

# APPROVED MEETING REPORT 3GPP2 Steering Committee Meeting #9 ARIB/CWTS/TIA/TTA/TTC November 2, 2000 Tokyo, Japan

# 1. Opening

The meeting was called to order by Mr. Yoshinao Nakada, (Lucent Technologies), Vice Chair of the 3GPP2 Steering Committee, at 9:30am. Mr. Nakada welcomed participants to Tokyo and thanked the hosts ARIB and TTC for arranging the meeting.

### 2. Attendance Registration

Document SC-20001103-002 (Attendance list), was introduced by the Secretary. Those not already registered were requested to complete the required information.

[Secretary's note: A revised, completed attendance register is available on the 3GPP2 web site as: SC-20001103-002r1].

#### 3. Ouorum Establishment/Call for Proxies

The Secretary conducted a roll-call of participants on this meeting's quorum list. Out of 32 organizations, 30 were present, constituting quorum.

### 4. Approval of the Agenda

Document SC-20001103-001 (SC proposed agenda), was presented. No comments were submitted. The agenda was approved as presented.

[Secretary's note: During the course of the meeting, the agenda was revised to include newly submitted contribution numbers. The final version of the agenda is available as SC-20001103-001r4].

### 5. Contribution Assignment and Status

The Secretary introduced document SC-20001103-000 (Document register).

[Secretary's note: During the course of the meeting, the document register was revised to include newly submitted contribution numbers. The final version is available as SC-20001103-000r5].

## 6. Review Meeting Summary from Previous Meeting

The Secretary introduced contribution SC-20001103-003 and covered the decisions and actions from the last meeting held in Beijing, China on July 25. No comments related to the content of the report were submitted. The report was approved as presented.

## 7. MRP Reports

#### 7.1 CDG

Mr. Sam Samra, CDG, provided a verbal report, which included the following points:

- CDG has a technical team on location technologies working on phase-2 implementation of 911 for the US market. At a recent CDG board meeting this team was put into a dormant mode, pending declaration by the carriers on which technology will be used. Such a declaration is expected around November 9.
- The CDG wireless Internet team will be disbanded since most of the work has been addressed in the All IP ad hoc. Mark Lipford will be liaising between CDG and all IP activities within 3GPP2.
- The CDG executive board decided to look at what a fourth generation network will look like and prepared a high level requirements document. Further input on this will be provided at the next Steering Committee meeting.
- CDG has done some initial work on a naming convention status but this is proving to be a larger project than anticipated. The intent is for specification-developing groups to use the naming conventions to reduce confusion in the marketplace.
- CDG is now turning its attentions to Latin America where there are 10 million subscribers. Spectrum is currently being assigned.
- CDG has been advised to join the GSM Roaming Forum tackling UIM issues and SIM card discussions.
- CDG is now an ITU-R sector member.
- CDG just completed the Americas Congress in San Diego which attracted approximately 1200 attendees and which identified 71 million subscribers in CDMA technology.

The representative from CDG was asked to provide status information on CDG's application to become a 3GPP Market Representation Partner. It was reported that CDG has changed its charter but the application is still pending.

TTA asked if CDG has plans to provide a standard roaming agreement among cdma operators along the lines of the GSM association. CDG will check on this and report back accordingly.

### **7.2** MWIF

Mr. Hideo Okinaka (DDI Corporation) provided a verbal report of MWIF's activities, which included the following:

- Technical Report on Layered Functional Architecture, (MTR-003), has been approved by the Board.
- Technical Report on Architecture Requirements, (MTR-002), has passed the ballot and will shortly be approved by the Board.
- Technical Report on Network Reference Architecture (MTR-004) is under balloting process.
- MWIF would like 3GPP2 to consider a joint working group with 3GPP to work on a Common Radio Protocol to support a common access to cdma2000 and W-CDMA.
- MWIF disbanded Influencing Standards WG and established three separate WGs, 3GPP WG, 3GPP2 WG and IETF WG. 3GPP2 WG will be a contact point at MWIF to/from 3GPP2.
- "IP in the RAN" WG has proven that IP in the RAN is at least 10% more efficient than using ATM in the RAN. A technical report is ready for submission to the Technical Committee.

## 8. Liaison Reports

#### 8.1 OHG

No report was provided.

#### 8.2 TIA TR45

Mr. Jean Alphonse (Lucent Technologies), Chair of TIA TR45.5, provided a report of TIA TR45 activities contained in contribution **SC-20001103-014**. The report included the following:

- Mr. John Marinho, Chair of TIA TR45 has resigned and there will be an election at the upcoming meeting in Atlanta, Georgia to determine his successor.
- TR45's involvement in 3GPP i.e. coordination with 3GPP TSG-GERAN is an area of concern especially as it relates to evolution of TDMA standards.
- Concerns have been raised with regard to UIM/ESN issues in 3GPP and 3GPP2.
   There will be discussion at the next TR45 meeting on this item.

#### 8.3 WAP Forum

No report was provided.

# 9. TSG Reports

#### 9.1 All IP ad hoc

Mr. Mark Lipford (Sprint PCS), Chair of the 3GPP2 All IP ad hoc, introduced the following contributions:

- SC-20001102-004 Report from All IP ad hoc
- SC-20001102-016 IP Network Architecture Model for cdma2000 Spread Spectrum, Revision 1.0
- SC-20001102-017 Requirements for a 3G Network Based on Internet Protocol ("All IP") with Support for TIA/EIA-41 Interoperability
- SC-20001102-018 All IP AdHoc Proposed Work plan on All IP for 3GPP2
- SC-20001102-019 All IP AdHoc Open Issues
- SC-20001102-021 All IP AdHoc Meeting Report

It was stated that the architecture and requirements documents (SC-20001102-016 and SC-20001102-017 respectively) should not be considered final documents but a starting point for All IP activity. Mr. Lipford concluded his report by stating that since the deliverables requested of the All IP ad hoc had been achieved, he recommended that the group be disband and that its work be handed off to the TSGs to work on.

In responding to questions, Mr. Lipford reported that:

- There was no official review between MWIF architecture and All IP architecture but MWIF did a gap analysis and submitted recommended changes in the September/October time frame which were incorporated. The basic architectures are similar. Several All IP ad hoc group participants sit in MWIF and a number of All IP ad hoc status reports have gone to MWIF, thus constituting unofficial monitoring.
- The work plan contribution recommends putting overall continued support of requirements in the architecture document within a group in TSG-S to provide project management and coordination among all TSGs. It also contains a detailed matrix for assigning work among TSGs. Matrices have been distributed to TSGs in an initial version and feedback has been received.

[Secretary's note: Decisions on the placement of All-IP work within the TSGs was held off until agenda item 12.1]

### 9.2 TSG-A

Mr. Frederic Leroudier (Linkair) presented the TSG-A report in contribution SC-20001102-005r1, which included the following:

- IOS V4.1 is nearing completion following V&V and SDO review.
- TSG-A has agreed upon new feature content for an evolution of the IOS V4.x series called IOS V4.2.
- ABIS TS A.S0003 (Abis Technical Specification) ballot comment resolution was conducted jointly between TTC and TIA TR45.4. An electronic ad hoc has been established to finalize the specification.
- Tandem Free Operation (TFO) ballot resolution is complete but the document is still pending approval pending V&V activity.
- TSG-A agreed to begin a new study item entitled "IP based RAN".

The TSG-A Chair also presented the following concerns:

- TSG-A has noted progress in TSG coordination. New discussions have initiated. There is still a lot of work to do. Coordination is an essential requirement for cdma2000 success.
- Ref: 1xEVDO details in stage 1 requirements are lacking. It is a challenge for TSG-A to understand what is required of them.
- There aren't enough volunteer resources to keep up with the work, resulting in technical specifications lacking quality.

In responding to a question concerning MWIF's exploration of "IP in the RAN" and how this interfaces with similar efforts in TSG-A, it was reported that while TSG-A is not aware of the proposals developed by MWIF, the new MWIF working group on 3GPP2 issues will assure closer collaboration.

### 9.3 TSG-C

Mr. Jean Alphonse, Chair of 3GPP2 TSG-C, delivered the report of TSG-C activities contained in contribution SC-20001102-006r2.

## 9.3.1 RSPC Coordination Group (Decision 07/2000-01)

In response to decision 07/2000-01 from the July 25 2000 meeting in Beijing, document SC-20001102-022 was presented for information.

It was reported that the proposal from the 3GPP2 SDOs to the ITU contained in the aforementioned contribution, along with all other technology proposals were postponed until the next meeting of Working Party 8F scheduled for February 21, 2001 given a lack of a clear evaluation procedure.

[Secretary's Note: During the course of the day, the ITU Working Party 8F document – "Draft Update Procedure for Revisions of Recommendation ITU-R M1457" was made available and cataloged as contribution SC-20001102-033].

#### 9.3.2 1xEvolution Time-line (Action 07/2000-02)

Contribution SC-20001102-023 was presented for information in response to action 07/2000-02 from the July 24 SC meeting held in Beijing, China.

#### 9.3.3 UIM ID Issues

CWTS presented contribution SC-20001102-024 – UIM ID Assignment. CWTS is requesting that the Steering Committee appoint a group such as TSG-S to respond to the assignment of UIM-ID issues.

This document was introduced for information at this time. The Chair deferred discussion and decision until agenda item 12.2.

#### 9.4 TSG-N

Mr. Hee Joung-Lee (LGE Inc.), Vice Chair of TSG-N, presented the report contained in contribution SC-20001102-007. Details covered included a recommendation to amend TSG-N's Terms of Reference in light of the proposed migration of All IP-related work. It was decided to defer this request until after agenda item 12 which would discuss the All IP-related actions to be taken.

#### 9.5 TSG-P

Mr. Haeng Koo (Samsung), Chair of TSG-P, presented the TSG-P report to the Steering Committee contained in contribution SC-20001102-008. Details included a request for the Steering Committee to approve Mr. Raymond Hsu of Qualcomm as the new TSG-P vice chair, occupying the position vacated by Mr. Mark Munson (formerly of GTE/Verizon).

#### **DECISION 2000/11-01**

The Steering Committee approves the appointment of Mr. Raymond Hsu of Qualcomm as TSG-P Vice Chair.

Unanimous.

#### 9.6 TSG-S

Mr. Hideo Okinaka (DDI Corporation) delivered the report of TSG-S activities presented in contribution SC-20001102-009. The report requests that:

- TSG-C take an action on the adoption of the Rijndael algorithm for AKA.
- The Steering Committee note the TSG-S position on the All IP work plan as described in Section 9 of the report.
- Determination of the locations of SC meetings in 2001 take place ASAP for the purpose of TSG-S meeting arrangements.

[Secretary's note: With regard to the last item, the Secretary noted that the location of 2001 SC and OP meetings had been set during informal discussions in July in Beijing, China. The 3GPP2 Secretariat will update the 2001 meeting calendar on the 3GPP2 web site (<a href="http://www.3gpp2.org">http://www.3gpp2.org</a>) and will make an announcement to the SC and OP reflectors accordingly).

The TSG-S Chair also introduced contribution SC-20001102-034 which covers informative correspondence from TSG-S to the Steering Committee chair informing of the request within TSG-C to begin work on a new work item: Mobile Station ID Expansion and Harmonization. The document was introduced for information at the present time.

# 10. Review of 3GPP2 2000 Work Program

The Secretariat introduced contribution SC-20001102-020 (List of approved 3GPP2 Specifications), and indicated that the entire list of downloadable specifications is available on the 3GPP2 web site.

Mr. Bob Plunkett (Quicksilver Technologies), Chair of the PMT, introduced contributions SC-20001102-030 and SC-20001102-031 and requested that these documents be approved by the Steering Committee.

#### **DECISION 2000/11-02**

To approve the updated version of the 3GPP2 work plan as contained in contributions 30 and 31. Unanimous.

#### **ACTION 2000/11-01**

Secretariat to update the 3GPP2 web site with the most recent approved version of the work plan.

#### 11. Old Business

# 11.1 TSG Coordination ad hoc group (Decision 07/2000-04)

Mr. Bob Plunkett, Chair of the Steering Committee's ad hoc group on TSG coordination, introduced contribution SC-20001102-032. In summarizing the contribution, Mr. Plunkett informed the SC that participation on the e-mail reflector set up for handling this action (tsgcoordination@3gpp2.org) could be summarized as:

- Insufficient to make any determination.
- Much time spent discussing the role of TSG-S in a more general sense.
- Opinions covered the entire spectrum.
- No consensus will be reached in this form of discussion.

Mr. Plunkett further offered that TSG-S currently has the responsibility for technical coordination. Lack of cooperation has led to TSG-S not being able to fulfill this role. Individual members are not putting resources into TSG-S to allow it to do so.

The Chair opened the floor for discussion during which representatives from each of the TSGs were asked to provide feedback on this issue.

The representative from TSG-A:

- Reaffirmed its support of TSG-S activities.
- Offered that TSG-S activity should concentrate on stage-1 development and that stage-2 should be left up to the individual TSGs.
- Further offered that the deficiency within TSG-S is that not all operators nor MRPs
  are represented and thus are not contributing to the discussions but are placing
  requirements directly into other TSGs which adds to the over-all lack of
  coordination.

The representatives from TSG-C, TSG-N and TSG-P agreed that TSG-S activity should concentrate on stage 1 development and that further stages should be left up to each TSG to manage.

Further discussion featured the following points:

- Discussions on the e-mail reflector provided the view that the TSG process is contribution driven and that TSG-S should not put itself in a position of overseeing the work plan.
- Clarification was sought regarding "collaboration at the stage-1 level" which featured in the feedback from each of the TSGs. It was reported that this signified collaboration within TSG-S at the planning level where features and capabilities are identified. It was further stated that enforcement of this mechanism was lacking and that there was a need to maintain architectural consistency.
- The lack of participation by operators and MRPs was cited as a problem in that it impedes the coordination process and the efficient design of end-to-end functionality.
- The problem was perceived not so much as a lack of coordination since the mechanisms are in place, but rather as a problem of lack of implementation/enforcement. The claim was made that it is up to the leadership of the other TSGs to enforce the process and to make sure that stage 1 requirements are first dealt with within TSG-S.
- It was agreed that there are features for which little coordination is needed with other TSGs but that it is incumbent on TSG chairs to assess whether a new feature impacts other TSGs.

- Not all work items are placed on the work plan given that they are introduced directly in other TSGs.
- CWTS stated that it supports enhanced management and coordination in 3GPP2 and that TSG-S is the best group to handle the process.

Further discussion ensued culminating in agreement as to the following:

#### **DECISION 2000/11-03**

The 3GPP2 Steering Committee:

- a) endorses technical coordination role of TSG-S
- b) Recommends to the Organizational Partners that a staged development process (stage 2 always preceded by stage 1 etc...) be mandated by the Working Procedures Document.
- c) Recommends the creation of a formal work item approval process
- d) Recommends that enforcement of the work plan by each TSG be mandated by the Working Procedures Document.

### **ACTION 2000/11-02**

Considering the decision made by the Steering Committee regarding cross-TSG coordination, the TSG Coordination ad hoc group is instructed to add appropriate details and refinement. Once this task is complete, its findings are to be remanded to the Working Procedures ad hoc group for the crafting of text to be approved by the Organizational Partners for subsequent inclusion in the Working Procedures Document.

The Chair thanked the participants for the discussion and appealed that comments regarding the action propose some concrete ideas for improvement of the process.

### 12. New Business

#### 12.1 Treatment of All IP issues in 3GPP2

Contribution SC-20001102-018 was reintroduced. This contribution captures the recommendations of the All IP ad hoc as to how All IP work should continue within 3GPP2 following the recent completion of the ad hoc group's charter.

The recommendations contained within the report were discussed at length. Questions asked and comments made covered the following issues:

- Rather than creating a new TSG to handle All-IP development, the ad hoc group recommends distributing the work within the existing TSG structure. It is believed that this presents a solution for work to begin quickly.
- Clarification was sought as to the status of the TSG-S "Project Group" featured in the ad hoc recommendation contained in contribution SC-20001102-018. It was explained that the vision is for this group to be a coordination entity while the technical work takes place within the other TSGs. It was further explained that defining the Project Group as an ad hoc (short term mechanism) was considered an appropriate decision since the activity has not yet begun and there is no current intelligence as to how emphasis on this issue may change over time.
- TTA inquired as to whether the Partnership Project Agreement (PPA) should be modified following the formal addition of All IP work in 3GPP2. This led to:-ACTION 2000/11-03:
  - Chair of the Working Procedures ad hoc group is requested to research the impact, if any, on the Partnership Project Agreement of the addition of All IP-related work into the existing TSG structure.
- The Steering Committee was requested to revisit the issue of collocating meetings of TSGs affected by the inclusion of All-IP related work in their terms of reference. It

was suggested that TSG-A, TSG-N and TSG-P meet jointly at all times. This suggestion met with agreement from representatives from the groups impacted.

The Chair concluded discussion by recapping the items on which a decision was required. Following discussion, the following was recorded:

#### **DECISION 2000/11-04**

The Steering Committee approves of the termination of the All IP ad hoc following the successful completion of its charter.

Unanimous.

#### **DECISION 2000/11-05**

The Steering Committee endorses the output of the All IP ad hoc and remands contributions SC-20001102-016, SC-20001102-017, SC-20001102-018 and SC-20001102-019 to TSG-S for further action.

Unanimous

#### **DECISION 2000/11-06**

The Steering Committee endorses the All-IP work plan presented in contribution SC-20001102-018.

Unanimous

#### **DECISION 2000/11-07**

Given the inclusion of All-IP related work in their charter, The Steering Committee instructs TSG-A, TSG-N and TSG-P collocate their schedules unless directed otherwise by the OP Finance Committee – starting January 1, and until further notice. Unanimous

At this time the Chair revisited the request by TSG-N to amend its terms of reference. Ensuing discussion included the following points:

Concern was raised as to the vague nature of the proposal to change the TSG-N terms of reference to read simply "Networks". It was suggested that modification of terms of reference be deferred until collocation of meetings begins since coordination among TSGs will be required.

Discussion culminated in the following

#### **ACTION 2000/11-04:**

All TSGs are to study their Terms of Reference in light of the decision to assign All-IP related work within the existing TSG structure, and are instructed to present their findings at the February 2001 Steering Committee for endorsement/approval.

CDG requested that a late contribution be accepted under this agenda item and duly introduced contribution SC-20001102-035 which recommends that attention be paid to developing standards in a coherent and efficient manner so that other industry fora not assign themselves work to fill in any gaps not covered. The document further recommends examination of the structure of 3GPP2 at this time to accomplish this goal.

The recommendation was followed by a series of comments, which included:

- Discussions need to be held at the right level analysis should be done by strategic planners and not by the day-to-day technical workers.
- Since the contribution submitted indicated that the current 3GPP2 working method is
  not optimum, CDG was asked whether they knew of a specific area in need of
  improvement. It was reported, however, that no specific area was targeted, but that

the time was right to examine the structure in light of the decision to incorporate All-IP related work within the existing TSG structure.

Discussion culminated in the following:

#### ACTION 2000/11-05

Following the installation of new leadership following the closure of the existing terms of office, the Steering Committee remands contribution SC-20001102-035 to the Steering Committee leadership (Chair and Vice Chairs) for consideration and consultation with Organizational Partners. It is intended that a report be presented on how the current charter may be improved by a changed structure.

### 12.2 UIM ID Issues

CWTS reintroduced contribution SC-20001102-024 – and requested that TSG-S take the lead in aligning this work item within the 3GPP2 work plan. Ensuing discussion included the following points:

- There is a general lack of information regarding UIM-ID preventing the 3GPP2 Steering Committee from making a decision at the present time.
- The challenge with UIM will be to prevent a conflict with ESN numbering which exists today.
- This is perceived as both a technical and an administrative issue. Careful coordination with TIA is needed to avoid overlap with ESN space. This requires the careful installation of mechanisms to handle the process.
- Discussions should also consider what would happen when there are eventually three different 32bit number assignments. Global roaming will bring ESN collision.

Discussion yielded the following:

#### **DECISION 2000/11-08**

Document SC-20001102-024 is remanded to TSG-C, TSG-N and TSG-S - for discussion by a joint group at the December cycle of meetings in Maui.

#### **ACTION 2000/11-06**

The Steering Committee instructs TSG-C, TSG-N and TSG-S to study contribution SC-20001102-024 and to propose how to incorporate this item into 3GPP2.

#### 12.3 Report from Working Procedures ad hoc

Ms. Susan Hoyler (TIA), Chair of the 3GPP2 Working Procedures ad hoc group, presented a number of contributions to the Steering Committee for information, indicating that a number would be presented for decision at the following day's OP meeting. The contributions are:

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SC-20001102-025 – PPD/WPD Alignment Part 1 (for decision at OP meeting)
SC-20001102-026 – PPD/WPD Alignment Part 2 (for decision at OP meeting)
SC-20001102-027 – Report to the Organizational Partners from the Working Procedures ad hoc (for information at OP meeting)
SC-20001102-028 – Proposed WPD Update (for information at OP meeting)
SC-20001102-029 – Proposed PPD Update (for information at OP meeting)
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It was explained that the contributions have also been submitted to the Organizational Partners for discussion and decision at their upcoming meeting, and that they are being presented to the Steering Committee for information at this time since the changes being proposed impact the Working Procedures Document of the entire Project.

Ms. Hoyler did seek clarification and decision from the Steering Committee, however, on two miscellaneous issues brought to the Working Procedures ad hoc's attention, namely:

- Participation by individuals from non-participating companies/organizations on 3GPP2 e-mail reflectors.
- Audio recording of 3GPP2 meetings.

Regarding participation by individuals from non-participating companies/organizations on 3GPP2 e-mail reflectors, discussion yielded the following points:

- The Working Procedures ad hoc is looking for clarification regarding administration of e-mail reflectors as opposed to the ejection of non-participating members from physical meetings.
- It was observed that some e-mail reflectors are seeing traffic by non-3GPP2
  participants and are being used by other groups that may consist of the same
  individuals.
- ARIB offered that the Secretariat use the list of member companies it maintains and delete participants from non-member companies accordingly.
- It was further recommended that an opportunity be seized to market 3GPP2 to nonparticipating companies prior to deletion of individuals from e-mail reflectors.
- Participation at meetings is a separate matter. The discussion is focused on e-mail reflectors since there is a variable cost associated with degree of usage.

Discussion concluded with the following:

#### **DECISION 2000/11-09**

The Steering Committee recommends to the Working Procedures ad hoc that all 3GPP2 e-mail reflectors be restricted to individuals from 3GPP2 participating companies/organizations only.

Regarding the audio recording of 3GPP2 meetings, discussion yielded the following points:

- Audio recordings should be acceptable if announced to the entire group in advance and if no objections are raised.
- It is recommended that the intent of the audio recording be announced prior to the meeting commencing.
- Regulations/guidelines in place in a particular country may legally prohibit audio recording without such announcement and permission.

Discussion concluded with the following:

#### **DECISION 2000/11-10**

The Steering Committee recommends to the Working Procedures ad hoc that audio recording of 3GPP2 meetings be permitted only if:

- a) The intent of audio recording is announced to the entire group in advance
- b) Permission to record is sought from all attendees
- c) The purpose of the recording is announced in advance

# 12.4 2001 Meeting Calendar

The Secretary introduced this agenda item stating that the original intent was to clarify a number of open items on the current 2001 3GPP2 meeting calendar, but requested that the agenda item be withdrawn in light of the decision to reopen discussions designed to achieve collocation of TSG-A, TSG-N and TSG-P meetings.

## 13. Assignments for Next Meeting

The action items issued at this meeting are as follows:

#### **ACTION 2000/11-01**

Secretariat to update the 3GPP2 web site with the most recent approved version of the work plan.

#### **ACTION 2000/11-02**

Considering the decision made by the Steering Committee regarding cross-TSG coordination, the TSG Coordination ad hoc group is instructed to add appropriate details and refinement. Once this task is complete, its findings are to be remanded to the Working Procedures ad hoc group for the crafting of text to be approved by the Organizational Partners for subsequent inclusion in the Working Procedures Document.

#### **ACTION 2000/11-03**

Chair of the Working Procedures ad hoc group is requested to research the impact, if any, on the Partnership Project Agreement of the addition of All IP-related work into the existing TSG structure.

#### **ACTION 2000/11-04**

All TSGs are to study their Terms of Reference in light of the decision to assign All-IP related work within the existing TSG structure, and are instructed to present their findings at the February 2001 Steering Committee for endorsement/approval.

#### **ACTION 2000/11-05**

The Steering Committee instructs TSG-C, TSG-N and TSG-S to study contribution SC-20001102-024 and to propose how to incorporate this item into 3GPP2.

### 14. Date of Next Meeting

Participants were reminded that the next meeting of the 3GPP2 Steering Committee will take place in Japan on February 1 2001. The meeting will be preceded by a three-day meeting of TSGS and will be followed by the 3GPP2 Organizational Partners meeting on February 2.

# 15. Adjournment

There being no further business, the meeting was adjourned at 5:45pm local time.

Respectfully submitted: Henry Cuschieri 3GPP2 Steering Committee Secretary