GLOBAL IPv6 SERVICE
LAUNCH EVENT

6GN: APAN Native Gigabit IPv6 Network

Towards 10% of R&E Network Traffic

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1. Background

1.1 History

- Developed 10 years ago
- Much R&D effort so far
- Many testbeds (6Net, Moonv6,….)
- Little deployment and traffic

1.2 Issues

- Deployment

  Tough to let IPv6 deployment to start snowballing

- Transition

  Not much incentive

- Roles of IPv6 and IPv4 in futures

1.3 Major Deployment Candidates

- Mobile Telephone
  - Home Appliance
  - RFID/ Sensor Network
  - R&E Network
  - Military
  - P2P
  - VoIP/ ENUM
  - Security Applications/ PKI
  - Automobile
  - Plug & Play
  - Broadband Access

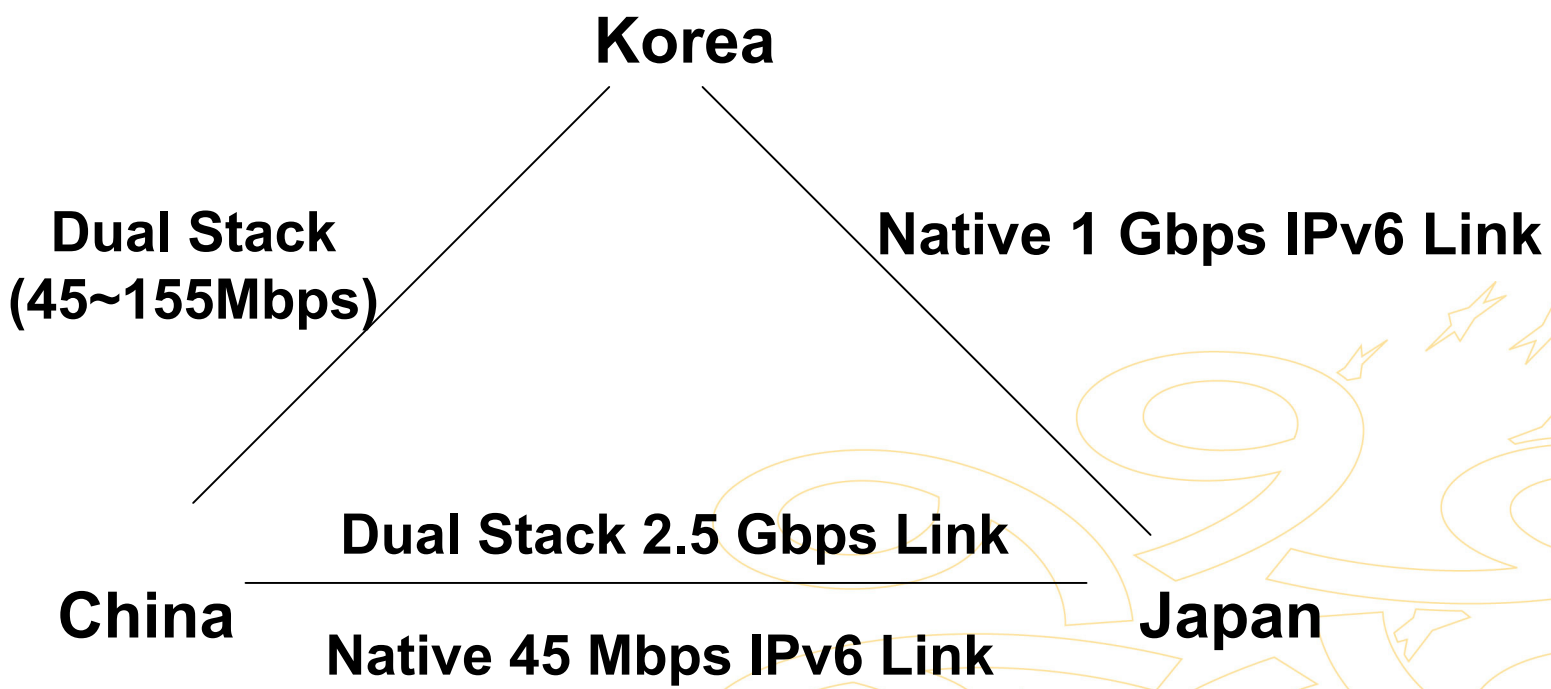
2. APAN IPv6 Task Force - Goal

- 10% of R&E Network Traffic as Task Force's Goal

3. APAN IPv6 Task Force - Organization

- **Initial Member: China, Japan, Korea**
  - **Task Force Chair:**
    Jianping Wu /Tsinghua
    Hiroshi Esaki /Tokyo
    Ki-Shik Park /ETRI
  - **Technology Chair:**
    Yan Ma /BUPT
    Hiroshi Esaki /Tokyo
    Seung-Yun Lee /ETRI
  - **Network Operation Center Chair:**
    Li Xing /Tsinghua
    Yoshinori Kitatsuji /KDD
    Jae-Hwa Lee /KT
  - **Application Co-Chair:**
    Nan Kai /CNIC
    Hiroshi Esaki /Tokyo
    Yo-Jung Kim /NCA
- **Secretariat**:
  China: An Jie/CERNET
  Japan: Yoshinori Kitatsuji/KDD
  Korea: Sang-Gyun Kim /ANF
  APAN Secretariat : Chin Hooi Tang

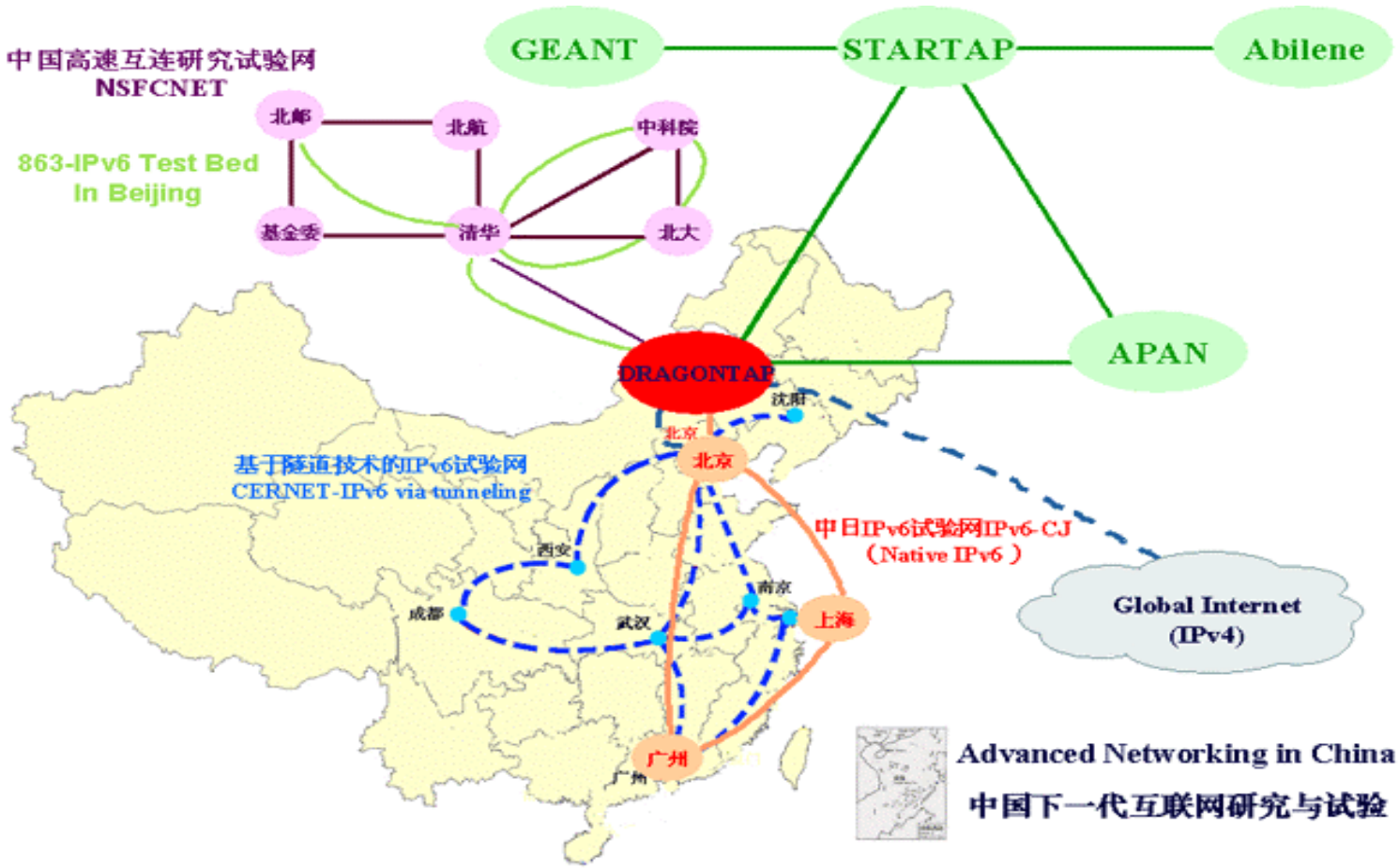
4. International Network



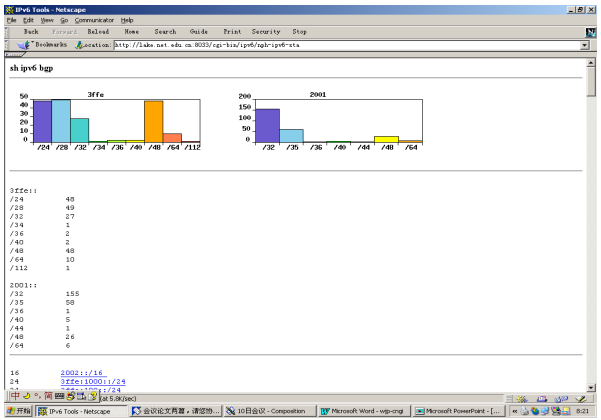
5. Domestic Networks

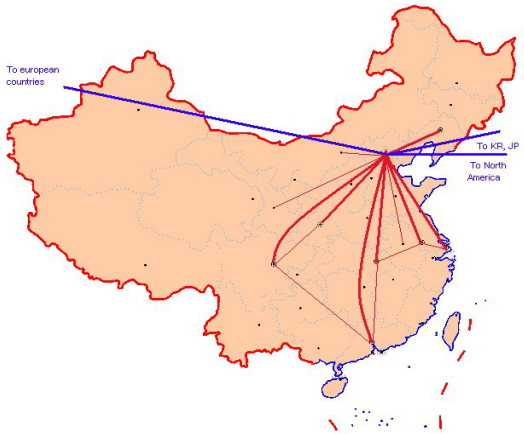
5.1 China

- CJ-I



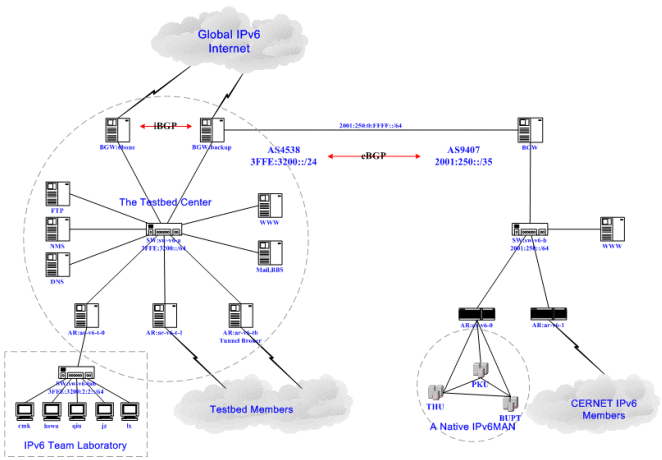
- CERNET-IPv6

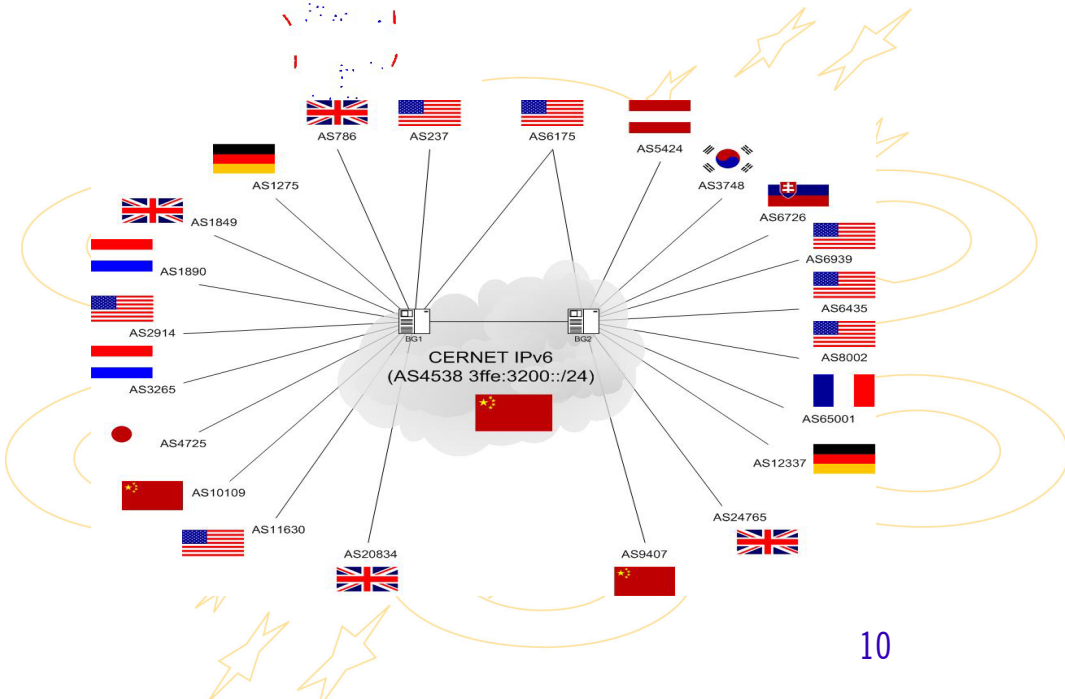




pTLA in 6bone
3FFE:3200::/24

sTLA from APNIC
2001:250::/32





- **CSTNET-IPv6**

- Internet Exchange

[Dragon Tap]

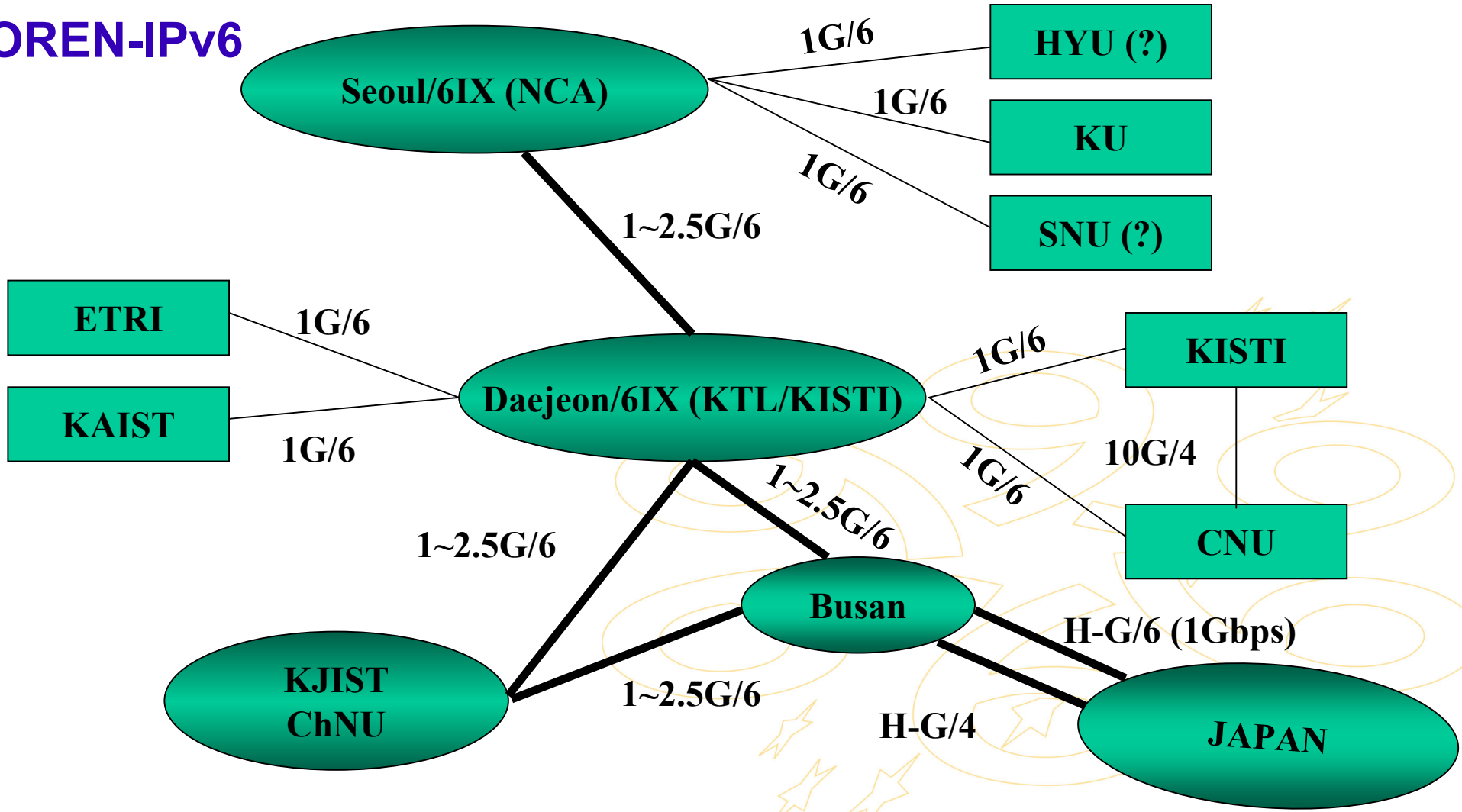
- JGN

- **SuperSINET**

- **Internet Exchange**

5.3 Korea

- KOREN-IPv6



- KREONET-IPv6

- Internet Exchange

6. Applications

6.1 Science

1. Virtual Observatory
2. Climate
3. Physics
4. Biophysics
5. Medical
6. BioMirror

6.2 Information Technology

1. HDTV
2. DVTS
3. Grid
4. Education
5. Mobile
6. P2P

7. Meetings

2003.8 APAN Meetings, Busan
Formation of IPv6 Task Force

2003.10 Global Joint Gigabit IPv6 Meeting, Indianapolis
APAN, Internet2, CA

2003.12.5~6 APAN IPv6 K

2003.1.14 Global Joint
Focus on App

2003.1.28~30 2nd APAN IP
Focus on Tec

8. Remark

(1) DoD is making the major transition commitment.

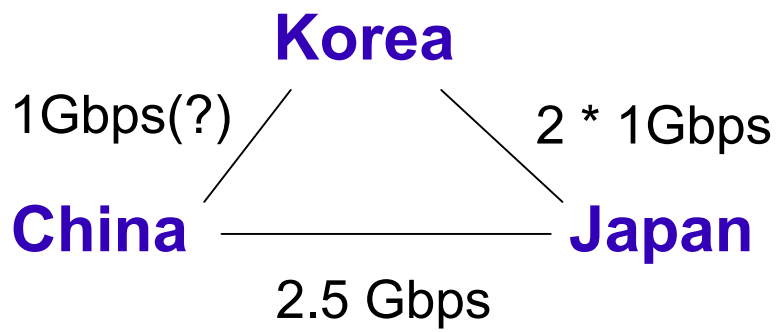
(2) Mobile and security still are the main application candidates.

Reference

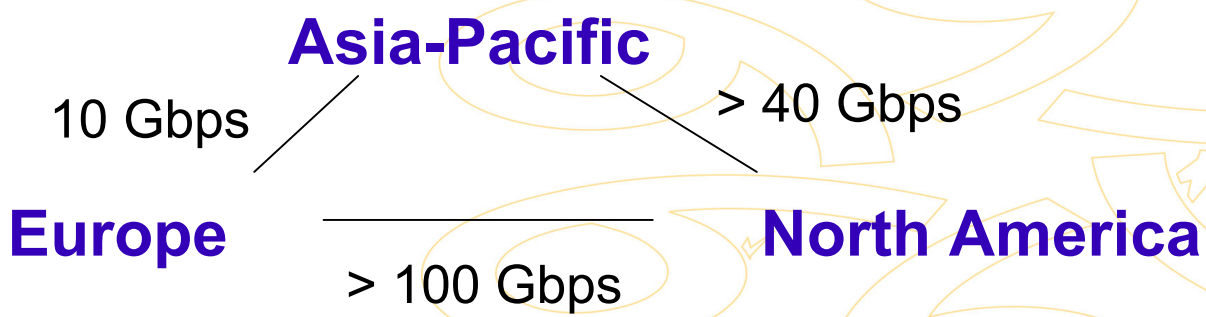
APAN	apan.net
CERNET	www.cernet.edu.cn
Global IPv6 Forum	www.ipv6forum.com
Internet 2	www.internet2.edu
DoD Initiative	www.defenselink.mil

Appendix 1: Research Network Clusters

Asia



Global



Appendix 2: Document List of APAN IPv6 Task Force

1. Overview: Kilnam Chon
2. Strategy Document: Jianping Wu
3. Plan: Seung-Yun Lee
4. Profile: Yan Ma/ Seung-Yun Lee
5. Coordination Group: Jianping Wu/ Hiroshi Esaki/ Kisik Park
6. Technology Group: Yan Ma/ Seung-Yun Lee
7. Operation Group: Li Xing
8. Application Group: Nan Kai/ Hiroshi Esaki
9. Brussels Meeting (2004.1.14 ; Korea to prepare)
10. Honolulu Meeting (2004.1.25-30 ; China to prepare)
11. Spring Meeting (2004.3.4~5? ; Japan to prepare)
12. Secretariat: China: An Jie/CERNET
    Japan: Yoshinori Kitatsuji/KDD
    Korea: Sang-Gyun Kim/ANF
    APAN Secretariat : Chin Hooi Tang