Adaptation on BSS - MSS Interface	5.3.0	6.0.0	7.0.1	8.1.0	A007	X	X	X	X	Juha Räsänen, Nokia	GSM ONLY including R99
TS	09.03	Signalling requirements on interworking between (ISDN) or (PSTN) and (PLMN)	5.0.0	6.0.0	7.0.0	X	-	X	X	X	X		GSM ONLY - Not required after R98
TS	09.04	Interworking between the PLMN and the CSPDN	5.0.0	6.0.0	7.0.0	X	-	X	X	X	X		GSM ONLY - Not required after R98
TS	09.05	Interworking between the PLMN and PSPDN for Packet Assembly / Disassembly (PAD) Access	5.0.0	6.0.0	7.0.0	X	010	X	X	X	X		GSM ONLY - Not required after R98
TS	09.06	Interworking between PLMN and PSPDN / ISDN for support of packet switched data transmission services	5.0.2	6.0.0	7.0.0	X	A003	X	X	X	X		GSM ONLY - Not required after R98
TS	09.07	General requirements on interworking between PLMN and ISDN or PSTN	5.10.0	6.2.0	7.2.0	X	A056	29.007	General requirements on interworking between PLMN and ISDN or PSTN	3.5.0	021	N. Klehn, Siemens	
TS	09.61	Interworking between the PLMN supporting GPRS and Packet Data Networks (PDN)	X	6.4.0	7.2.0	X	A015	29.061	Interworking between the Public Land Mobile Network (PLMN) supporting Packet Based Services and Packet Data Networks (PDN)	3.3.0	013	G. Heaton, Brand Comms	

Annex E: Access to 3GPP documents

This document briefly outlines some of the more important locations of information that all TSG_CN WG3 members should be aware of.

3GPP email lists:

To receive information about CN3 issues, all delegates and other interested parties MUST register for email list **3GPP_TSG_CN_WG3**. This can be done by sending an email to LISTSERV@LIST.3GPP.ORG with the following single line of text in the body of the message:

```
subscribe 3GPP_TSG_CN_WG3 YourFirstName YourLastName
```

There are many other 3GPP email lists that may also be of interest. Go to <http://www.3gpp.org/e-mail.htm> for further information.

If at any time you would like to confirm which lists you are currently a member of, just send a message to LISTSERV@LIST.3GPP.ORG with the following single line of text in the body of the message:

```
QUERY *
```

Email archives:

All 3GPP lists have an associated archive of every email sent via that list. Information on how to access the archive is sent to you when you subscribe to the list. This means that if you have temporary email problems, or have just joined the group, you can check to see if you have missed any messages. The easiest way to search the archive is first to request a list of all messages sent to the particular group you are interested in. For example, to get a list of messages sent via the **3GPP_TSG_CN_WG3** list between 1st Jan 1999 and the current date, send the following command to LISTSERV@LIST.3GPP.ORG:

```
search * in 3GPP_TSG_CN_WG3 since Jan 1999
```

As well as a list of emails sent, you receive instructions about how to retrieve the emails.

Some 3GPP archives are also available via a new user-friendly WWW interface. For CN3, go to:

http://list.3gpp.org/archives/3gpp_tsg_cn_wg3.html

Meeting calendar:

The central location for all information relating to the 3GPP meeting calendar and the corresponding meeting invitations can be found at: <http://www.3gpp.org/Meetings.htm>

Documents on the server:

All documents submitted to CN3 meetings will be made available on the 3GPP document server in a directory (related to the number of the meeting) under: ftp://ftp.3gpp.org/TSG_CN/WG3/

e.g. the documents for CN3 meeting #8 can be found at:

ftp://ftp.3gpp.org/TSG_CN/WG3_interworking/TSGN3_08/Tdocs/

History

Document History	
13 th July 2000	Draft v1.0.0 distributed to CN3 chairman for comments
19 th July 2000	<p>DRAFT v1.1.0 dispatched by e-mail exploder to the N3 list.</p> <p>Comments, if any, to be addressed to:</p> <p style="padding-left: 40px;">David Boswarthick, 3GPP TSG-CN3 Support MCC - ETSI Secretariat Tel :+33 (0)4 92 94 42 78 e-mail: david.boswarthick@ETSI.fr</p> <p>A deadline of 2 weeks was given to the N3 delegates for e-mail comments on the draft report.</p> <p style="text-align: center;">Comments back by 5th August 2000</p>
8 th August 2000	Updated DRAFT v2.0.0 placed to the server
23rd August 2000	N3-000396[v2.1.0] VARIOUS comments made by N3 at the beginning of CN3#12 meeting. Updated to N3-000445 and placed to the server as v3.0.0.