

REPORT OF SCIENCE BOARD

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The Science Board met on October 13 (18:00-21:00), to discuss those agenda items with financial implications for 2000 and beyond. The remainder of the Science Board agenda was considered on October 16 (08:30-12:30). Dr. Stewart (Skip) M. McKinnell served as rapporteur (See *SB Endnote 1* for participants). The Science Board Chairman, Ms. Patricia Livingston, welcomed the members of Science Board and observers and called the meeting to order. She reviewed the agenda and asked for changes and additions. The agenda was adopted without changes (*SB Endnote 2*).

Inter-sessional meetings proposed for year 2000 and beyond (Agenda Item 3a) (See Decision 99/S/1)

Science Board reviewed inter-sessional meetings, Working Group and CCCC Program workshops. The following list was developed, endorsed and forwarded to Governing Council for approval:

- a. An NPAFC-hosted workshop (organized by NPAFC and PICES) on "Factors Affecting Production of Juvenile Salmon: Comparative Studies on Juvenile Salmon Ecology between the East and West North Pacific Ocean" on October 29th, 2000, in Tokyo, Japan;
- b. A BASS Workshop on "Development of a conceptual model of the Subarctic Pacific Basin Ecosystem(s)", a MODEL Workshop on "Strategies for coupling higher and lower trophic level models", a MONITOR Workshop on "Progress in monitoring the North Pacific", a REX Workshop on "Trends in herring populations and trophodynamics", and a Technical Workshop on "The basis for estimating the abundance of marine

birds and mammals, and the impact of their predation on other organisms", October 2000 (immediately prior to PICES IX), in Hakodate, Japan;

- c. An NIES-hosted Symposium/Workshop on "North Pacific CO₂ data synthesis" (co-sponsored by PICES and JST/CREST), October 2000 (4 days, immediately prior to PICES IX), in Tsukuba, Japan;
- d. A Planning Workshop on "Designing the iron fertilization experiment in the Subarctic Pacific" (co-sponsored by PICES and CRIEPI), October 2000 (2 days immediately prior to PICES IX), in Tokyo, Japan;
- e. A CREAMS/PICES Workshop on "Oceanography of the East Asian Marginal Seas", May 2000, in Vladivostok, Russia.

The following inter-sessional meetings were previously approved and will occur after PICES VIII (Decisions 98/S/2 and 98/S/7):

- f. A CCCC/MODEL Workshop on "Lower trophic level modeling", January 31-February 3, 2000, in Nemuro, Japan. (Note that this was originally proposed to occur January 24-31, 2000);
- g. "Beyond El Niño: A conference on Pacific climate variability and marine ecosystem impacts, from the Tropics to the Arctic" (co-sponsored by PICES, IATTC, IPHC, ISC, NPAFC and SCOR), March 23-26, 2000, in La Jolla, U.S.A.;
- h. A mini-workshop on "Zooplankton ecology of the North Atlantic and North Pacific" in conjunction with the meeting of the ICES Working Group on

Zooplankton Ecology, April 17-19, 2000, in Honolulu, U.S.A.

Travel support requests for year 2000 (Agenda Item 3b) (See Decision 99/S/2)

Three general categories of travel were discussed to determine their relative priority for financial support from PICES: (1) invited speakers to the Annual Meeting, (2) Working Group preparation, and (3) PICES representatives attending meetings of other organizations. Science Board agreed with the priority as amended. Travel requests within each of these categories were presented by each Committee and Program chairman. Science Board recommended that Governing Council approve the following travel support:

- a. At least the equivalent of full support for one invited speaker per Scientific Committee or Program to attend the PICES Annual Meeting;
- b. One Co-Chairman of the new MEQ Working Group on Ecology of Harmful Algal Blooms in the North Pacific to visit inter-sessionally the other Co-Chairman for developing a working plan;
- c. Science Board Chairman to attend the 2000 ICES Symposium on "100 Years of Science under ICES" in Helsinki, Finland, August 1-4, 2000;
- d. One person to attend the SCOR General Meeting in Washington, DC, U.S.A., October, 2000.

Proposed list of publications in 2000 and beyond (Agenda Item 3c) (see Decision 99/S/3)

Science Board reviewed the list of proposed publications and recommended that the following reports be published:

- a. Final Report of WG 11 (Consumption of Marine Resources by Marine Birds and Mammals), the Japan/East Sea Bibliography, and Proceedings of the 1999 MONITOR and REX Workshops and the 2000 MODEL Workshop in the PICES Scientific Report Series;
- b. Progress reports of WG 8 on Practical Assessment Methodology), WG 12 (Crabs and Shrimps), and WG 13 (CO₂ in the North Pacific) in the 1999 PICES Annual Report;
- c. Selection of papers from the 1999 Science Board Symposium on "The nature and impacts of North Pacific climate regime shifts" in a special issue of Progress in Oceanography;
- d. Selection of papers from the Beyond El Niño Conference in a special issue of Progress in Oceanography (part of BEN budget);
- e. Selected papers from the MODEL Workshop on "Lower trophic level modeling" in Fisheries Oceanography in 2001;
- f. Review and results from the PICES WG 13 Technical/CO₂ Intercalibration Workshop, in a bilingual (English/Japanese) report, published by the National Institute of Environmental Studies, Japan (at no cost to PICES).

Future of Working Groups and Scientific Programs (Agenda Item 4d) (see Decision 99/S/4)

Science Board recommended:

- a. WG 8 on Practical Assessment Methodology continue for one more year to complete collation, editing and publication of results from the MEQ Practical Workshop (expected completion date: fall 2000);

- b. WG 10 on Circulation and Ventilation in the Japan/East Sea be disbanded and the WG 10 report be published on the PICES website as a revisable document;
- c. WG 11 on Consumption of Marine Resources by Marine Mammals and Birds be disbanded;
- d. WG 12 on Crabs and Shrimps continue for one more year to complete collation, editing and publication of results (no further meetings of the Working Group are required);
- e. WG 14 on Effective Sampling of Micronekton continue for at least two more years. Dr. Richard Brodeur (U.S.A.) replace the current Co-Chairman, Dr. Bruce Robison (U.S.A.).
- e. To account for gaps in expertise and/or national representation, additional members from Korea and China are requested;
- f. Adoption of revised terms of reference for MONITOR Task Team (see GC Appendix B (i)).

The following new PICES Groups were recommended (see Decision 99/S/5):

- a. Advisory Panel on Marine Mammals and Birds (under BIO) with a life span of 5 years (see GC Appendix B (ii) for terms of reference);
- b. Advisory Panel on Continuous Plankton Recorder Survey in the North Pacific (under CCCC/MONITOR) with a life span of 2 years (see GC Appendix B (iii) for terms of reference);
- c. Working Group on the Ecology of Harmful Algal Blooms in the North Pacific (under MEQ) (see GC Appendix B (iv) for terms of reference);

- d. Working Group on Climate Change, Shifts in Fish Production, and Fisheries Management (under FIS) (see GC Appendix B (v) for terms of reference).

Relations with other international organizations (Agenda Item 4e) (see Decision 99/S/6)

PICES maintains a Standing List of International Organizations and Programs (revised annually) to indicate which of these should be regularly attended by a PICES representative to facilitate interaction. Science Board endorsed a revised list and forwarded it to Governing Council for approval (see GC Appendix C (i)).

The Scientific Committees and CCCC Program identified the following as their highest priority:

- CCCC: GOOS, GLOBEC
- MEQ: GIWA, GOOS
- FIS: GOOS-LMR, AMAP/ACIA
- BIO: ICES WGZE, GLOBEC
- POC: ARGO, CREAMS, CLIVAR, GOOS, JGOFS, WESTPAC, NEAR-GOOS, SCOR, IOC

Science Board recommended that committees draft letters of interest to the following programs: CLIVAR (POC), NEAR-GOOS (POC), ARGO (POC), GIWA (MEQ), and ICES WGZE (BIO).

PICES relations with GOOS were highlighted as particularly important by most Scientific and Technical Committees and the CCCC Program. Science Board recommended that PICES strengthen its relationship with various GOOS components.

PICES IX Annual Meeting structure (Agenda Item 5a) (see Decision 99/S/7)

A proposal for enhancing the PICES Annual Meeting was discussed by Science Board. Topics included (1) the timing of the Science Board Symposium, (2) the role and visibility of posters, (3) Paper Sessions, and (4) the visibility of young scientists at PICES (See *SB Endnote 3* for the detailed proposal). The proposal was adopted after revision.

The proposal to discontinue the Paper Sessions was not approved but it was generally agreed that Paper Sessions could be considered optional, depending on the number of sessions proposed at each Annual Meeting. Some members of Science Board felt that the opportunity to give an oral presentation outside of themes identified by the committees is an important factor in attracting scientists and new ideas to PICES. The proposals to move the Science Board Symposium to the first day of the Annual Meeting, and to upgrade the visibility of poster sessions (which would also include electronic posters) were endorsed by Science Board. Rather than institute a new award for Best Student Presentation, Science Board recommended that the Chairman's Handbook be revised to reflect the importance of selecting a young scientist for the Best Presentation Award of each committee.

Science Board agreed that young scientists should be advised that some travel funds are available to support their involvement in PICES, and Science Board agreed that the Secretariat, in consultation with the Science Board Chairman, should identify the number of young scientists to receive travel support each year.

PICES Ninth Annual Meeting Topic Sessions and Science Board Symposium (Agenda Item 4c)

Science Board recommended that the following events be held at or in association with PICES IX:

1. Subarctic Gyre processes and their interaction with coastal and transition zones: physical and biological relationships and ecosystem impacts (3/4 day) (SB);
2. Prey consumption by higher trophic level predators in PICES regions: implications for ecosystem studies (1/2 day) (BIO);
3. Recent progress in zooplankton ecology study in PICES regions (1 day) (BIO/CCCC – CCCC agreed to co-sponsor this session in discussion following PICES VIII);
4. Short life-span squid and fish as keystone species in North Pacific marine ecosystems (1 day) (FIS);
5. Large-scale circulation in the North Pacific (1/2 day) (POC);
6. North Pacific carbon cycle and ecosystem dynamics (1 day). (POC/BIO – BIO agreed to co-sponsor this session in discussion following PICES VIII);
7. Results of GLOBEC and GLOBEC-like projects (1 day) (CCCC);
8. Environmental assessment of Vancouver Harbour: results of an International Workshop (1/2 day) (MEQ);
9. Science and technology for environmentally sustainable mariculture in coastal areas (1 day) (MEQ).

Science Board agreed that the duration or number of Topic Sessions could be reduced by Science Board in consultation with the Secretariat, if there are too many concurrent sessions.

Science Board recommended that CCCC Task Teams/Advisory Panels and the BIO

Technical Workshop on "The basis for estimating the abundance of marine birds and mammals, and the impact of their predation on other organisms" meet in the same facility just prior to PICES IX, to allow members to attend each other's sessions.

Science Board recommended that PICES co-sponsor the CREAMS Workshop on "Oceanography of the East Asian Marginal Seas" (May 2000, Vladivostok), and suggested that PICES collaborate with CREAMS in planning the workshop to assist CREAMS in becoming more ecosystem-oriented.

Other items (Agenda Item 4g)

Best Presentation Award winner

Dr. Nathan Mantua (U.S.A.) received the 1999 Science Board Best Presentation Award for his paper (co-authored with Dr. Steven Hare) entitled "On the assessment and identification of recent North Pacific climate regime shifts".

Strategic Workplan (Agenda Item 4a)

Science Board briefly discussed the importance of strategic plans and updating these on an annual basis. The following addition was made to the Science Board Strategic Plan:

- Approved new structure of PICES Annual Meeting ;
- Approved planning of PICES 10th Anniversary Symposium;
- Provided further guidance on implementing/advertising young scientists' travel grant;
- Renewed the practice of updating and prioritizing the list of international programs for PICES collaboration;
- Developed a list of possible topics for future Science Board Symposia (see *SB Endnote 4*).

Other business (Agenda Item 7)

PICES Bureau

Science Board endorsed the principle of the Secretariat's proposal to form a PICES Bureau to assist in the long-range planning of PICES.

PICES X

Science Board endorsed the proposal to hold the PICES Tenth Annual Meeting in Victoria, Canada, and to convene a special anniversary symposium at PICES X (rather than a special inter-sessional meeting for this purpose). Science and Technical Committee Chairmen and CCCC Program Co-Chairmen each nominated one person to an organizing committee for this symposium. The members of the organizing committee are: Patricia Livingston (SB Chairman), Tsutomu Ikeda (BIO), Douglas E. Hay (FIS), John E. Stein (MEQ), Susan E. Allen (POC), David W. Welch (CCCC), and Thomas C. Royer (TCODE).

Publication policy

Science Board discussed the report of the Publication Committee (see Publication Committee report in this Annual Report) and made the following observations and recommendations:

Science Board agreed with the concept that the Local Organizing Committee be responsible for arranging to have suitable numbers of copies of the extended abstracts of papers printed for distribution at the meetings and recommended that this practice be adopted every year.

Science Board discussed the proposal for submitting electronic versions of extended abstracts and mentioned several difficulties that might be associated with such a proposal (difficulty of accessing this on the

web for some scientists, extra work for the Secretariat, and size and format of the files). However, Science Board suggests the implementation of a pilot project (using POC papers) to assess the feasibility of this suggestion. The suggestion of CD-ROM publication of extended abstracts would be deferred to next year.

Science Board agreed with the recommendation that translation of scientific papers be handled on a case-by-case basis and only be endorsed for papers of exceptional merit.

Science Board required further discussion on the possibility of a PICES Tenth Anniversary Publication. Science Board did not want this publication to interfere with PICES present publication preparation and emphasized the need for such a publication to encompass the interests of all PICES scientific disciplines.

Science Board appointed Dr. Howard J. Freeland (Canada) as the Chairman of the Publication Committee.

Working Group nomenclature

Science Board recommended instituting the practice of referring to Working Group by number AND a short title.

Chairman's Handbook revisions (Agenda Item 6)

Science Board identified changes that

should be made to the Handbook for Chairmen and Convenors (improving Best Presentation Award advice, definition of Advisory Panels, number of approved keynote speakers, etc.). The Science Board chairman agreed to draft these changes by the end of the year, for consideration by Science Board.

Scientific Committee Terms of Reference

Science Board agreed to review the terms of reference for Science Board and Permanent Committees by e-mail to determine if revisions are required.

Implementation of PICES VII decisions and Science Board recommendations (Agenda Item 4b)

Science Board reviewed progress on implementing of PICES VII decisions and Science Board recommendations (See *SB Endnote 5*).

Closing remarks (Agenda Item 9)

The Science Board Chairman thanked outgoing FIS Chairman, Dr. Chang-Ik Zhang, for his hard work and dedication to PICES over the last three years and welcomed the new FIS Chairman, Dr. Douglas E. Hay. The meeting was adjourned.

SB Endnote 1

Participation List

Patricia Livingston (Chairman, Science Board)*
Tsutomu Ikeda (Chairman, BIO)*
Chang-Ik Zhang (Chairman, FIS)*
Alexander V. Tkalin (Chairman, MEQ)*
Vyacheslav B. Lobanov (Chairman, POC)*

Other

Robin Brown (Chairman, TCODE)*
Suam Kim (Co-Chairman, CCCC/IP)*
David W. Welch (C-chairman, CCCC/IP)*

Warren S. Wooster (Interim Chairman,
Publication Committee)
Richard J. Marasco (Chairman, F&A)*
Douglas E. Hay (Chairman-elect, FIS)*
Alexander S. Bychkov (Executive Secretary)

Stewart (Skip) M. McKinnell (Asst.
Executive Secretary, PICES)*

*In attendance October 16, 1999

SB Endnote 2

Agenda

October 13, 1999

1. Welcome and opening remarks
2. Adoption of agenda
3. Reports of the SB Chairman, Scientific, Technical, and Publication Committees, CCCC IP, Working and Study Groups with regard to items having financial implications for 2000 and beyond:
 - a. Inter-sessional meetings proposed for year 2000 and beyond;
 - b. Travel support requests for year 2000;
 - c. Proposed list of publications (PICES Scientific Report series and outside journals) for year 2000 and beyond;
 - d. Other items.

October 13 and 16, 1999

4. Reports of the Science Board, Scientific, Technical, and Publication Committees, CCCC IP, Working and Study Groups with regard to other items:
 - a. Brief summary report of the group's activities in the past year (including progress with regard to strategic workplan items);
 - b. Completion of items that were PICES VII decisions by Science Board and Governing Council;

- c. Proposed titles for Topic Sessions and Symposia for the next Annual Meeting (that includes a short paragraph of the goals of the sessions suitable to be put in the first and final announcements and a list of potential convenors);
- d. Proposed list of any future groups along with terms of reference and a list of potential members;
- e. Relations with other International organizations;
- f. Proposed recommendations and draft text on other items that would be included in the Science Board Report to Council (e.g., recommendations for letters of support to various research efforts);
- g. Other items (including Best Presentation Award winner).
5. PICES IX Annual Meeting:
 - a. Structure
 - b. Topic Sessions and Science Board Symposium
6. Chairman's Handbook revisions
7. Other business
8. Summary of Science Board recommendations
9. Closing remarks

SB Endnote 3

Proposal for New Structure to PICES Annual Meeting

Comments and criticisms received over the last year with regard to the structure of the PICES meeting has led to the following proposal. This proposal seeks to streamline the PICES Annual Meeting, focus our efforts on promoting an interdisciplinary ecosystem approach, promote the participation of young scientists, and upgrade the visibility of poster sessions. The revised structure of the PICES Annual Meeting will include:

- 1. Moving the Science Board Symposium to the afternoon of the first day**

Many comments have been made about having the Science Board Symposium last. Often people are in a rush to leave and participation is sporadic from year to year. Making this the first session of the meeting will bring everyone together for interdisciplinary talks that will highlight a key marine science issue (that may also be the focus of the keynote lecture given during the morning of the first day). Everyone

will be fresh and receptive to hearing talks on an important issue.

2. Promoting more inter-committee topic sessions, removing the paper sessions, and upgrading the visibility of the poster sessions

If we are to attract quality scientists and papers to the meetings and promote our interdisciplinary, ecosystem approach to North Pacific marine science we should focus on quality topic sessions for committees and promote inter-committee topic sessions. The paper sessions have tended to be the place to put things those do not fit and are sporadic in terms of the number, quality and session attendance. By removing the paper sessions, we will focus more on topic sessions and interdisciplinary sessions. Simultaneously, the poster sessions can be enhanced (and papers that might have gone to paper session can be put into the poster session) by having a formal poster viewing time near the end of each day in conjunction with a social hour. Posters to be focused on for each day can be summarized just prior to the poster session by a person appointed by each committee. This summary would consist of an overview of the posters for a particular topic/committee and it would be given to the attendees showing up for the

social hour in the area of the posters. Poster presenters for that session would be required to stand by their poster for that social hour. We should institute an award for Best Poster Presentation. This award would be selected from all the posters presented at the meeting.

3. Promote the participation of young scientists

We can increase the participation of young scientists through a young scientists travel fund, which would come from the PICES Trust Fund. On an annual basis, we would put in our Annual Meeting announcements a call for nominations of young scientist's to participate in the annual meeting. Young scientists would be required to submit their abstract, a CV, and a request for travel support to the Secretariat. Selection of young scientists to participate in the meeting would be made on the basis of availability of funds and the amount of participation of the young scientist in the activities of the PICES Annual Meeting. Selection would be made by Science Board in consultation with the Secretariat. Finally, we should institute an award for Best Student Presentation. This presentation would be selected from among all the papers and posters at the meeting.

SB Endnote 4

Science Board Symposium Topic List

Science Board symposium topics may involve several scientific disciplines or highlight an important region or topic area of broad interest to the PICES scientific community. Sometimes topics are suggested by Scientific Committees or Programs or may be developed in consultation with the national committee organizing the PICES Annual Meeting if there are topics that may be of high regional interest. This list of possible topics should

be reviewed and updated annually to reflect interdisciplinary topics that are of the greatest interest.

- Technological advancements in observing systems
- Mechanisms of interaction between the North Pacific subtropical and subarctic gyres
- Spatial dynamics of ecosystems
- Regional ecosystem programs of the North Pacific

- Japan/East Sea ecosystem
- East China Sea ecosystem
- Ecosystem dynamics of North Pacific Marginal Seas
- Present state and future directions of North Pacific marine policy
- Change indicators in North Pacific ecosystems (could also be Working Group)
- Conservation biology in marine ecosystems
- Introduction and distribution of exotic Species

SB Endnote 5

Progress on PICES VII decisions and Science Board recommendations

Part A. Decisions

98/S/1: Inter-sessional Workshops and Working Group Meetings

The following inter-sessional meetings were convened:

- a. A 2-week MEQ Practical Workshop was held in Vancouver (Canada) in May 1999;
- b. A 4-day WG 13 Technical Workshop was held in Tsukuba (Japan) in April 1999;
- c. A 5-day WG 12 meeting was held in August 1999 in the People's Republic of China.

98/S/2: CCCC Program and CCCC-IP Task Teams

- a. The BASS Task Team planned to convene a 2-day workshop on Development of a conceptual model for the Subarctic North Pacific Gyres immediately prior to the PICES Eighth Annual Meeting in Vladivostok. Due to the absence of one convenor and insufficient attendance at the workshop it was not held;
- b. The MONITOR Task Team convened a 2-day Workshop immediately prior to the PICES Eighth Annual Meeting in Vladivostok. Co-convenors were Yasunori Sakurai (Japan) and Bruce A. Taft (U.S.A.);

- c. The REX Task Team convened a 2-day workshop on Herring and euphausiids immediately prior to the PICES Eighth Annual Meeting in Vladivostok. Co-convenors were Douglas E. Hay (Canada), William T. Peterson (U.S.A.), Vladimir I. Radchenko (Russia) and Tokio Wada (Japan);
- d. The MODEL Task Team should convene a 3-day workshop on Prototype lower trophic level ecosystem model for comparison of different marine ecosystems in the North Pacific, in Nemuro, Japan, in early 2000. Outside funding was obtained for this workshop from the Japanese Science and Technology Agency and Nemuro City. Dates for the workshop have now been fixed at January 24-27, 2000. (Dates have subsequently been changed to January 31-February 3, 2000).

98/S/3: Publications

The following reports were recommended for publication and publication status is as follows:

- a. Progress reports of Working Groups 8, 11-14 and the report of the Publication Study Group were published in the 1998 Annual Report;

- b. Revised PICES Handbook and Handbook for Chairmen and Convenors were published;
- c. Selection of papers from the 1997 Science Board Symposium on “Ecosystem dynamics in the eastern and western gyres of the subarctic Pacific” was published in the special issue of Progress in Oceanography;
- d. Selection of papers from the 1998 Science Board Symposium on “Impacts of the 1997/98 El Niño events on the North Pacific Ocean and its Marginal Seas” was published as PICES Scientific Report No. 10;
- e. Proceedings of the MODEL, REX and MONITOR 1998 Workshops were published as PICES Scientific Report No. 11;
- f. Proceedings of the Second PICES Workshop on the Okhotsk Sea and adjacent areas was published as PICES Scientific Report No. 12;
- g. WG 10 report was recommended for publication in the PICES Scientific Report Series. Reviews of the draft report have been completed and publication is pending the receipt of a revised report. (At PICES VIII, POC recommended that this report be published on the PICES website only, as a revisable document.);
- h. Review volume on “Dynamics of the Bering Sea” was published by University of Alaska Sea Grant (PICES VI decision).

98/S/4: Future of Working Groups

- a. WG 10 on Circulation and Ventilation in the Japan/East Sea was proposed for disbanding in spring 1999 after the POC Committee’s approval of the publication of the final report. POC committee approved this report at the PICES VIII meeting so WG10 is now disbanded;
- b. WG 11 on Consumption of Marine Resources by Marine Mammals and

Seabirds continued its work for one more year and produced a final report that was presented at PICES VIII. Simultaneously, a new Study Group to propose ways to incorporate marine birds and mammals expertise into the PICES structure and activity was established and prepared a new proposal that was accepted at PICES VIII by Science Board;

- c. Terms of reference for WG 14 on Effective Sampling of Micronekton were expanded to include the ecological role of micronekton in addition to sampling methods.

98/S/5: New PICES groups

A new standing Publication Committee reporting to Science Board was established with membership consisting of one participant from each member country, selected by Science Board from among members of the PICES Scientific Committees, Working Groups, and Task Teams, together with an elected Chairman and a representative of the Secretariat. Members were nominated inter-sessionally and a letter seeking the support of national delegates for the members of the Committee was sent by the PICES Secretariat. The following members were appointed to the Committee:

- Dr. Howard Freeland (Canada),
Chairman
- Prof. Qi-Sheng Tang (China)
- Prof. Takashige Sugimoto (Japan)
- Dr. Jang-Uk Lee (Korea)
- Dr. Vyacheslav Lobanov (Russia)
- Dr. Warren Wooster (USA)
- Dr. Stewart McKinnell (Secretariat)

98/S/6: Travel support

- a. PICES provided partial support for Dr. Chang-Ik Zhang (FIS Chairman) to attend a joint SCOR WG 105 and ICES symposium on “The Ecosystem Effect of

Fishing” in Montpellier, France, in March 1999;

- b. PICES funded travel for two experts to provide a keynote demonstration and/or presentation at the TCODE Workshop on “The application of scientific visualization to marine ecosystem analysis” in conjunction with the PICES Eighth Annual Meeting in Vladivostok;
- c. PICES provided financial support for three scientists to attend the REX Workshop on “Herring and euphausiids”;
- d. PICES funded travel of one invited speaker for the CCCC-related scientific session at the PICES Eighth Annual Meeting.

98/S/7: Co-sponsored meetings

- a. PICES will co-sponsor a 4-day conference “Beyond El Nino: A conference on Pacific climate variability and marine ecosystem impacts, from

the Tropics to the Arctic” to be held in La Jolla, U.S.A., March 23-26, 2000, with IPHC, IATTC, ISC, NPAFC, and SCOR. The Steering Committee, appointed by the co-sponsoring organizations, included Drs. Paul H. LeBlond and Warren S. Wooster who are serving as Co-Chairmen of the Steering Committee on behalf of PICES. Sections convenors have been selected and planning is proceeding.

- b. PICES will participate in a 3-day meeting held with the ICES Working Group on Zooplankton Ecology from April 17-19 in Honolulu, Hawaii, U.S.A. Dr. Tsutomu Ikeda (BIO Chairman) represents PICES as a co-organizer of the joint ICES/PICES parts of the meeting. Discussions are proceeding regarding a mini-workshop on “Zooplankton production ecology of the North Pacific and North Atlantic” in conjunction with this meeting.

Part B. Progress on PICES VII Science Board Recommendations

Japan/East Sea Bibliography

Science Board recommended the publication of the Japan/East Sea Bibliography on the PICES Home Page pending author’s (Dr. Mikhail A. Danchenkov, FERHRI, Russia) approval. This proposal was not accepted by Dr. Danchenkov. At PICES VIII, publication in the PICES Scientific Report Series was recommended.

Advisory Panel on Iron Fertilization Experiment

CCCC/IP established an Advisory Panel (under BASS) on “An Iron Fertilization Experiment in the Subarctic Pacific Ocean.”

The group met at PICES VIII (see CCCC report in this Annual Report). Its present

timetable is to have a planning meeting in conjunction with PICES IX and to write proposals to representative governments for submission by April-June 2000. Presently the iron fertilization experiment is planned for August 2002 in the eastern North Pacific and for 2001 or 2003 in the western North Pacific.

CCCC Best Presentation Award

An award for Best Presentation was given by the CCCC Program during PICES VIII and this will continue in future years.

Proceedings from Annual Meetings

The Korean proposal to publish proceedings from the PICES Annual Meetings was referred to the Publication Committee for consideration at PICES VIII. They agreed that proceedings of scientific sessions

would be too expensive to produce and unnecessary when PICES is moving toward putting extended abstracts on the web.

PICES – ARGO/GODAE relations

Science Board recommended at PICES VII that PICES member countries create appropriate structures (such as national committees, or GOOS sub-committees) to consider and prepare for participation in GODAE and ARGO, and that data from ARGO and assimilation results from

GODAE originating from PICES member countries be made generally available to all scientists. These structures were established by many nations, and PICES scientists (Drs. Stephen C Riser (U.S.A.), Howard J. Freeland (Canada) and Takashige Sugimoto (Japan)) are playing leading roles in these activities.