

# Minutes for the 22<sup>nd</sup> ACFA and 5<sup>th</sup> AsiaHEP joint meeting

Meeting date: January 31, 2015

(There is an arranged tour of Daya Bay Neutrino experiment on Jan. 30, and also a tour of the CSNS facility after lunch on Jan. 31)

Meeting place: A1-104, Dongguan Branch, IHEP, China

Participants: Oleg Meshkov (BINP), In Soo Ko (PAL), Dinakar Kanjilal (IUAC), Tripti Sekhar Datta (IUAC), Yasuhiro Okada (KEK), Mitsuaki Nozaki (KEK), Geoffrey Taylor (U. Melbourne), Shin-ichi Kurokawa (KEK), Bum-Hoon Lee (Sogang U.), Ching-Shiang Hwang (NSRRC), Hideaki OHGAKI (Kyoto U.), Hitoshi HAYANO (KEK), George Wei-Shu HOU (NTU), Youjin Yuan (IMP), Yifang Wang (IHEP), Hesheng Chen (IHEP), Yuanbai Chen (IHEP), Gang Chen (IHEP), Qing Qin (IHEP), Jie Gao (IHEP), Jingyu Tang (IHEP)

Chair: Yifang Wang (IHEP)

1) Welcome: Yifang Wang welcomes the attendees especially those from abroad. The attendees introduce themselves.

2) Activities at IHEP: Gang Chen presents a general status report about IHEP, and Hesheng Chen presents an introduction to the CSNS project.

3) Working Group reports:

- i. High-power proton accelerators (prepared by Kazuo Hasegawa), presented by Jingyu Tang. The next HPPA workshop will be held in Lanzhou in September 2015, organized by IMP. Kurokawa suggests including BNCT in the topics.
- ii. Joint linear collider physics and detector (prepared by Akiya Miyamoto), presented by Mitsuaki Nozaki. Asian Linear Collider Workshop 2015 will be organized by KEK, ACFA, and LCC on April 20-24, 2015 at KEK, and an associated symposium (ILC Tokyo Event) will be held in Tokyo on April 22, expecting about 300 registrants or aiming for 500 including industrial sector. Network and computing, presented by Mitsuaki Nozaki. The Belle-II collaboration is strengthening the computing network within the partners. However, there is a need to increase connections among regional countries. Actually Hong Kong is actually the most connected. W.S. Hou suggests that China and Japan take more responsibility to improve the regional connection. We may need to consider giving Hong Kong membership in ACFA, first by seeking support from the Hong Kong government.
- iii. Cryogenics, cryomodule and superconductivity, presented by Tripti Sekhar Datta. There are rapid developments in cryogenics in almost all major regional countries

which have large accelerators. RAON is going to have an 18 kW refrigerator, which will become the largest refrigerator in Asia. ICEC26 will be held in Delhi on March 7-11, 2016.

#### 4) ILC reports and discussions

- i. Recent progress of ILC project, presented by Hitoshi Hayano. Japanese government is still inspecting the reasoning to give green light for the project. Both political efforts and technical efforts are being made by scientists to realize ILC.
- ii. FALC report, presented by Yasuhiro Okada. The funding agencies from major countries worldwide for large colliders continue to seek collaboration on future large projects.
- iii. ILC R&D, presented by Jie Gao. R&D efforts and significant progresses for ILC in Japan, China, Korea and India are reported.

#### iv. Discussion on ILC

Further information for Japan hosting ILC is provided by Hitoshi Hayano and Yasuhiro Okada. In reply to the MEXT's inquiry, the Science Council of Japan pointed out the following issues to be clarified to judge the hosting of the ILC in Japan in September 2013: A more precise research strategy for the ILC in view of the LHC upgrade path, funding framework that does not interfere with other science budget in Japan, global sharing of the cost, organizational issues in Japan, and human resources required during construction and operation. The Japanese government is working hard to investigate these issues. The MEXT setup the special committee on the ILC project. Under the committee, two WGs (Revisiting Science Merits, Evaluation of TDR & Cost Estimates) have been formed. In the TDR WG, it is presented which part of cost is in the TDR and which is not, and how necessary man power can be provided, progressively increasing by taking into account the construction period (including: already existing manpower, those shifting from other projects, those to be educated in the coming years). In parallel, preliminary contact with the outside of Japan, such as EU and US, has been made for their supporting of ILC.

Shin-ichi Kurokawa thinks the manpower for ILC should not be a big issue, taking the examples that CSNS and Shanghai Thorium reactor projects have recruited hundreds of staff in a few years.

Jie Gao stresses: The ILC collaborators from different countries should try to make efforts to find funds from their own countries.

5) Report on the IPAC2016, presented by In Soo Ko. The 7<sup>th</sup> IPAC (IPAC2016) will be held in Busan from May 8-13, 2016, organized by PAL. The organization of the conference is well in order and on schedule. The organizational information is provided.

6) TPS progress and report about AFAD2015, presented by Ching-Shiang Hwang. TPS got its first synchrotron light on the last day of 2014, on schedule and in budget. AFAD2015 in a few days ago in Hsinchou was very successful and attended by 140 registrants.

7) Naming of the IPAC Asia Prizes and modification of the IPAC Asia rules proposed by Shin-ichi Kurokawa. ACFA unanimously agreed upon the proposal of naming four prizes: Xie Jialin Prize (for outstanding work in the accelerator field with no age limit), Nishikawa Tetsuji Prize (for a recent outstanding achievement in the accelerator field with no age limit), Hogil Kim Prize (in the early part of his or her career, having made a recent significant, original contribution to the field), and Mark Oliphant Prize (to a student registered for a PhD or diploma in accelerator physics or engineering, or to a trainee accelerator physicist or engineer in the educational phase of their professional career, for the quality of work and promise for the future.). It was decided that to ask Japanese colleagues to choose either Tetsuji Nishikawa Prize or Nishikawa Tetsuji Prize as the prize name. Winners of these four prizes shall be decided by prize selection committee of IPAC. Winners of student poster prizes shall be decided by IPAC Science Program Committee. The rules of IPAC Asia should be modified in order to reflect these changes. Kurokawa shall propose to ACFA a modified version in due time.

8) Report on ACFA Asian School on Superconductivity & Cryogenics, presented by Jie Gao. They plan to hold the school in the second half of 2015 in China. It is suggested to consult major labs, to obtain financial and personal supports (for both lecturers and students) before making a decision.

9) Discussion on the venue for the next meeting, deputy ACFA chair etc., monitored by Yifang Wang.

- i. Geoffrey Taylor is elected as the deputy ACFA chair who will become the next-term chair automatically. W.S. Hou is elected as the AsiaHEP chair but this needs to be determined after consulting other AsiaHEP members who cannot attend the meeting. Hou expresses that the AsiaHEP mission needs to be more clearly defined, and the discussion between the two driving forces, KEK and IHEP, will clarify this.
- ii. Venue for the next AFAD/ACFA: The proposal from KEK, probably before the end of March 2016 (institute and dates to be defined), is supported. The two meetings (ACFA-AsiaHEP and AFAD 2016) will be bound. The initiative trying find a possibility to hold the meeting after the next in Singapore is supported, which

will be discussed between Yifang Wang and the Singapore representatives in the coming month. S. Kurokawa wishes them also consider to host IPAC in the future.

10) IUPAP new commission for accelerator science, monitored by Mitsuaki Nozaki. IUPAP recommended establishing such a new commission, but this was not supported in the early ICFA discussions. There is no decision on this item during the meeting. Kurokawa reports that IPAC16 OC wishes to participate in the discussion and make contact to IUPAP. The discussion will be continued.

11) Joint sessions among national accelerator conferences for young accelerator researchers, monitored by Mitsuaki Nozaki. It is encouraged that the organizers of the national accelerator conferences and workshops send announcements in the ACFA webpage, and consider special sessions in English for foreign participants.

12) Free discussions, monitored by Yifang Wang. It is recommended that ACFA takes efforts to communicate with other committees such as ECFA and ICFA, so that the information from other committees can be shared.

**Decisions and action items:**

- 1) It is recommended that China and Japan should make more effort to improve the connection among the regional computation network.
- 2) Naming of the IPAC Asia Prizes are approved. Four prizes are: Xie Jialin Prize, Tetsuji Nishikawa Prize, Hogil Kim Prize and Mark Oliphant Prize.
- 3) For the ACFA Asian School on Superconductivity & Cryogenics, please consult major labs before making a decision, to get financial and personal supports.
- 4) Geoffrey Taylor is selected as the deputy ACFA.
- 5) Wei-Shu Hou is selected as the AsiaHEP chair but this needs to be finally approved after consulting other AsiaHEP members who could not attend the meeting.
- 6) The proposal to host the next ACFA-AsiaHEP and AFAD2016 by KEK is accepted, probably in 2016 before the end of March.
- 7) Encourage the organizers of the national accelerator conferences and workshops send announcements in the ACFA webpage, and consider special sessions in English for foreign participants.
- 8) ACFA chair to strength communication with other counterpart committees.

**Appendix: Agenda for the joint meeting of the 22<sup>nd</sup> ACFA and 5<sup>th</sup> AsiaHEP**

Jan 30	Subject	Speaker/host
13:00-18:00	Touring Daya Bay Experiment	Jingyu Tang
19:30-21:00	Banquet (Luo-Han-Tang Restaurant)	Yifang Wang
Jan 31	Venue: CSNS Campus A1-104	
9:00-9:10	Opening address/member introduction	Yifang Wang
9:10-9:30	Activities at IHEP	Gang Chen
9:30-9:50	Introduction to the CSNS project	Hesheng Chen
9:50-10:05	WG report: high-power proton accelerators (prepared by Kazuo Hasegawa)	Jingyu Tang
10:05-10:20	WG report: Join linear collider physics and detector (prepared by Akiya Miyamoto)	Mitsuaki Nozaki
10:20-10:35	WG report: Network and computing	Mitsuaki Nozaki
10:35-10:45	Group photo	Jingyu Tang
10:45-11:00	Coffee break	
11:00-11:15	WG report: Cryogenics, cryomodule and superconductivity	Tripti Sekhar Datta
11:15-11:35	Recent progress of ILC project	Hitoshi Hayano
11:35-11:55	FALC report	Yasuhiro Okada
11:55-12:10	ILC R&D	Jie Gao
12:10-12:30	Report on the IPAC2016	In Soo Ko
12:30-13:30	Lunch (CSNS Canteen)	
13:30-14:30	CSNS tour	Yanwei Chen
14:30-14:40	TPS progress	Ching-Shiang Hwang
14:40-15:00	Naming of IPAC Awards when at Asia and modification of the IPAC Asia rules	Shin-ichi Kurokawa
15:00-15:20	Report on ACFA Asian School on Superconductivity & Cryogenics	Jie Gao
15:20-15:35	Coffee break	
15:35-15:55	IUPAP new commission for accelerator science	Mitsuaki Nozaki
15:55-16:15	Joint sessions among national accelerator conferences for young accelerator researchers	Mitsuaki Nozaki
16:15-16:45	Discussion on venue for next meeting, deputy ACFA chair etc	Yifang Wang
16:45-17:15	Free discussions	Yifang Wang
17:15	Adjourn	