PROGRESS REPORTS

Working Group II contribution to the Sixth Assessment Report

(Prepared by the Co-Chairs of Working Group II)

(Submitted by the Secretary of the IPCC)
PROGRESS REPORTS

Working Group II contribution to the Sixth Assessment Report

1. Summary

The following is a report on the activities of Working Group II during the IPCC Sixth Assessment Report cycle since the report prepared for the 52nd Session of the IPCC (IPCC-LII/INF.5).

Recent key activities and meetings for Working Group II, in chronological order, include:

- Third Lead Author Meeting for the Working Group II contribution to the IPCC Sixth Assessment Report, held in Faro, Portugal, 26 January – 1 February 2020;
- Organization of virtual ‘pre-SOD Activities’ in support of the Second Order Draft of the Working Group II contribution to the IPCC Sixth Assessment Report, August 2020;
- Completion of the Second Order Draft of the Working Group II contribution to the IPCC Sixth Assessment Report, November 2020;
- Participation in the first meeting of the UNFCCC Structured Expert Dialogue on the second periodic review of the long-term global goal, 26–27 November 2020;
- Participation in the UNFCCC Race to Zero and the SBSTA Ocean and Climate Change Dialogue, November-December, 2020;
- Expert and Government Review of the Second Order Draft of the Working Group II contribution to the IPCC Sixth Assessment Report, 4 December 2020 to 29 January 2021;
- IPCC-IPBES Co-Sponsored Workshop on Biodiversity and Climate Change, held virtually from 14 to 17 December 2020;
- Participation in the First Core Writing Team Meeting of the Synthesis Report for the IPCC Sixth Assessment Report, held virtually 25–29 January;
- Preparation of the Fourth Lead Author Meeting for the Working Group II contribution to the IPCC Sixth Assessment Report, to be held virtually in March 2021;
- Preparation of the ICOMOS-UNESCO-IPCC Co-Sponsored Meeting on Culture, Heritage, and Climate Change, to be held virtually in late 2021.

2. Activities in support of the Working Group II Sixth Assessment Report

Key activities completed or in preparation since the report prepared for the 52nd Session of the IPCC:

- In support of the preparation of the Second Order Draft of the Working Group II contribution of the IPCC Sixth Assessment Report, a series of online meetings were held, with the main activities held from 17 to 28 August 2020. These ‘pre-SOD Activities’ provided an opportunity for authors to meet virtually to discuss topics requiring additional cross-chapter coordination and to advance work on the Working Group II Global to Regional Atlas, Technical Summary and Summary for Policymakers. A meeting was also held on the development of a set of high-level Frequently Asked Questions for the Technical Summary, a new element in IPCC Technical Summaries.

The pre-SOD Activities were organized as online trainings, plenary sessions and breakout groups. The first plenary included an invited presentation by a psychiatrist on mental health self-care in response to challenges to the COVID-19 pandemic that were raised in a survey of authors. A follow up session for authors is being arranged for mid-September.

In advance of the pre-SOD Activities, and in an effort to increase information flow, the Working Group II Technical Support Unit expanded its Author Portal to include a user-friendly calendar and a dedicated event page for each online activity. The event pages included meeting
materials and collaboration boards (board.net). These online boards allow for collaborative input ahead of, during and after the online sessions. This new tool was well received by authors and increased the sharing of information across chapters. Presentations, notes and recordings were also made available as soon as possible after the calls.

More than 250 participants from over 50 countries attended the 20 virtual meetings organized. Topics of cross-Working Group relevance also included participation by Working Group I and Working Group III authors as well as members of the Bureau and Technical Support Units.

- On 6 November 2020, the Second Order Draft of the Working Group II contribution to the IPCC Sixth Assessment Report was submitted to the Working Group II Technical Support Unit for compilation ahead of the Expert and Government Review. It is recalled that the submission date for the Second Order Draft was originally scheduled for 10 July 2020 and has shifted due to the challenges arising from the COVID-19 pandemic.

- The Expert and Government Review of the Second Order Draft was held from 4 December 2020 to 29 January 2021. Registration of experts to participate in the review was held from 27 November 2020 to 22 January 2021. 2,901 experts registered to review the Second Order Draft. In addition to the second drafts of the 18 Chapters and 7 Cross-Chapter Papers, the first drafts of the Technical Summary, the Summary for Policymakers, and Annex I: Global to Regional Atlas were provided for review. It is recalled that the original review period scheduled from 7 August to 2 October 2020 was shifted due to the challenges arising from the COVID-19 pandemic.

During the review period, the Working Group II Technical Support Unit co-organized a number of webinars to inform groups of early career researchers and interested scientists about the work of the IPCC, the Working Group II contribution to the IPCC Sixth Assessment Report, the IPCC calibrated uncertainly language, and engaging with the IPCC as an Expert Reviewer. Webinars were co-organized with the Mountain Research Initiative – one of which was held in Spanish; the Association of Polar Early Career Scientists (APECS); the Africa Climate and Development Initiative and the Climate Risk Laboratory; and YOUNGO (Children and Youth constituency to the United Nations Framework Convention on Climate Change) Cities Working Group. An additional webinar was co-organized by the IPCC Secretariat with the Regional Environmental Centre for Central Asia (CAREC), with Russian translation. The webinars included participation and support from WGII Vice-Chairs, Authors, and members of the Technical Support Unit.

During the eight-week review period, 40,293 comments were submitted by 41 governments and 1168 experts from 89 countries.

- The IPCC-IPBES (International Science-Policy Platform on Biodiversity and Ecosystem Services) Co-Sponsored Workshop on Biodiversity and Climate Change, was held virtually from 14 to 17 December 2020. Over 50 experts participated in the virtual workshop to discuss biodiversity loss and climate change. A workshop report is currently being produced and is expected to be published in mid-2021. Additional information on the co-sponsored workshop, including the programme and participant list, is available from the IPCC and IPBES websites (e.g., [https://www.ipcc.ch/event/ipcc-ipbes-workshop/](https://www.ipcc.ch/event/ipcc-ipbes-workshop/)). Additional background information is available from the formal proposal (IPCC-LII/INF. 7).

The IPCC-IPBES Co-Sponsored Workshop on Biodiversity and Climate Change was coordinated through the IPBES Secretariat with support from the IPCC Working Group II Technical Support Unit. It is recalled that the workshop was originally scheduled for 12–14 May 2020 in London, at the kind invitation of the Government of the United Kingdom, with additional support from the Government of Norway, and was postponed and moved to a virtual meeting due to the COVID-19 pandemic. The meeting report has been sent out for internal review and will after that be sent out for peer review. Outreach envisioned upon release of the report is currently under discussion.
In March 2020 a revised proposal for an IPCC co-sponsored meeting on cultural heritage and climate change, to be organized by the International Council on Monuments and Sites (ICOMOS) and the United Nations Educational, Scientific and Cultural Organization (UNESCO) was submitted to the IPCC Secretariat. The proposal was reviewed and agreed by the IPCC Working Group Co-Chairs and considered and endorsed by the Executive Committee at its 80th Meeting.

A Scientific Steering Committee for the co-sponsored meeting has been formed and includes four members from the Working Group I and Working Group II Bureau (Gregory Flato, Valérie Masson-Delmotte, Hans-Otto Pörtner, Debra Roberts). The Scientific Steering Committee is being Co-Chaired by the three partner organizations and has met twice. A process to receive suggestions for expert participants from the three co-sponsoring organizations is currently being defined. Invitations to the experts selected for participation by the Scientific Steering Committee are anticipated for the second quarter of 2021. The organization of the co-sponsored meeting is being coordinated through the ICOMOS Secretariat with support from the IPCC Working Group II Technical Support Unit. The ICOMOS-UNESCO-IPCC Co-Sponsored Meeting on Culture, Heritage and Climate Change is being planned as a virtual meeting to be held in late 2021. The meeting will meet all the requirements of co-sponsorship as given in Section 7.2 of Appendix A to the Principles Governing IPCC Work.

3. Meetings in support of the Working Group II Sixth Assessment Report

Key meetings completed or in preparation since the report prepared for the 52nd Session of the IPCC:

- The Working Group II Third Lead Author Meeting was held at the University of the Algarve in Faro, Portugal from 26 January to 1 February 2020. The kind invitation from the Government of Portugal to host this meeting and the support provided by the Center of Marine Sciences are gratefully acknowledged.

The Third Lead Author Meeting was a key milestone in the development of the Working Group II contribution to the Sixth Assessment Report. The comments received during the Expert Review of the First Order Draft were considered by the author teams and work began on the Second Order Draft. This third meeting also included the Review Editors for the first time.

Ahead of the Third Lead Author Meeting a series of WGII Vice-Chair and TSU coordinated webinars were held on the topics of adaptation and detection and attribution. These were well attended across chapter teams. During the meeting, WGII Vice-Chairs provided dedicated chapter trainings on topics ranging from use of uncertainty language to detection and attribution. The Third Lead Author Meeting included dedicated days to focus on the development of the Cross-Chapter Papers as well as on the development of the Technical Summary and the Summary for Policymakers. The meeting also included a focus on the Working Group II and Working Group III linkages, including a dedicated satellite meeting on Climate Resilient Development Pathways and Shared Socioeconomic Pathways. A number of Authors, Bureau and TSU Members from Working Group I and Working Group III as well as a Task Group on Data Support for Climate Change Assessments (TG-Data) Co-Chair participated in the Third Lead Author Meeting in support of the cross-Working Group handshakes, with a number of further linkages across the reports established.

Following on the positive experience of previous Lead Author Meetings, a number of activities were organized to support communications. Prior to the Opening Ceremony, a Media Briefing was held to provide the local and national media with background information on the IPCC, the role of Working Group II, the Sixth Assessment cycle, and the purpose of the meeting. The Third Lead Author Meeting drew an unprecedented level of local and national media interest for a Lead Author Meeting, with over 130 coverages, including participation by the IPCC Vice-Chair, Thelma Krug, and several authors in a 90-minute primetime national news programme. In addition, a dedicated outreach event was coordinated with the Center of Marine Sciences and
the University of the Algarve. The well-attended event provided an opportunity to engage with students and early career scientists.

This meeting offered another important innovation. Working with the local host organization, the Working Group II Third Lead Author Meeting was able to offer free childcare during the week-long event. This was particularly well-received by the authors and Bureau Members attending the meeting. Childcare is being pursued for the Fourth Lead Author Meeting.

- The Working Group II Fourth Lead Author Meeting was originally scheduled for 1–7 November 2020, in Guatemala, at the kind invitation of the Government of Guatemala. The meeting was postponed to 1–7 March 2021 in response to the challenges arising from the COVID-19 pandemic. Given the continuing challenge from the pandemic, the Fourth Lead Author Meeting will be held virtually over two weeks from 1–5 and 8–12 March. A virtual media briefing and an online outreach event are being co-organized with Guatemala.

During the Fourth Lead Author Meeting, the comments received during the Expert and Government Review of the Second Order Draft will be considered by the author teams and work will begin on the Final Draft, with dedicated time to support cross-chapter coordination as well as the Technical Summary and Summary for Policymakers.

4. Cross-Working Group Collaboration
   - The cross-Working Group collaboration with members of the Bureau, Authors, and Technical Support Units has continued. The outcomes have included the preparation of guidance materials for authors, the establishment of discussion groups, and the drafting of potential cross-Working Group boxes. The move to virtual meetings due to the COVID-19 pandemic has subsequently resulted in increased cross-Working Group participation in online meetings. The strong cross-Working Group commitment and engagement have progressed the cross-Working Group handshakes and continue to improve the consistency across Working Groups.

   - The Working Group II authors selected for the Synthesis Report Core Writing Team as well as members of the Working Group II Bureau and Technical Support Unit participated in the First Core Writing Team Meeting of the Synthesis Report to the IPCC Sixth Assessment Report from 25 to 29 January 2021. The outcomes of the intensive week are contained in IPCC-LIII(bis)/INF. 3.

5. Changes to the Working Group II Sixth Assessment Report timeline in response to COVID-19
   - In April 2020, in response to the challenges resulting from the COVID-19 pandemic, the Working Group II Bureau and the IPCC Executive Committee agreed a 4-month shift of the timeline for the delivery of the Second Order Draft of the Working Group II contribution to the IPCC Sixth Assessment Report. While it was noted that the changes to the Working Group II timeline implies a corresponding 4-month shift to the subsequent Working Group II milestones, the uncertainty in current events and the need for a harmonized Sixth Assessment Report cycle developed across the IPCC requires additional consideration and discussion to inform a proposal on the remaining Working Group II timeline.

   The COVID-19 pandemic continues to significantly impact the Working Group II authors, Bureau, and Technical Support Unit. Many continue to face considerable challenges, including closure or limited access to normal places of work, additional child/dependent care, shifts in teaching responsibilities to online, internet access limitations, and variable, and often increased, workloads from the transitions to home office. Many are also contributing to local or national response efforts to COVID pandemic and the challenges it brings. The 4-month shift of the Working Group II timeline so far, has allowed the authors to ensure the scientific quality of the Second Order Draft.
The Working Group II Technical Support Unit has worked closely with the Secretariat and the Technical Support Units of Working Group I, Working Group III, the Synthesis Report, and the Task Force on Inventories in the preparation of a revised Strategic Planning Schedule. The timeline for the Working Group II contribution of the IPCC Sixth Assessment Report presented in IPCC-LIII(bis)/Doc.4 has been informed by input from the Coordinating Lead Authors, Lead Authors, Review Editors, the Working Group II Bureau, and the IPCC Executive Committee. The document includes a preliminary timeline for the delivery of the Final Draft of the Working Group II contribution to the IPCC Sixth Assessment Report, adopting the current 4-month shift in the cut-off date for accepted papers, the Final Government Distribution and Government Review of the Summary for Policymakers, and the Working Group II Session to approve the Summary for Policymakers and accept the Report.