

Resolutions for ICES-sponsored symposium

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1 Symposium on “International Symposium on Small Pelagic Fish: New Frontiers in Science for Sustainable Management”

2020/3/EPDSG01 An **International Symposium on “Small Pelagic Fish: New Frontiers in Science for Sustainable Management”** will be held 21-25 February 2022, in Barcelona, Spain, with Marta Coll (Spain, ICES), Myron Peck (Germany, ICES), Ryan Rykaczewski (USA, PICES), Ignacio Catalán (Spain, ICES), Akinori Takasuka (Japan, PICES) and Miguel Bernal (FAO-GFCM) as co-conveners.

A Scientific Steering Group and/or an Organizing Committee will be established with members nominated by ICES and PICES and the newly-formed joint ICES/PICES Working Group on Small Pelagic Fish (WGSPF) in order to assist the conveners in planning the symposium. The ICES Secretariat will be involved in the Scientific Steering Group and/or Organizing Committee.

Supporting information

Priority:

The symposium forms a key Term of Reference of the joint ICES/PICES WGSPF who will have their kick-off meeting at ICES HQ in early March 2020. FAO will be a co-sponsor.

The symposium has a very high priority for ICES, PICES and FAO. The science to be highlighted at the symposium aligns with at least five of the seven science priorities set in the ICES Strategic Plan, including: (1) Ecosystem science, (2) Impacts of human activities, (3) Observation and exploration, (4) Seafood production and (5) Conservation and management science. The symposium will also contribute to the first three of the six goals identified in the PICES Strategic Plan: (1) Foster collaboration among scientists within PICES and with other multinational organizations; (2) Understand the status and trends, vulnerability, and resilience of marine ecosystems; and (3) Understand and quantify how marine ecosystems respond to natural forcing and human activities. FAO's involvement is important to ensure effective engagement of researchers working on the dynamics of SPF in regions outside ICES and PICES areas such as the Mediterranean (GFCM) and Black Sea and southern hemisphere (e.g., Benguela and Humboldt EBUS).

Scientific justification:	<p>Small pelagic fish (SPF) account for more than 30% by weight of the total landings of marine capture fisheries around the world and play an important role in the transfer of energy through mid-trophic levels in marine ecosystems and in global protein security. Oscillations of SPF populations are dramatic and cyclical in response to climate variability on multi-decadal scales. Researchers around the world continue to coordinate efforts to understand the mechanisms linking climate variability to basin-scale teleconnections in the population dynamics of SPF. This international collaboration was spearheaded by the GLOBEC Regional Program on Small Pelagic Fish and Climate Change (SPACC) from 1994 to 2010. In the most recent decade, ICES and PICES have co-sponsored two symposia on SPF, including in 2012 (Nantes, France) and 2017 (Victoria, Canada). The latter re-confirmed the need to meet every 3 to 4 years to discuss, debate and collaborate to further improve the science-based advice required to sustainably manage SPF in an ecosystem context.</p> <p>Substantial scientific progress continues to be made on understanding the drivers and dynamics of SPF in several ecosystems: different hypotheses of mechanisms of population dynamics of SPF continue to be tested, data from long-term monitoring and stock-assessment efforts continue to accumulate, numerical modelling approaches continue to advance, technologies, such as genome analysis, continue to rapidly develop, and experience continues to be gained from management decisions and stakeholder involvement. The exchange of information and ideas drawn from comparable populations across the globe are, therefore, particularly insightful as we seek to improve management strategies. The proposed symposium will highlight the state-of-the-art in these and other topics surrounding the sustainable exploitation of SPF within an ecosystem context.</p>
Resource requirements:	<p>A conference fee will cover the majority of the financial resource requirements of the symposium. The joint ICES/PICES WGSPF will also perform fundraising to help defray international travel costs. Funding requests will be submitted to global, regional and national agencies. Additional requests will be sent to businesses with interests in SPF. Some example includes IFFO (Petter Martin Johannessen), PFA (Maartin Pastoors) and the Danish Pelagic Reduction Fisheries (Claus R. Sparrevohn).</p>
Participants:	<p>Similar to the global composition of the joint ICES/PICES WGSPF, a wide range of participation of ICES and PICES member and other countries (via FAO) is anticipated. Attendance at this 2021 symposium is expected to be approximately 250 participants, similar to the size and breadth of the 2017 PICES/ICES SPF symposium (237 participants from 31 countries).</p>
Secretariat facilities:	<p>ICES Secretariat will advertise the event through its professional network and the potential participation of its science officers in the Scientific Steering Group (SSG) and/or Organizing Committee (OC). As a member of the SSG and/or OC, the secretariat's science officers will also be involved in designing / co-convening theme sessions and/or workshops. The PICES Secretariat will support the symposium website including on-line registration, abstract submission, fee payments, etc. Having symposium coordinators, one person from each ICES and PICES, is suggested to coordinate activities.</p>
Financial:	<p>The conveners request 10,000€ from ICES to support travel of selected early career scientists. Similar resources will be provided by PICES for general support. The symposium has been tentatively approved by PICES (GC Decision 2019/S/1).</p>
Linkages to the Advisory Committee:	<p>The symposium is not directly linked to the remit of any advisory group but it should be of interest to any stock assessment group working on SPF (e.g., HAWG, WGBFAS, WGWIDE).</p>
Linkages to other committees or groups:	<p>The symposium will be part of the activities of the joint ICES/PICES WGSPF within the Ecosystem Processes and Dynamics SG (Silvana Birchenough). The symposium will also be of interest to the Aquaculture SG (Mike Rust). The symposium will be linked to ongoing activities in at least two Strategic Initiatives including the SIHD and the ICES/PICES SICCME. The science discussed will be relevant to a number of ICES WGs including WGACEGG, WGALES, WGCOMEDA, WGHANSA, WGIPEM, WGMEGS, and other WG (e.g., integrated ecosystem assessment). The symposium is co-chaired by FAO and PICES and will link closely to their groups.</p>

Linkages to other organizations: This is a joint ICES-PICES-FAO symposium. The WGSPF is within PICES FIS (Xianshi Jin) and FUTURE (Steven Bograd and Sukyung Kang). FAO links include the FAO-GFCM (Miguel Bernal). Other regional fisheries organizations will be contacted, including the North Pacific Fisheries Commission (Kenji Kagawa), as well as national management bodies such as US NOAA NMFS (Jason Link) and Fisheries and Oceans Canada (Arran McPherson).

Publication of proceedings The proceedings of the symposium will be published in a peer-reviewed journal. Various journals will be approached (e.g., *Progress in Oceanography*, *Marine Ecology Progress Series*, *Frontiers in Marine Science*, etc.). The ICES Journal Marine Science is not requested.

2 Symposium: “ICES 4th Symposium on Decadal Variability of the North Atlantic and its Marine Ecosystems: 2010–2019”

2020/3/EPDSG02 A symposium on “ICES 4th Symposium on Decadal Variability of the North Atlantic and its Marine Ecosystems: 2010–2019” will be held during August 2021 [tentative 3 days], at Bergen (Norway) with Øystein Skagseth and Kjell Arne Mork (Norway), Cesar Gonzalez-Pola (Spain), Paula Fratantoni (USA), Caroline Cusack (Ireland), Stephen Dye (UK) and Barbara Berx (Scotland) as conveners. The symposium date will be set in coordination with ICES to avoid conflict with the ICES Annual Science Conference.

A Scientific Steering Committee and an organizing committee will be established with members nominated by relevant Working Groups or other relevant ICES bodies from among the ICES network of research institutes in order to assist the conveners in planning and executing the symposium. The Scientific Steering Group will include ICES WGOH members Cesar Gonzalez-Pola (Spain), Paula Fratantoni (USA), Øystein Skagseth and Kjell Arne Mork (Norway), Caroline Cusack (Ireland), Stephen Dye (UK) and Barbara Berx (Scotland) and ICES Professional Officer, Julie Kellner. The Organizing Committee will include Øystein Skagseth and Kjell Arne Mork (Norway) as well as members nominated by the host institution, the Norwegian Institute of Marine Research (IMR). Some WGOH members, in particular Frederic Cyr, Femke de Jong, Ricardo Sánchez and Agnieska Beszczynska-Möller expressed their willingness to help in the preparation of the symposium.

Supporting information

Priority:	Reflecting on the scientific knowledge gained over the last decade will advance and shape our understanding of marine ecosystems in the N Atlantic and encourage new initiatives to improve ocean observation approaches that support conservation and management. The symposium would be the fourth in a series that started in 1991 with the review of the 80's decade.
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<p>Scientific justification:</p>	<p>Climate variability and change is impacting the distributions and productivity of marine species in the North Atlantic. Monitoring and predicting the effects of climate change on the distribution of habitats, and the marine species that occupy them is critical for resource management. This 4th symposium is part of a series of decadal symposiums organized by ICES, where researchers will gather to review the variability of North Atlantic environmental conditions and marine ecosystems over the past decade, with the intention of understanding the relationship between ecosystem components and how they influence the distribution, abundance and productivity of living marine resources. In addition, researchers will review recent advances in sub-decadal forecasts of ecosystem change.</p> <p>This symposium supports the intent and initiatives of the ICES Strategic and Science Plans to fulfil the ICES Vision and Mission, ensuring the science is valued. Environmental variability/ocean climate is a cross-cutting issue in these documents. Of particular relevance are the scientific priorities areas “Ecosystem Science - advancing ecosystem understanding”, “Observation and Exploration – track changes in the environment and ecosystems”, “Conservation and management – develop knowledge and evidence for conservation and management”, that inspire and engage the ICES network. The symposium will increase ICES visibility and impact of the science, foster and facilitate scientific collaborations, engaging new and early career scientists, help maintain and build strong and enduring links with regional and global partners and provide a forum to highlight key ICES WG activities, allowing scientists from multiple disciplines, to network, build relationships and share their scientific understanding of marine ecosystems. Scientific outputs from the symposium will add significant value to marine science at the global scale, e.g., the UN Sustainable Development agenda SDGs 13 “Climate Action” and 14 “life below water”.</p>
<p>Resource requirements:</p>	<p>Based on the experience of previous decadal symposia (Mariehamn (1991), Edinburgh (2001) and Santander (2011)), we expect the majority of expenses to be covered by a conference registration fee set in consultation with ICES and through local sponsorships which will be secured by the organizing committee in coordination with the host institution. It is also possible to apply for support from the Research Council of Norway. These funds will cover all symposium costs, including the cost of the venue, welcome reception, refreshments offered, registration materials, and publication costs for symposium proceedings. We do request additional financial support from ICES to support participation by early career scientists.</p>
<p>Participants:</p>	<p>Based on past symposia, we anticipate up to 150 attendees. Attendees should include career scientists, post-doctoral researchers, and students. Target audience comprise international researchers in the fields of physical, biological and chemical oceanography and fisheries science, with scientific interest in the north Atlantic Ocean, Baltic and North Seas.</p>
<p>Secretariat facilities:</p>	<p>As in previous decadal symposiums, involvement of ICES Secretariat is expected and strongly welcomed. Support is requested to create and host a symposium website with content provided by the conveners and including features to support and facilitate online registration and abstract submission. We anticipate that online abstract submissions will need to go live approximately 7 months ahead (January 2021) of the symposium (August 2021) with abstract submissions closing 2 months later (March 2021). It should be noted that target dates are subject to change, depending on final symposium conference dates which will be set in coordination with the ICES Secretariat to avoid conflict with the ICES Annual Science Conference. The ICES Secretariat will be consulted on the content of symposium announcements and Call for Papers and a request may be made for ICES to print flyers to be distributed by the conveners and Steering Group. Finally, ICES support is requested at the symposium to ensure that registration, distribution of meeting documents, agenda, programmes and other practical aspects of handling the symposium run according to plan.</p>

Financial:	ICES co-funding is expected in the terms described in the Guidelines, i.e. funding is requested from ICES to support participation by selected early career scientists. A realistic budget/cost estimation is difficult to make at this preliminary stage, so we mostly rely in the experience for last Decadal symposium in Santander and Bergen venue rental fares. Roughly we estimate a total cost of about 50k€, from which >25k€ will cover venue rental and catering and the remainder include technical facilities/web/book of abstracts edition/Travel and subsistence cost for keynote speakers/Complimentary bags and documentation/Special issue costs etc. The incomes through conference fees are estimated at 25-30k€ (assuming about 1/3 of these will be student fees and 20-30 sponsored/waived fees). In addition we anticipate 10-15k€ will be provided by local/regional sponsors. Finally, we request 10k€ from ICES to support participation by early career scientists. A more detailed budget can be developed in collaboration with ICES, including setting inscription fees for regular participants and/or students in accordance with ICES policy.
Linkages to the Advisory Committee:	The symposium focus on reviewing the decade that has just ended. While the topic is mainly aligned to scientific analysis, retrospective discussion of experiences and lessons learnt regarding advisory are also welcome.
Linkages to other committees or groups:	There are 3 WGs at ICES dealing specifically with oceanographic environment, the WGOH continuously review the updates of traditional hydrographical, the WGOOFE focus on near real-time state and operational products and S2D works on mid to long-term forecasts. The symposium expect analysis of improvements achieved during the 2010's in these issues focus of WGOOFE and S2D. Moreover, the symposium aligns with all WGs under the EPDSG coordination. The outcome of the symposium will be highly relevant for WGIBAR, WGINOR, etc.
Linkages to other organizations:	IOC-UN
Publication of proceedings	As in the previous decadal symposium (https://academic.oup.com/icesjms/issue/69/5), the aim is to prepare a dedicated volume. Guest editors have not yet been proposed.

Annex: Decadal symposium series:

1991 Mariehamn. Hydrobiological Variability in the ICES Area, 1980-1989

2001 Edinburgh. Hydrobiological Variability in the ICES Area, 1990-1999

2011 Santander. Variability of the North Atlantic and its Marine Ecosystems during 2000–2009

2021 Bergen (TBC). ICES 4th Symposium on Decadal Variability of the North Atlantic and its Marine Ecosystems: 2010-2019

1991:

<http://www.ices.dk/sites/pub/Publication%20Reports/Marine%20Science%20Symposia/ICES%20Marine%20Science%20Symposia%20-%20Volume%20195%20-%201992%20-%20Part%201%20of%2050.pdf>

2001:

<http://www.ices.dk/sites/pub/Publication%20Reports/Marine%20Science%20Symposia/Phase%202/ICES%20Marine%20Science%20Symposia%20-%20Volume%20219%20-%202003%20-%20Part%201%20of%2075.pdf>

2011: <https://academic.oup.com/icesjms/issue/69/5>

3 Symposium on “Baltic Sea Science Congress (BSSC2021)”

2020/3/IEASG03 A symposium on the 13th Baltic Sea Science Congress – understanding transitions in the Baltic Sea (BSSC2021) will be held during 14-18 June 2021, at the Lakeside Lecture Theatres in Aarhus, Denmark. The host and convenor for the Congress are the Faculty of Technical Sciences, Aarhus University.

An Organising Committee of the Congress have been established to plan the Congress program. Committee members are from Aarhus University, Denmark and Stockholm University, Sweden, and include: Professor Jacob Carstensen (chair of Scientific Committee), Professor Christoph Humborg (chair of the Scientific and Organising Committee of BSSC2019 in Stockholm), Associate professor Peter Grønkjær (Department of Biology), Nikolaj Reducha Andersen (Department of Bioscience), Charlotte Hviid (Department of Bioscience), and Anne van Acker (Department of Bioscience).

A Scientific Committee of the Congress have been established to assist the Organising Committee in planning the content of the Congress program. The Scientific Committee have members from all Baltic Sea countries with broad experience on Baltic Sea research and include: Chair of the Scientific Committee Jacob Carstensen (Aarhus University, Denmark), Agneta Andersson (Umeå University, Sweden), Alf Norkko (University of Helsinki, Finland), Anda Ikaunieca (Latvian Institute of Aquatic Ecology, Latvia), Anna Sobek (Stockholm University, Sweden), Arno Kotilainen (Geological Survey of Finland, Finland), Bo Gustafsson (Stockholm University, Sweden), Carolin Löscher (University of Southern Denmark, Denmark), Cristoph Humborg (Stockholm University, Sweden), Elinor Andrén (Södertörn University, Sweden), Gregor Rehder (Leibniz Institute for Baltic Sea Research Warnemünde, Germany), Hans Estrup Andersen (Aarhus University, Denmark), Inga Dailidienė (Klaipėda University, Lithuania), Inga Lips (Tallinn University of Technology, Estonia), Inna Sokolova (University of Rostock, Germany), Irena Telesh (Russian Academy of Sciences, Russia), Jørn Bo Jensen (Geological Survey of Denmark, Denmark), Kai Myrberg (Finnish Environment Institute, Finland), Kari Hyytiäinen (University of Helsinki, Finland), Karol Kulinski (Institute of Oceanology Polish Academy of Sciences, Poland), Lasse Riemann (University of Copenhagen, Denmark), Laura Uusitalo (Finnish Environment Institute, Finland), Maren Voss (Leibniz Institute for Baltic Sea Research Warnemünde, Germany), Markus Meier (Leibniz Institute for Baltic Sea Research Warnemünde, Germany), Monika Winder (Stockholm University, Sweden), Olga Kovaleva (A.P. Karpinsky Russian Geological Research Institute, Russia), Peter Grønkjær (Aarhus University, Denmark), Teresa Radziejewska (University of Szczecin, Poland), and Uli Bathmann (Leibniz Institute for Baltic Sea Research Warnemünde, Germany). Also, the ICES Head of Science Support is member of the Scientific Committee, and decision makers and stakeholders are, if not included as members of the Scientific Committee, given the opportunity to give input to the Scientific Committee and the Organising Committee to strengthen the purpose of connecting scientists and decision makers.

Supporting information

Priority:

The Baltic Sea is important for many people as around 85 million people live in the surrounding area. Human activities on land and sea influence the status of the Baltic Sea. Eutrophication due to excessive inputs of nutrients has for many decades affected the marine environment in the Baltic Sea and still does. Other pressures such as hazardous substances, marine litter, underwater sound, fishery, non-indigenous species and sand/gravel extraction also affect the marine environment including habitats, food webs, mammals, fish and birds. Further, climate-related changes in water temperature and salinity is expected which can change the distribution of species. In fact, the Baltic Sea has been exposed drastically to a multitude of human pressures and, therefore, serves as a time-machine for predicting changes in other coastal oceans (Reusch et al. 2018; Sci.Adv.). Improvements of the environmental status have been observed in the Baltic Sea (described in HELCOM State of the Baltic Sea report, 2018), but this is a slow process mainly due to limited level of water exchange in the Baltic Sea. The status of the marine environment in the Baltic Sea is important not just for the ecosystem health itself but also for human well-being and for the marine ecosystems ability to provide goods i.e. important for the national economies.

The first Baltic Sea Science Congress was held in Rønne, Denmark, in 1997 and is now a key international event addressing a broad interdisciplinary spectrum of Baltic Sea research from physical and biogeochemical settings to climate issues with implication for the ecosystem status and biodiversity. It also attracts researchers outside of the Baltic region. The Congress addresses fundamental science issues and also focuses on interdisciplinary science and management issues.

The purpose of BSSC2021 is to bring together scientist e.g. biologists, oceanographers, geologists working on issues related to the Baltic Sea Region to present the most recent research and to discuss status, trends, and the future of the Baltic Sea as well as future research needs.

In 2021, the update of the HELCOM Baltic Sea Action Plan is expected to be adopted and the UN Decade of Ocean Science will commence. In light of these important milestones, a prime focus of the 13th Baltic Sea Science Congress 2021 will be to establish a platform for connecting scientists and decision makers.

Scientific justification:

The theme and topics for BSSC2021 is highly relevant for ICES as the Congress is expected to address most, if not all, of ICES Science priorities. BSSC2021 will cover topics such as pressures on the marine environment in the Baltic Sea and their impact on species and ecosystem dynamics e.g. observed as a trend, monitoring and techniques, assessments and management. BSSC2021 fits with the Science priorities and ICES mission to generate ecosystem and sustainability science that advances and shapes understanding of marine ecosystems and their interactions with society and climate, and which will advance ICES capacity to provide state-of-the-art advice for meeting conservation, management, and sustainability goals. The knowledge shared at BSSC2021 will also be highly relevant for the work in the regional convention HELCOM.

Resource requirements:

The major part of the costs for BSSC2021 will be covered by the participant registration fee. The convenors will also apply to ICES and other organizations with interest in the topics covered by the Congress for funding to support participation of early career scientists, a Young Scientist event, and to support keynote speakers.

Participants:	<p>Based on the attendance to the previous Congresses, the convenors expect 350 to 500 participants, mainly from the countries surrounding the Baltic Sea and with a small contingency from other countries.</p> <p>The target audience of the congress is scientists and young researchers working within the field of natural science in relation to the Baltic Sea region. The theme for BSSC2021 is “Understanding transitions in the Baltic Sea”, and a prime focus will be to establish a platform for connecting scientists and decision makers. Therefore, policy makers and stakeholders are also expected to participate in the Congress.</p>
Secretariat facilities:	<p>The convenors hold the secretariat facilities.</p> <p>A web page is in place (https://conferences.au.dk/bssc2021/).</p> <p>The ICES secretariat is, therefore, only asked to advertise for the 13th Congress.</p>
Financial:	<p>The convenors of BSSC2021 request ICES to contribute 10,000 euro to fund participation of early career scientists.</p>
Linkages to the Advisory Committee:	<p>BSSC2021 is highly relevant for the work of ICES Advisory Committee. The main theme for BSSC2021 is to establish a platform for connecting scientists and decision makers. During the Congress state-of-the-art scientific knowledge and understanding of marine ecosystems in the Baltic Sea will be presented. State-of-the-art knowledge and understanding of marine ecosystems are essential for state-of-the-art advices to decision-markers to meet goals related to conservation, management and sustainability goals.</p>
Linkages to other committees or groups:	<p>The Congress theme is related to several ICES steering groups such as ICES HAPISG, EPDSG, EOSG, and IEASG. Several of the members of the Scientific Committee are likely to be involved in ICES expert groups.</p>
Linkages to other organizations:	<p>The Congress is relevant for all organizations and management institutions that work with the marine environment in the Baltic Sea.</p>
Publication of proceedings	<p>The convenors do not intend to publish proceedings. After BSSC2021, a summary of the Congress will be published on the congress web page.</p>