AGENDA FOR THE 9TH MEETING OF THE
WORKING GROUP ON WATER MANAGEMENT IN WATER
STRESSED REGIONS (WG-DROUGHT)
10 November 2016: 09:00-10:30 hours (Session-I)
10 November 2016: 11:00-12:30 hours (Session-II)
Chiang Mai, Thailand
Strategy Theme: Basin
Presented by the Chairman

Year of Establishment: 2008
Completion of the Mandate: 2016

Mandate:

(i) Drought Management Strategies: To capture field experiences of the implementation of drought risk
management strategies.

(ii) Coping with water scarcity: (a) Computations based on climate data as a tool to be used in coping with
water scarcity; (b) Approaches and strategies for incorporating economic justification when deciding on
the amount of water to be allocated for agricultural production; (c) Design, operation and maintenance
of sand dams – Under-ground water reservoirs; and

(iii) Rainfall management for sustainable agriculture: Innovation and implementation of smart rainfall
management technologies.

Website: http://www.icid.org/wg_drought.html

WG-DROUGHT Agenda Item 1: Action taken report by Chair

1. During the last International Executive Council (IEC) all the workbodies were requested to make use of the
video conferencing facilities now being made available by the Central Office which enables monitoring of the
actions taken on the decision of the WG. A virtual meeting through video conference also provides opportunity of
participating in the activities of the WG for those members of the WG who are unable to attend the meeting
physically and to continue their membership. WG may please take note. The Chair will present report on the
actions taken on the decisions and proposals of the working group at its last meeting held at Montpellier.

WG-DROUGHT Agenda Item 2: ICID Action Plan 2030: Activities on Drought

2. The 66th International Executive Council (IEC), vide Resolution IEC-4/66 has approved the new Vision,
Mission and six Organizational goals of ICID. In order to develop action plan, the Consultative Group (CG)
requested inputs from ICID Work Bodies in the prescribed format in May 2016 to identify actions to achieve the
Organizational Goals in their area of activities which would form part of ICID Action Plan for Vision 2030.

3. Since no response was received from the WG, the Central Office has prepared a draft action plan of the
group (Annex 1) in consultation with the WG Chair. The group will discuss the draft action plan and finalize it
during the Chiang Mai meeting and provide its input to PCTA. The updated action plan incorporating all the
comments will be submitted to the CG for incorporation in the ICID Action Plan for Vision 2030. WG Chair will
provide further updates at the meeting.

WG-DROUGHT Agenda Item 3: Presentations by Theme Leaders and other members

4. Presentations made during the WG meeting in Montpellier (France) by Prof. Chang-Chi Cheng (Chinese
Taipei), and Mr. Maurice Roos (USA) have been uploaded on the webpage of the working group which can be
accessed at http://www.icid.org/wg_drought.html. Members are encouraged to share their knowledge and
experience related to mandate of the WG through presentations during the WG meeting.

WG-DROUGHT Agenda Item 4: Publications of the Working Group

WG-DROUGHT Agenda Item 4.1: Technical Report of the WG-DROUGHT

5. At the Montpellier meeting, the WG agreed to set up a small working group consisting of the three team
leaders and the Chairman of the Group to complete the technical report of the Group. The Chairman of the WG
was requested to finalise the technical report so that it can be circulated amongst the members of the WG for their
comments/suggestions, if any. In response, the Chairman of the WG has informed that he would submit the
technical report prior to the next meeting of the Working Group. WG Chair will apprise members on the latest status of finalisation of the report.

6. The WG-IADWS publication titled ‘Irrigation under Drought and Water Scarcity’ is in its final stage of finalisation. The final draft document of this publication would be submitted to the members prior to the WG meeting. Members may review the document and provide their suggestions, if any before it is published for wider dissemination.

WG-DROUGHT Agenda Item 4.2: Publication on Design Guidelines for Flood Based Farming Systems

7. At the Gwangju (2014) meeting, WG had endorsed to bring out publication in 2015 on ‘Design Guidelines for Flood Based Farming Systems’ by Dr. Abraham Mehrari Haile (The Netherlands) under the auspices of the WG for which funding had already been arranged. Since Dr. Haile was not present in the WG meeting at Montpellier in 2015, ICID Central Office requested him to send the the finalised publication so that the same can be shared with the members of the WG for their comments/suggestions, if any. Dr Haile / WG Chair may apprise members on the progress. Dr. Haile may make presentation on publication for the benefit of the members.

WG-DROUGHT Agenda Item 5: Updating Multilingual Technical Dictionary (MTD)

8. At the 65th IEC, it was decided that ICID Central Office will bring out an online version of the MTD and make it available through ICID website. In this connection, Central Office is collecting the terms available with different NC in their respective languages, based on 2010 version of MTD. During Montpellier meeting in October 2015, the Permanent Committee for Technical Activities (PCTA), considering this an important input for working towards SDGs, recommended setting up of new workbody to review/ update the existing MTD. Accordingly, a Task Force on MTD has been proposed to be set up with WG Chair/ nominee as members along with members from various experts international organizations (Refer PCTA Agenda Item 4, page 82).

9. Since PCTA would require a feedback from each of the WGs as to how they plan to review / update the terms that fall within their respective scope of activities, the group will discuss this issue and nominate a suitable expert as a nodal person for reviewing the terms related to the activities of the group. To achieve this goal, it is proposed that WG undertake the review of the concerned terms depending on their domain of expertise suggesting changes / modification and addition of new terms, along with contributing pictures, links and videos related to respective term.

WG-DROUGHT Agenda Item 6: Closure report and Scoping Document for reconstitution of the WG

10. PCTA in its meeting at Montpellier extended the term of the WG by one year till 2016 and requested WG to develop a scoping document for a WG with new mandate. As WG will be completing its extended mandate in 2016, the WG Chair was requested to prepare closure report of the WG giving brief description of how its intended objectives and mandate have been achieved, including concusion & recommendations and way forward. In this connection broad outline of contents of the closure report was also shared by ICID Central Office. In response, WG Chair sent the Closure report of the WG to the ICID CO which have been circulated to the members of the group for their comments/suggestions, if any. WG chair will present and discuss closure report of the WG during meeting. Finalised closure report would be shared with ICID CO for its record and uploading on WG web site.

11. As suggested by PCTA in its meeting at Montpellier, WG chair developed a scoping document for a new WG with revised mandate (Annex 2). Draft scoping document of the WG has been circulated to all mebers of the WG for their comments/suggestion, if any. The WG Members may discuss and finalise draft scoping document in the meeting of the WG and recommend to PCTA/IEC for approval.

SUPP.: VPH Dr. Ragab (UK) and Dr. Hakan Aksu (Turkey) shared their suggestion/views on the activities of the WGs for consideration and suitably incorporating in the Scoping Document (SD). Dr Ragab suggested that following can be considered for inclusion in the mandate and action plan of the WG: (1) Management of blue, green and non-conventional water during drought periods; (2) Drought indicators and drought severity level; (3) Changing to drought tolerant crops (e.g. quinoa, amaranth, etc.), deep rooted crops, etc.; (4) Short and long term management; (5) Early waning systems; (6) Economical impact of drought; and (7) Society response and adaptability to drought. While Dr. Aksu informed that he would make a small contribution of the Scoping Document of the group based on activities of World Meteorological Organisation (WMO) related to drought which is available at http://www.droughtmanagement.info/.

WG-DROUGHT Agenda Item 7: Dissemination of activities of WG – Website of the Group

12. Members are requested for their active participation in the activities of the WG and facilitate exchange of information, knowledge and experience, as well as networking on the topic in order to keep themselves up-to-date with new developments in the various aspect of drought and drought monitoring. Members are also requested to provide information, papers, presentation made on topics related to scope of work of the WG to the ICID Central
Office for uploading on the web site of the WG. Members will discuss and evolve methodology for sharing of information and updation of WG website. In order to ensure regular contribution of the members, WG is encouraged to make full use of Web-Ex platform for virtual meetings in between face to face meeting during IEC

**WG-DROUGHT Agenda Item 8: Review of membership of the working group**

13. In order to increase the efficiency and functioning of the Working Group during annual face to face meeting and avoid spending a lot of time on administrative matters, it was decided by the Management Board (MB) that the admission of new members or discontinuation of the membership of the group will be dealt by Chairman in consultation with Vice Chair, Secretary and ICID Central Office prior to the meeting itself through emails/web conference.

14. The Chinese National Committee on Irrigation and Drainage (CNCID) has nominated Ms. Jianxin Mu (China) for the membership of the group. The existing membership of the WG and new nomination is given at Annex 3 (see the electronic version for the latest list). Any new nominations for the membership received during the meeting will be dealt suitably after the meeting.

**WG-DROUGHT Agenda Item 9: Any other business**

**SUPP: Webinar/ web-based seminar**

Webinar/ web-based seminars are organized on web platform using video conferencing. This platform is used to organize workshop, seminar, presentations, etc. Many international organizations are using this platform to disseminate their knowledge. In order to share vast expertise available with ICID fraternity with Members of the NCs, it is proposed to organized on average about 2 webinars per month with the support of WG experts. WG will discuss and suggest 5-6 topics, based on the mandate of the WG, on which webinar can be considered along with name of the relevant experts who could be contacted to develop webinars.

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**NOTES FOR CHAIRPERSON:**

1. Draft minutes of this meeting to be submitted to ICID Secretariat at Chiang Mai (Thailand) after the meeting.
2. Chair to participate and present the WG report to PCTA meeting on 11 November 2016.
<table>
<thead>
<tr>
<th>Name of the Chairman and members filling this questionnaire:</th>
<th>VPH Franklin E. Dimick (USA), Mr. Mohammad Sadegh Jafari (Iran), Vice-Chairman and Mr. V.C. Ballard (Australia), Secretary</th>
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</thead>
<tbody>
<tr>
<td>Date: .................................................................................</td>
<td>Outcomes / Outputs</td>
</tr>
<tr>
<td>Goal 1: Enable higher crop productivity with less water and energy</td>
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<tr>
<td>WG Activity 1.1</td>
<td>Milestone 1</td>
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<td>WG Activity 1.2</td>
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<td>Goal 2: Be a catalyst for change in policies and practices</td>
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<tr>
<td>2.1 Develop Guidelines on Drought Risk Management Strategies</td>
<td>Guidelines</td>
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<td>2.2 Technical Report of the WG</td>
<td>Report</td>
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<td>2.3 Design guidelines for flood based farming system</td>
<td>Finalisation of the guidelines</td>
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<tr>
<td>Goal 3: Facilitate exchange of information, knowledge and technology</td>
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<tr>
<td>Organise internal/international Workshop</td>
<td>Proceedings of the workshop</td>
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<td>WG Activity 3.2</td>
<td>Milestone 1</td>
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<tr>
<td>Goal</td>
<td>WG Activity</td>
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<td>WG Activity 3.3</td>
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<td>WG Activity 4.1</td>
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<td>4.2</td>
<td>WG Activity 4.2</td>
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<td>4.3</td>
<td>WG Activity 4.3</td>
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<tr>
<td>5.1</td>
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<td>6.2</td>
<td>WG Activity 6.2</td>
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WORKING GROUP ON ADAPTIVE MANAGEMENT FOR PERMANENT WATER SCARCITY (WG-AMPWS)

DRAFT SCOPING DOCUMENT

1. Introduction

1.1 Historically, the use of water for agricultural purposes was generally recognized as a priority. However, as the population and demographics of an area has changed over time, so has the priority for the use of water? In many areas, use of water for agricultural purposes has become of secondary importance to other uses. Demand for Municipal and Industrial water for growing population centers and the demand for clean drinking water in rural areas have taken precedence over agricultural uses. The growth of the environmental movement throughout the world to protect fish and wildlife has placed an additional demand on the limited supplies of water. In many areas of the world this environmental demand has been given priority over the use of water for agricultural purposes. This change of use priority is expected to continue in the future.

1.2 The effects of climate change in many areas of the world has also created a permanent shortage of water for agricultural purposes as dwindling water supplies are used first to supply adequate drinking water supplies to the growing population. Climate change is also changing the timing of when water is available. Areas that depended on melting snow in warmer months are now getting rainfall instead of snow. The reverse is also true. Areas that historically depended on rainfall are now getting snow.

1.3 These changes in the prioritization of the limited water resource are causing agricultural water users to make adaptive management changes to the way they approach the collection, diversion and use of the limited water supply available to them. These adaptive management changes are crucial in efforts to assure sustainable food production.

2. Objectives

2.1 Relevance of the Working Group

2.1.1 The relevance of the WG can be specified as follows:

(a) The topic of Adaptive Management for Permanent Water Scarcity is relevant to the vision and mission of ICID and of interest for its members in all countries;

(b) The WG is expected to contribute to effective implementation of the Strategy Theme Basin and to other strategy themes for that matter;

(c) It may be expected that in the future the need for adaptive management will continue to increase.

2.2 Relevance of the Working Group to the scope of the Thematic Area

2.2.1 For the relevance of the WG to the scope of the Thematic Area the same argumentation is applicable as shown under the relevance. Most of the activities in irrigation will be related to the manner in which water is managed and how well management schemes adapt to the changes in water priorities. This concerns the technical, institutional and environmental aspects.

2.3 Existing gap that the Working Group is expected to fill

2.3.1 Other ICID WGs or Task Forces (TF) that have a related scope of work are: WG-SDTA, WG-CAFM, WG-CLIMATE, WG-M&R, WG-SON-FARM and the new WG-IOA

2.3.2 While WG-IOA is proposed to study the management of irrigation systems, it will focus on the administrative aspects of water management. The WG-AMFWS will focus on the water supply changes that these management entities need to address. Therefore, the two Working Groups will be able to work closely together and complement each other.

2.3.3 The new WG has taken good note of the activities of these Workbodies when preparing this Scoping Document.
3. **State of knowledge on the topic**

3.1 Other International Organizations that are working on the subject

3.1.1 There are several other International Organizations that have programs and activities on this topic. This especially concerns the:

(a) Food and Agriculture Organization of the United Nations (FAO);
(b) International Water Management Institute (IWMI)
(c) International Center for Agriculture Research in Dry Areas (ICARDA);
(d) International Fund for Agricultural Development (IFAD);
(e) International Commission on Large Dams (ICOLD);
(f) World Bank (WB);
(g) World Water Council (WWC);

3.2 Mandate of the Working Group

3.2.1 Mandate of the Working Group is based on the specific niche that this WG can fill in this area and can be formulated as follows:

(a) Collect information, knowledge and, where available, case histories on actions taken to adapt management of water systems to accommodate a change in priority of water use or permanent water scarcity.
(b) Information will be collected on three levels of water management; 1) National, 2) area or basin, and 3) local;
(c) review and analyze information to determine any commonality;
(d) prepare and present reports and/or case studies on recent development in the countries that are represented in the WG;
(e) organize international workshop on the topic;
(f) prepare an overview paper on the state of the art on the topic for publication.

3.3 How is the Working Group expected to collaborate with the other International Organizations?

3.3.1 International Organizations can contribute to the activities of the WG by nominating Permanent Observers (PO). On the other hand presentations of the work and achievements of the WG can be presented at the occasion of events organized by International Organizations.

4. **Work Plan**

4.1 Scope

4.1.1 The WG is expected to investigate, analyze, and disseminate information on adaptive management processes and to formulate recommendations with respect to:

(a) planning and preparation for reduced water supplies due to changing priorities for the use of a finite water supply;
(b) commonality in processes used by various entities at three separate levels of governance;
   - National
   - area or basin
   - local
(c) developing and recommending adaptive management strategies that could be used in a general setting;

4.1.2 A proposal for the three year rolling plan is shown in Appendix A.
4.2 Target audience

4.2.1 The target audience for this working group will be managers of irrigation schemes, researchers, consultants, manufacturers, government officials, farmer’s representatives and staff of International Organizations working on the topic.

4.3 Outputs

4.3.1 The following outputs can be expected from this WG:

(a) although it is an indirect output sharing of knowledge and experience by representatives of NCs, which will also enable them to disseminate this knowledge within their country;

(b) the WG is expected to organize a workshop at occasion of an international ICID meeting;

(c) publish an overview paper on adaptive management of water in permanent shortage areas with recommendations for implementation.

4.4 Timelines

4.4.1 It is recommended that the initial term of this WG will be set at 5 years. The timeline would have to be based on the scope of work and the expected output. Details of the timeline would have to be formulated and refined during the inaugural meeting of the WG.

4.5 Collaborators and dissemination strategy

4.5.1 The WG would have to base its activities on an open attitude with a clear scope for invitation of outsiders that are interested in the topic on a Permanent Observer (PO), or ad hoc basis.

4.5.2 The dissemination strategy would have to be based of reaching those who can apply the findings and recommendations of the WG in their research and especially in policy development, decision making and implementation in practice.

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## THREE YEAR ROLLING PLAN

<table>
<thead>
<tr>
<th>Item of Mandate</th>
<th>2016</th>
<th>2017</th>
<th>2018</th>
<th>2019</th>
<th>Actor(s)</th>
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<tr>
<td>Scoping document to PCTA</td>
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<td></td>
<td>Convenor</td>
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<tr>
<td>Comments on Scoping document from PCTA and informal meeting</td>
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<td>✅</td>
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<td></td>
<td>Participants informal meeting</td>
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<tr>
<td>Finalizing Scoping Document and detailing of Workplan</td>
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<td>Convenor</td>
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<tr>
<td>Invitation to NC for nominations and information</td>
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<td>Central Office</td>
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<td>Submission of nominations and information</td>
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<td>National Committees</td>
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<tr>
<td>1st Meeting Mexico City</td>
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<td>Members and Permanent Observers</td>
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<tr>
<td>Exchange of information, knowledge, experience, networking</td>
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<td>Members and Permanent Observers</td>
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<tr>
<td>Solicit information and case histories of adaptive management processes</td>
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<tr>
<td>Preparation and presentation of reports and/or case studies</td>
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<td></td>
<td>Members and Permanent Observers</td>
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<td>Organize international workshop</td>
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<td>Some Members</td>
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<td>3rd Meeting including Workshop</td>
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<td>Members and Permanent Observers</td>
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### (A) Membership of Working Group on Water Management in Water Stressed Regions (WG-DROUGHT)

<table>
<thead>
<tr>
<th>Sl. No.</th>
<th>Members</th>
<th>Member from</th>
<th>2014</th>
<th>2015</th>
<th>Remarks</th>
</tr>
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<tbody>
<tr>
<td>1.</td>
<td>VPH Franklin E. Dimick, Chairman, 2009 (USA)</td>
<td>2008</td>
<td>•</td>
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<tr>
<td>2.</td>
<td>Mr. Mohammad Sadegh Jafari, Vice-Chairman, 2009 (Iran)</td>
<td>2008</td>
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<td>3.</td>
<td>Mr. V.C. Ballard (Australia)</td>
<td>2012</td>
<td>•</td>
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<td>4.</td>
<td>Vice President Hon. Dr. Ragab Ragab (UK)</td>
<td>2008</td>
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<td>5.</td>
<td>Dr. Graziano Ghinassi (Italy)</td>
<td>2008</td>
<td>-</td>
<td>•</td>
<td>Continue as member</td>
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<td>6.</td>
<td>Prof. Chang-Chi Cheng (Chinese Taipei)</td>
<td>2008</td>
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<td>7.</td>
<td>Dr. Takanori Nagano (Japan)</td>
<td>2011</td>
<td>•</td>
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<td>8.</td>
<td>Dr. Gurhan Demir (Turkey)</td>
<td>2012</td>
<td>-</td>
<td>-</td>
<td>No contribution in 2014 and 2015. Recommended for discontinuation</td>
</tr>
<tr>
<td>9.</td>
<td>Dr. Hakan Aksu (Turkey) as Young Professional</td>
<td>2012</td>
<td>-</td>
<td>#</td>
<td>Contribution in 2015</td>
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<tr>
<td>10.</td>
<td>Mr. Sudhakar (Direct Member), JISL</td>
<td>2015</td>
<td>-</td>
<td>-</td>
<td>Accepted as Provisional Member</td>
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<tr>
<td>11.</td>
<td>Secretary General, ICID</td>
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### (B) New nomination received from the National Committee

<table>
<thead>
<tr>
<th>Sl. No</th>
<th>Name</th>
<th>Country</th>
<th>Remarks</th>
</tr>
</thead>
<tbody>
<tr>
<td>01.</td>
<td>Ms. Jianxin Mu</td>
<td>China</td>
<td>Recommended, subject to her presence or else provisional member</td>
</tr>
</tbody>
</table>

* # Through representation