



# NATIONAL CAPACITY DEVELOPMENT PRIORITIES IDENTIFIED BY MEMBERS OF THE INTERNATIONAL SEABED AUTHORITY IN 2020

## Background and rationale

The duty of the International Seabed Authority (ISA) to design and implement mechanisms to *build capacity for developing States*, in accordance with its mandate under the United Nations Convention on the Law of the Sea (UNCLOS), is recognized in the Strategic Plan of ISA for the period 2019–2023 (ISBA/24/A/10, annex). Such mechanisms should aim not only at promoting and encouraging the transfer of technology to developing States<sup>1</sup> but also at ensuring the expansion of opportunities for participation in activities in the Area.<sup>2</sup>

Members of ISA have identified that one of the key challenges for ISA lies in the development of mechanisms, including capacity-building

programmes, that ensure the fully integrated participation of developing States in activities in the Area at all levels. Strategic direction 5 (Build capacity for developing States) and strategic direction 6 (*Ensure fully integrated participation by developing States*) are aimed at accomplishing this objective. As indicated in the High-Level Action Plan of ISA for the period 2019–2023 relating to the implementation of the Strategic Plan (ISBA/25/A/15, annex II, and ISBA/25/A/15/Corr.1), specific actions had to be undertaken by the Secretariat by 2020. One of those was to assist developing States, in particular geographically disadvantaged States, least developed countries (LDCs), landlocked developing countries (LLDCs) and small island developing States (SIDS), in identifying their needs (high-level action 5.1.1).

### Strategic direction 5 - Build capacity for developing States

**5.1.** Ensure that all capacity-building programmes and measures and their delivery are meaningful, tangible, efficient, effective and targeted at the needs of developing States, as identified by developing States.

**5.2.** Seek and maximize funding opportunities for the Endowment Fund for Marine Scientific Research in the Area and its beneficiaries, together with participation in global financing mechanisms.

**5.3.** Enable capacity-building measures to be mainstreamed into relevant initiatives.

**5.4.** Build on the achievements of contractor training programmes and assess their long-term impact on capacity-building

**High-level action 5.1.1.** Assist developing States, in particular geographically disadvantaged States, small island developing States, least developed countries and landlocked developing countries, in identifying their needs

### Strategic direction 6 - Ensure fully integrated participation by developing States

**6.1.** Continue to promote and seek opportunities for fully integrated participation by developing States in the implementation of the regime for the Area, paying special attention to the needs of land -locked and geographically disadvantaged States, small island developing States and the least developed countries.

**6.2.** Undertake a review of the extent of the participation by developing States in the Area, identify and understand any specific barriers to such participation and address them accordingly, including through targeted outreach and partnerships.

**6.3.** In cooperation with States parties, initiate and promote measures providing opportunities to personnel from developing States for training in marine science and technology and for their full participation in activities in the Area (Convention, art. 144 (2) (b)).

**6.4.** Carry out a detailed resource assessment of the reserved areas that are available to the Enterprise and developing States.

**6.5.** Identify possible approaches to the independent operation of the Enterprise in a way that meets the objectives of the Convention and the 1994 Agreement while taking into account that the Enterprise lacks capital and is limited to operating through joint ventures.

<sup>1</sup> UNCLOS, art.144, 273 and 274.

<sup>2</sup> Ibid, art.148.

To deliver against this objective, the Secretariat convened a workshop on capacity development, resources and needs assessment in Kingston in February 2020. Participants included representatives of members<sup>3</sup> and observers<sup>4</sup> of ISA, experts from international, regional and national organizations,<sup>5</sup> as well as contractors<sup>6</sup> and national experts.<sup>7</sup> The report of the workshop is available on ISA's website,<sup>8</sup> and a summary of the outcomes has been provided to the ISA Assembly (ISBA/26/A/12).

Pursuant to high-level action 5.1.3 (*Undertake regular assessment of the effectiveness and relevance of capacity-building programmes and initiatives implemented by the Authority*), and as an input to the workshop, the Secretariat, with the assistance of consultants,<sup>9</sup> had prepared a comprehensive review of all capacity-building programmes and initiatives implemented by ISA between 1994 and 2019.<sup>10</sup> Both the

review and the workshop were informed by an advisory committee established by the Secretary-General to provide expert input and strategic advice to the Secretariat. The draft of the review was further revised in the light of comments from the advisory committee, the training subgroup of the Legal and Technical Commission, participants in the workshop and input received from Colombia, Cuba, Norway, Peru and the Philippines during a public consultation held between April and June 2020. In addition, the Secretariat conducted a survey with all members of ISA between April and June 2020 in which they were invited to identify their priority capacity development needs relating to the role and mandate given to ISA under UNCLOS.

This briefing paper outlines the key results of the survey.

**Table 1: Members of the advisory committee established by ISA to inform the review and the organization of the workshop on capacity development, resources and needs assessment**

	Name	Role
1	Mr. Solomon Korbieh	Minister Counsellor, Permanent Mission of Ghana to the United Nations
2	H.E. Mr. Carlos den Hartog	Ambassador, Permanent Representative of Brazil to the ISA
3	H.E. Tevita Suka Mangisi	Ambassador of the Kingdom of Tonga to Japan
4	Mr. Andreas Kravik	International Law Adviser of the Law of the Sea, Ministry of Foreign Affairs, Norway
5	Mr. Tidiani Couma	Secrétaire des Relations Extérieures, Monaco
6	Mr. Miko Maekawa	Sasakawa-Foundation
7	Mrs. Michelle Walker	Deputy Permanent Representative of Jamaica to ISA, Chair of the Legal and Technical Commission

<sup>3</sup> Algeria, Argentina, Brazil, Chile, China, Cook Islands, Costa Rica, Ecuador, Egypt, European Union, Ghana, Guatemala, Indonesia, Jamaica, Republic of Korea, Mexico, Myanmar, Nauru, Nigeria, Sierra Leone, South Africa, Tonga, Trinidad and Tobago and Uganda.

<sup>4</sup> Ethiopia, Centre for Borders Research of Durham University, Interridge and Pew Charitable Trusts.

<sup>5</sup> African Union; Commonwealth; Department of Economic and Social Affairs; Intergovernmental Oceanographic Commission of the United Nations Educational, Scientific and Cultural Organization (UNESCO); National Deep Sea Centre (Joint Training and Research Centre); National Oceanography Centre; Office of the High Representative for the Least Developed Countries, Landlocked Developing Countries and Small Island Developing States; Technology Bank for the Least Developed Countries; United Nations Environment Programme; UNESCO; United Nations Children's Fund; and World Maritime University.

<sup>6</sup> China Ocean Mineral Resources Research and Development Association; Deep Ocean Resources Development Company Limited; Federal Institute for Geosciences and Natural Resources; Global Sea Mineral Resources NV; Japan Oil, Gas and Metals National Corporation; Nauru Ocean Resources Incorporated; Tonga Offshore Mining Limited; and UK Seabed Resources Limited.

<sup>7</sup> From Ghana, India, Kiribati and Togo.

<sup>8</sup> See [www.isa.org.jm/node/19637](http://www.isa.org.jm/node/19637).

<sup>9</sup> The consultants were Rahul Sharma, former Chief Scientist of the National Institute of Oceanography (India), and Tearinaki Tanielu, Director of the Multilateral Affairs Division of the Ministry of Foreign Affairs and Immigration of Kiribati.

<sup>10</sup> Available at <https://isa.org.jm/files/files/documents/CD%20assessment%20report.pdf>

	Name	Role
8	Mr. Se-Jong Ju	Republic of Korea, member of the Legal and Technical Commission
9	H.E. Fekita Utoikamanu	High Representative for the Least Developed Countries, Landlocked Developing Countries & Small Developing States - UN-OHRLLS
10	Mr. Ronan Long	Director, WMU-Sasakawa Global Ocean Institute and Nippon Foundation Professorial Chair
11	Mr. Jérôme Dymont	InterRidge
12	Mr. Corey McLachlan	Head of Stakeholder Engagement, DeepGreen
13	Mr. Liu Feng	Secretary-General, COMRA
14	Mrs. Biliانا Cicin-Sain	Professor, Global Ocean Forum
15	Mr. Michael W. Lodge	Secretary-General, ISA
16	Dr. Marie Bourrel-McKinnon	Senior Policy Officer - Special Assistant to the Secretary-General, ISA
17	Mr. Chapi Mwango	Chief, Contract Management Unit, ISA
18	Mrs. Charlotte Salpin	Senior Legal Officer, ISA
19	Ms. Kayon Wray	Interim Senior Training Assistant, ISA
20	Mr. Tearinaki Tanielu	Consultant, ISA
21	Mr. Ryan Barbar	Staff Assistant, ISA



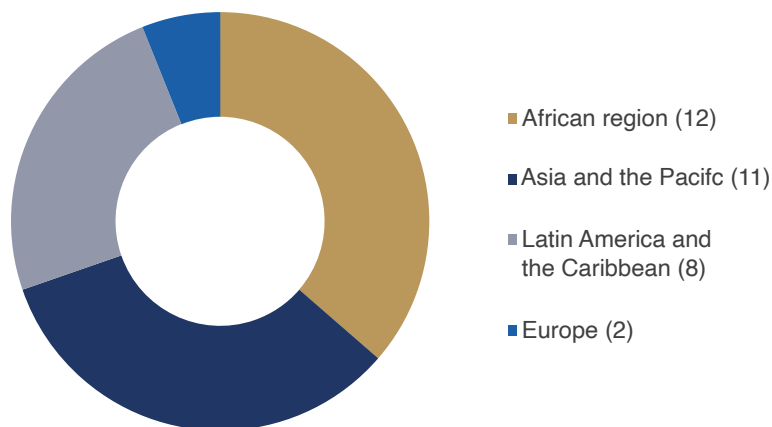
More than 80 representatives met in Kingston in February 2020 to discuss capacity development, resources and needs assessment

## Identification of national capacity development priorities by ISA members

In April 2020, in line with the High-Level Action Plan and the outcomes of the workshop on capacity development, resources and needs assessment, the Secretariat conducted a survey to allow the members of ISA, and in particular developing States, to identify their priority

capacity-building and capacity development needs as they relate to the role and mandate given to ISA under UNCLOS and the 1994 Agreement. A total of 47 responses were received from 33 countries. The largest number of responses received were from the African region (12),<sup>11</sup> followed by Asia and the Pacific (11),<sup>12</sup> Latin America and the Caribbean (8),<sup>13</sup> Western Europe (1)<sup>14</sup> and Eastern Europe (1).<sup>15</sup>

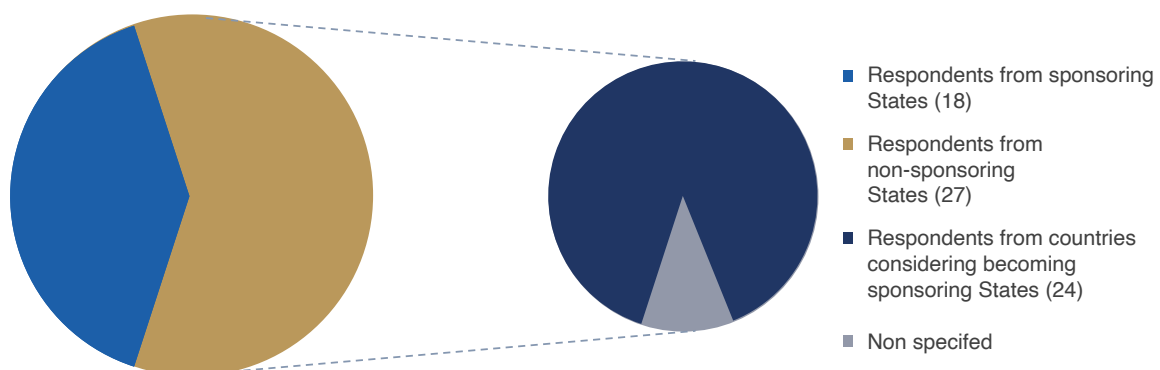
Figure 1: Number of respondents to the survey by region



Forty-one per cent of respondents indicated that they were responding in their capacity as national focal points. 40 per cent of them were from States already sponsoring activities in the Area while among the 27 individuals

who indicated that their country was not a sponsoring State at the time, 24 (89 per cent) indicated that their country was envisaging engaging in activities in the Area.

Figure 2: Number of respondents from sponsoring States versus non-sponsoring States



<sup>11</sup> Algeria, Côte d'Ivoire, Ghana, Guinea, Kenya, Mauritius, Morocco, Nigeria, Seychelles, Sierra Leone, South Africa and Zambia.

<sup>12</sup> Bangladesh, China, Fiji, Indonesia, Japan, Kazakhstan, Kiribati, Myanmar, Nauru, Thailand and Tuvalu.

<sup>13</sup> Antigua and Barbuda, Argentina, Bolivia (Plurinational State of), Cuba, Ecuador, Jamaica, Mexico and Saint Kitts and Nevis.

<sup>14</sup> Portugal.

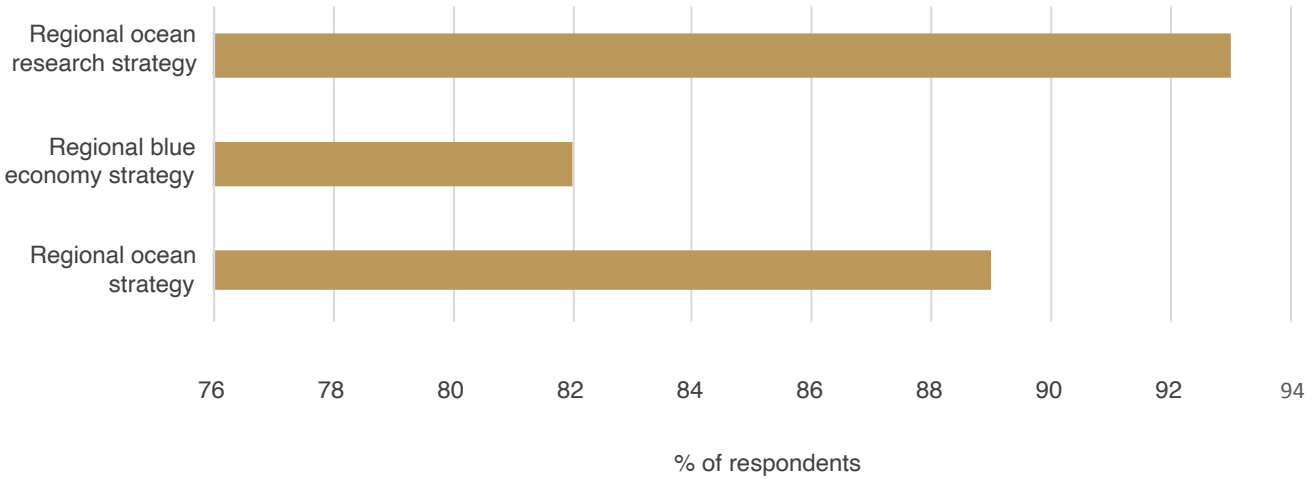
<sup>15</sup> Hungary.

### Development of regional and national frameworks

Regarding the status of regional frameworks, 24 (89 per cent) of the 33 individuals who responded to this question indicated that the development of a regional ocean strategy was

needed, while 23 (82 per cent) indicated that the development of regional blue economy strategy was also needed. It should also be noted that 27 (93 per cent) of the 33 individuals who responded indicated that a regional ocean research strategy was needed.

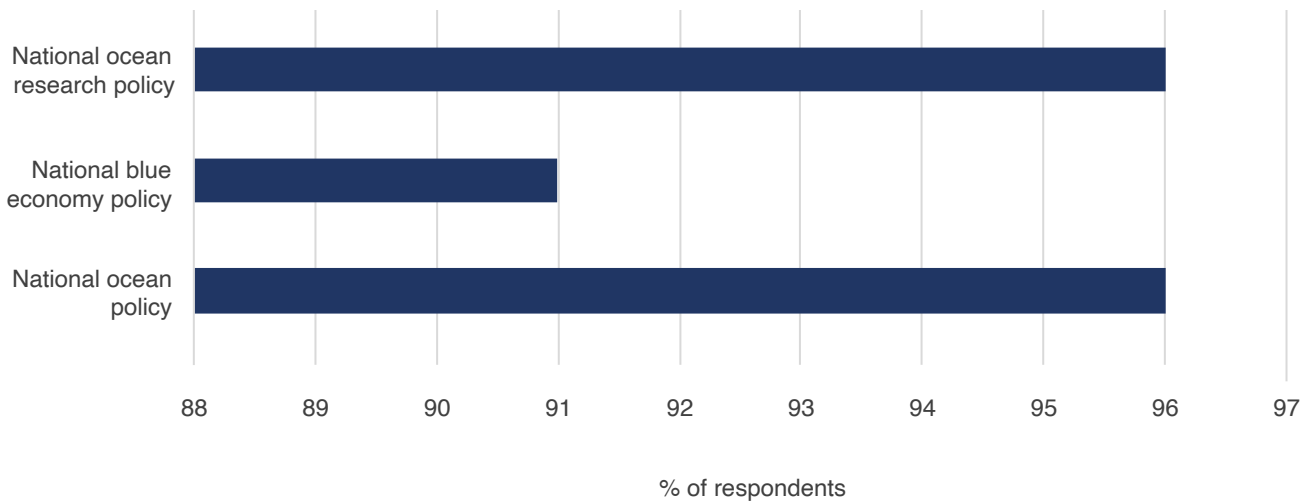
**Figure 3: Priority needs identified for the development of regional frameworks**



Regarding national frameworks, 96 per cent of respondents indicated that the development of a national ocean research policy was needed. The same number indicated that attention should be given to the development

of a national ocean policy, while 91 per cent of respondents highlighted the need for the development of a national blue economy policy.

**Figure 4: Priority needs identified for the development of national frameworks**



### Marine science and technology capacities

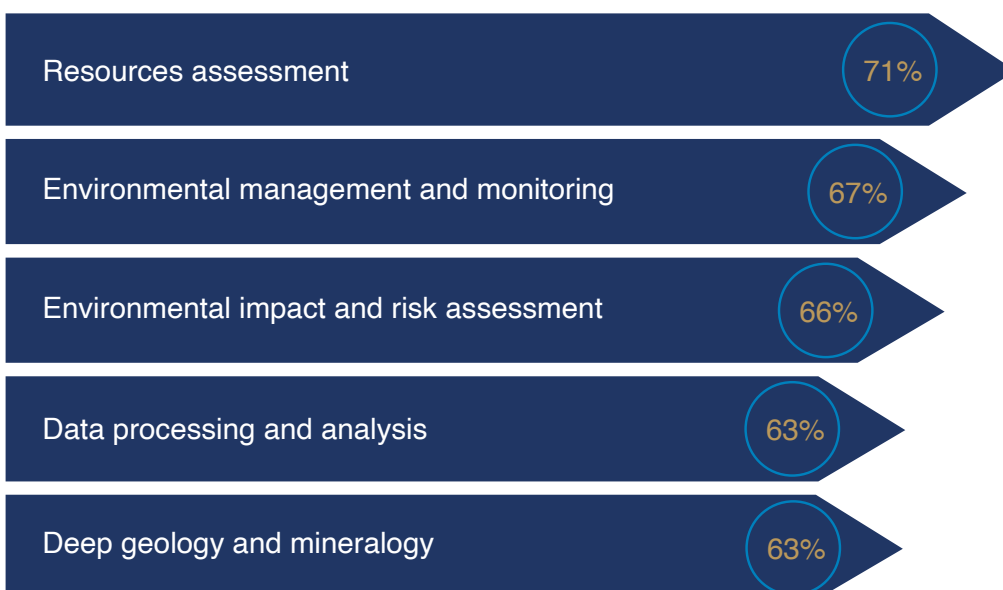
A majority of respondents (97 per cent) indicated that their core national priority needs related to access to laboratory equipment and facilities, and deep-ocean sampling equipment and instrumentation. This was followed by the need for qualified deep-sea science professionals (96 per cent), digital infrastructure (90 per cent) and research vessels to undertake deep-sea research (89 per cent).

When asked to identify the five most important capacity development needs for their country, respondents listed, in order of importance: resources assessment (71 per cent); environmental management and monitoring (67 per cent); environmental impact and risk assessment (66 per cent); data processing and analysis (63 per cent); and deep-sea geology and mineralogy (63 per cent).

Figure 5: Core national priority needs



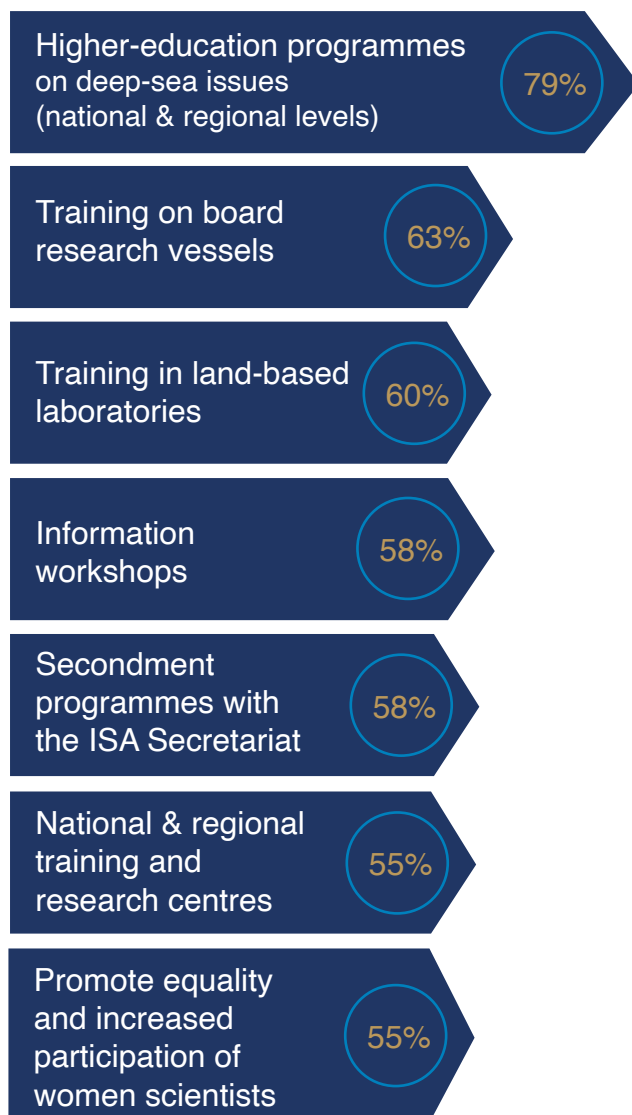
Figure 6: Five most important capacity development needs



Respondents identified various tools that could help their countries meet their capacity priority needs. The main tool thus identified was the establishment of higher-education programmes on deep-sea issues at the national and regional levels (79 per cent of the respondents). This was followed by the need to ensure access to on-board research vessels for training (63 per cent) and land-based laboratory training (60 per cent). Respondents then placed at a similar

level of importance the need to organize information workshops (58 per cent), establish secondment programmes for mid-level national experts within the ISA Secretariat (58 per cent), establish national and regional training and research centers (55 per cent) and promote gender equality and increased participation of women scientists in scientific research activities in the Area (55 per cent).

**Figure 7: Tools identified by respondents to meet their countries' capacity priority needs**



On board a JOGMEC vessel

## Enhancing the role of women in deep-sea research activities

Science, technology and innovation are fundamental to address such global challenges as poverty eradication, economic and social development and the protection of the environment. They are also critical to the achievement of the goals and targets of the 2030 Agenda for Sustainable Development and to ensure that developing countries fully benefit from the blue economy. The vital role of women in contributing to such global objectives has been well established and repeatedly reaffirmed by Governments and at major United Nations conferences and meetings. The linkages between this issue and the empowerment of women have also been reaffirmed over the years through a series of normative and policy commitments, including in the Convention on the Elimination of All Forms of Discrimination against Women (1979), the Beijing Declaration and Platform for Action, adopted at the Fourth World Conference on Women (1995), the Dakar Framework for Action on Education for All, adopted at the World Education Forum (2000), the Tunis Agenda for the Information Society, adopted at the World Summit on the Information Society (2005), the agreed conclusions of the Commission on the Status of Women on access and participation of women and girls in education, training and science and technology, including for the promotion of women's equal access to full employment and decent work, adopted at its 55th session (2011), and General Assembly

resolutions 68/220 on science, technology and innovation for development (2013) and 70/212 on the International Day of Women and Girls in Science (2015).

Numerous initiatives have also been adopted and implemented at the global, regional and national levels to ensure the opening up of new opportunities for women in non-traditional and emerging sectors, such as science, technology, engineering, mathematics and the blue economy. However, in general, the participation of women in those sectors remains low, and more efforts are therefore needed to enhance their involvement. This is particularly true in the field of deep-sea marine scientific research. To this day, women who wish to engage in marine scientific research face real and substantial challenges that are specific to their gender. It is precisely to address this issue that, at the 2017 United Nations Conference to Support the Implementation of Sustainable Development Goal 14, ISA announced its voluntary commitment **"Enhancing the role of women in marine scientific research through capacity-building"** (#OceanAction15467).

It is also worth noting that 35 out of the 47 respondents to the survey answered the question relating to the existence of a national commitment to enhance the role of women in ocean science. Among them, 18 (51 per cent) indicated that such commitment was lacking in their country, while 47 per cent confirmed the urgent need for such a formal commitment.



47% of respondents confirmed the urgent need for a national commitment to enhance the role of women in ocean science



## References and resources

Decision of the Assembly of the International Seabed Authority relating to the implementation of a programmatic approach to capacity development (ISBA/26/A/18) available in 6 official languages of the UN, 2020

ISA International Workshop on capacity development, resources and needs assessment, 2020  
<https://www.isa.org.jm/index.php/node/19637>

ISA, Review of capacity-building programmes and initiatives implemented by the International Seabed Authority 1994-2020, 2020  
<https://www.isa.org.jm/index.php/node/19694>

ISA, Africa's Deep Seabed Resources Project, Pretoria workshop, 2020  
<https://www.isa.org.jm/index.php/node/19586>

ISA High-level webinar to present ISA's draft Action Plan in support of the UN Decade of Ocean Science for Sustainable Development, 2020  
<https://www.isa.org.jm/event/high-level-webinar-present-isas-draft-action-plan-support-un-decade-ocean-science-sustainable>

ISA/UN-OHRLLS High-level webinar: enhancing the role and participation of women in deep-sea scientific research to support the implementation of UNCLOS and advance the 2030 Agenda, 2021.  
<https://www.youtube.com/watch?v=HU4csgFvhG0>



## ABOUT THE INTERNATIONAL SEABED AUTHORITY

Made up of 167 Member States, and the European Union, ISA is mandated under the UN Convention on the Law of the Sea to organize, regulate and control all mineral-related activities in the international seabed area for the benefit of mankind as a whole. In so doing, ISA has the duty to ensure the effective protection of the marine environment from harmful effects that may arise from deep-seabed related activities.