



## Council

Distr.: General  
9 July 2013

Original: English

---

**Nineteenth session**  
Kingston, Jamaica  
15-26 July 2013

### **Summary report of the Chair of the Legal and Technical Commission on the work of the Commission during the nineteenth session of the International Seabed Authority**

#### **I. Introduction**

1. The Legal and Technical Commission held two sessions during the nineteenth session. The first session was held from 4 to 8 February 2013; the Commission commenced its second session on 8 July 2013, one week in advance of the meetings of the Council and Assembly, and continued its work until 15 July. In total, the Commission held 22 formal meetings and worked informally during the weekends.

2. On 4 February 2013 the Commission adopted its agenda for the nineteenth session (ISBA/19/LTC/1). On the same day, the Commission elected Russell Howorth (Fiji) as Chair and Christian Reichert (Germany) as Vice-Chair.

3. The following members of the Commission participated in the meetings: David Billett, Harald Brekke, Winifred Broadbelt, Georgy Cherkashov, Domenico da Empoli, Laleta Davis-Mattis, Kaiser De Souza, Elva Escobar, Russell Howorth, Kiseong Hyeong, Elie Jarmache, Emmanuel Kalngui, Eusebio Lopera, Pedro Madureira, Hussein Mubarak, Nobuyuki Okamoto, Mario Oyarzábal, Andrzej Przybycin, Christian Reichert, Cristian Rodrigo, Maruthadu Sudhakar and Haiqi Zhang. The following members were unable to attend the session in February: Domenico Da Empoli, Emmanuel Kalngui, Hussein Mubarak, Cristian Rodrigo and Maruthadu Sudhakar. The following member was unable to attend the session in July: Haiqi Zhang. The following members were unable to attend both sessions: Adesina Adegbe, Farhan Al-Farhan and Aleksander Čičerov. Following past practice, Victor Enrique Marzari also participated in the meetings of the Commission prior to his formal election by the Council on 16 July 2013 for the remainder of the term of office of Mario Oyarzábal who resigned from the Commission after the session in February.



## **II. Activities of contractors**

### **A. Status of contracts for exploration**

4. The Commission was provided with information on the status of the contracts for exploration for polymetallic nodules and for polymetallic sulphides, including on the progress made in respect of each of the plans of work for exploration that were approved by the Council at the seventeenth and eighteenth sessions of the Authority. The Commission took note of the information and of the consequential increase in its workload related to the review of contractors' annual reports. Noting that three contracts for exploration were pending signature, the Commission suggested that the pending contractors could be guided by the newly issued recommendations for the guidance of contractors and sponsoring States relating to training programmes under plans of work for exploration (see para. 15 below).

### **B. Consideration of the annual reports of contractors**

5. In the light of the increased number of annual reports of contractors, the Commission decided that it was necessary to streamline its working procedures, and adopted a decision to this effect at the February meeting. The decision is contained in annex I to the present report.

6. In accordance with the decision made by the Commission in February, the annual reports of the contractors were made available to members of the Commission through a secure website. The secretariat, with the assistance of a consultant, undertook a technical evaluation of the reports, including a detailed analysis of the contractors' activities, which assisted the work of the Commission.

7. The Commission considered and reviewed 11 annual reports during its July meeting. It divided itself into four working groups on (a) environmental matters, (b) legal and financial matters, (c) training and (d) technical matters, in order to undertake a detailed examination of the annual reports, on which the Commission provided a report to the Secretary-General. General comments for the Council on the contractors' annual reports are contained in annex II to the present report.

8. The Commission considered and concluded that the regulatory framework for activities in the Area needs to be informed by a series of key milestones against which progress can be measured, each with a minimum threshold level that must be achieved and approved before a first generation mining licence can be awarded. This should be reflected in the final five-year programme of activities for each contractor, and supported by a supplementary implementation plan that provides details of progress towards the required targets. Until such a framework is put in place, it is difficult for the Commission to place in context the detailed information contained in the annual reports and to make an objective assessment of the contractors' overall compliance with their obligations in the conduct and reporting of the contractors' activities over the duration of their contract.

9. The data gathered individually and collectively by contractors throughout the exploration phase are the appropriate evidence for that proposed regulatory framework. The management, assembly, display and availability of data, information and knowledge is fundamental to the credibility of the Authority and its ability to cooperate broadly with other agencies. The review of annual reports has

highlighted that current arrangements within the Authority for collecting and managing data are likely to jeopardize future data access and use. Data-handling obligations will increase with the involvement of more contractors and requirements for sharing and mapping data layers. Without a clear data management strategy, the argument for contractors to collect data in the first place is significantly reduced. Currently, the completeness of data submission, including metadata and cruise reports, is unsatisfactory. Furthermore, in terms of internal procedures, including data-handling processes and verification, the Authority lacks a centralized application that adequately displays data and allows interrogation. Data-handling arrangements should be properly documented and quality controlled so that comparable datasets are available for use by relevant stakeholders.

**C. Information on the periodic review of implementation of the plan of work for exploration for polymetallic nodules by the Government of India**

10. The Commission was informed that the periodic review of the implementation of the plan of work for exploration for polymetallic nodules by the Government of India has yet to be completed. The contractor had submitted a proposal for its final five-year programme of activities and the Secretary-General had responded to the proposal with comments, including information provided by the Commission. The Commission was informed that the Secretary-General would hold further consultations with the contractor, with a view to concluding the periodic review as soon as possible.

**D. Recommendations for the guidance of contractors relating to the implementation of training obligations**

11. The Commission recalled that, in 2012, in its general comments regarding training programmes, it had recommended that such programmes should be created and specifically described in applications for approval of plans of work. The Commission also noted that it would be helpful to draw up recommendations for the guidance of contractors in devising and implementing training programmes.

12. In response, the secretariat had provided a document (ISBA/19/LTC/7) containing background on the training requirements in the Convention, the 1994 Agreement and the Regulations. The document concluded that several issues need to be considered with regard to the design and implementation of training programmes, and it was therefore proposed that a set of guidelines be established to address those issues. A set of draft recommendations in this respect was submitted to the Commission under document symbol ISBA/19/LTC/CRP.7. Following an initial discussion of the issues, the Commission requested the secretariat to provide it with further information and a revised version of document ISBA/19/LTC/CRP.7.

13. A report entitled “Review of training and capacity-building obligations of exploration contractors with the International Seabed Authority” (“training report”) prepared by an external expert, together with a revised version of the draft recommendations for guidance (ISBA/19/LTC/CRP.7/Rev.1), were presented to the Commission for its consideration at the July meeting. A total of 23 recommendations were put forward respectively for the short term and medium

to longer-term implementation of the training and capacity-building obligations of exploration contractors, including the recommendation that the Commission adopt as soon as possible interim recommendations for guidance for contractors on the implementation of training programmes.

14. In its discussions on the training report, the Commission noted with concern that over the past 20 years, only 26 traineeships had been provided. The Commission recognized the necessity of standardizing the number of traineeships provided by the contractors. While the training programmes should develop as wide a range as possible of skill development, each exploration cruise should include, in principle, a training component and a minimum of one training place for each cruise, at least for one berth at sea. Considering the significance of training and capacity-building in respect of deep-sea mineral exploration to the developing States and the need to strengthen the training programme, the Commission recommended that a position should be established in the secretariat for managing the training programmes. The Commission also noted that recent advances in information and communications technology have provided new opportunities for training.

15. Following its review of ISBA/19/LTC/CRP.7/Rev.1, the Commission agreed to adopt it as an interim document for advising the contractor to implement its training obligation and assisting the Secretary-General in negotiating with the contractor on training programmes. The Commission also decided to keep the matter under review.

#### **E. Selection of candidates for training**

16. The Commission was informed that a total of eight training places had been made available in 2013 by the China Ocean Mineral Resources Research and Development Association (COMRA), Tonga Offshore Mining Limited (TOML) and the Federal Institute for Geosciences and Natural Resources of the Federal Republic of Germany (BGR), pursuant to their contracts for exploration with the Authority. As at 30 June 2013, the secretariat had received a total of 45 applications from 19 different members of the Authority for those training opportunities.

17. After detailed consideration of all the applications received, and based on the criteria of academic qualifications, age and language skills, professional experience, their reasons for seeking training and how the training would benefit the nominating Government, and giving due consideration to the need for equitable geographical representation, the Commission recommended eight candidates and eight alternates for training. The details of the training programme and the selection process applied by the Commission, as well as the names of the recommended candidates, are contained in document ISBA/19/LTC/13.

### **III. Environmental implications of activities in the Area**

18. As agreed at the eighteenth session, the Commission resumed consideration at its February meeting of the draft recommendations for the guidance of contractors in the assessment of possible environmental impacts arising from exploration for marine minerals in the Area, including polymetallic sulphides. In considering the draft, the Commission took into account comments received from contractors, as

well as a subgroup of environmental experts from the Commission who had worked on the draft during the intersessional period. Following its deliberations, the Commission adopted the recommendations for the guidance of contractors for the assessment of the possible environmental impacts arising from exploration for marine minerals in the Area (ISBA/19/LTC/8).

#### **IV. Regulatory activities of the Authority**

##### **A. Proposed amendments to the regulations on prospecting and exploration of polymetallic nodules in the Area**

19. The Commission recalled that it had been requested by the Council to amend the nodules regulations (adopted in 2000) in order to bring them into line with the sulphides regulations (adopted in 2010). In response to that request, the secretariat had prepared a document containing proposed amendments in order to align the text of the nodules regulations with that of the sulphides regulations. The Commission further recalled that the matter had been on its agenda in 2012 but that there had been insufficient time to consider the issue, which had been made a priority for 2013.

20. Following deliberations, the Commission agreed on amendments to the Regulations on prospecting and exploration for polymetallic nodules in the Area in order to align them with the Regulations on prospecting and exploration for polymetallic sulphides in the Area. The amended nodules regulations, as adopted by the Commission and proposed to the Council for adoption, are contained in document ISBA/19/C/WP.1.

21. The Commission also held a general discussion on the issue of monopolization of activities in the Area. It noted that in recent years new models of business arrangements had begun to emerge that required the attention of the Commission. It was considered that in the light of current developments, including the requirement for the alignment of the regulations, the Commission's work on this matter should be prioritized and that the Council may also wish to give further consideration to the potential for monopolistic behaviour in relation to polymetallic nodules.

##### **B. Issue relating to proposed regulations for exploitation of polymetallic nodules in the Area**

22. The Commission held a brief discussion on issues relating to proposed regulations for exploitation of polymetallic nodules in the Area. Members of the Commission acknowledged the work done by the secretariat in producing International Seabed Authority Technical Study No. 11 and noted that the final version of the study took into account some of the preliminary comments made by members of the Commission on the initial draft prepared by the consultants. There was insufficient time during the meeting for a full discussion of the recommendations contained in the report. In general, however, the Commission considered that the proposed strategic plan set out in chapter 10 of the report provided a useful indication as to how the Authority could proceed to develop the regulatory framework. In particular, the Commission endorsed the suggestion to prepare background studies and conduct a stakeholder survey as preliminary

measures that would allow the Commission to begin its detailed work on the regulations.

23. In July, the Commission also noted the areas of specific research and study suggested in the report and identified a number of studies that could usefully be undertaken prior to the next meeting, subject to the availability of resources. These included: a comparative study of regulatory regimes based on licences and concessions, a study of reporting mechanisms and a study of mechanisms for penalties for non-compliance. A request was made for further development of the concept of a transitional regime between exploration and exploitation. It was also suggested that the secretariat provide a draft stakeholder survey for review by the Commission at its next meeting. Members of the Commission strongly recommended that, in order to advance work on the exploitation regulations, the larger part of the next meeting of the Commission should be dedicated to this issue.

## V. Other matters

24. Members of the Commission drew attention to the provisions of article 163, paragraph 8, of the Convention and rule 11 of the rules of procedure of the Commission relating to financial interests in activities relating to exploration and exploitation in the Area. The Commission requested the secretariat to provide it at the next meeting with clarification and guidance as to the scope and interpretation of those provisions.

## VI. Applications for approval of plans of work for exploration in the Area

25. The Commission considered six applications for approval of plans of work for exploration in the order in which they had been received, as follows:

| <i>Applicant</i>   | <i>Sponsoring State</i> | <i>Date of application</i> | <i>Resource</i>                      |
|--|-------------------------|----------------------------|--------------------------------------|
| China Ocean Mineral Resources Research and Development Association (COMRA) | China                   | 27 July 2012               | Cobalt-rich crusts                   |
| Japan Oil, Gas and Metals National Corporation (JOGMEC)                    | Japan                   | 3 August 2012              | Cobalt-rich crusts                   |
| Ministry of Natural Resources and Environment of the Russian Federation    |                         | 6 February 2013            | Cobalt-rich crusts                   |
| UK Seabed Resources Ltd. (UKSRL)   | United Kingdom          | 8 February 2013            | Polymetallic nodules                 |
| Government of India  |                         | 26 March 2013              | Polymetallic sulphides               |
| Ocean Mineral Singapore Pty Ltd. (OMS)                                     | Singapore               | 19 April 2013              | Polymetallic nodules (reserved area) |

26. At the February meeting, the Commission considered and made recommendations to the Council in respect of the applications for plans of work for exploration for cobalt-rich ferromanganese crusts as submitted by COMRA and JOGMEC. The report and recommendations of the Commission are contained in documents ISBA/19/C/2 and ISBA/19/C/3.

27. At the July meeting, the Commission heard presentations of four applications submitted by the Ministry of Natural Resources and Environment of the Russian Federation, UKSRL, the Government of India and OMS, respectively. The Commission then gave preliminary consideration to each of the applications in turn in closed sessions. The Commission also submitted a list of questions to each applicant, based on its initial consideration. Responses to the questions submitted by the Commission were received from each applicant.

28. The Commission was not able to achieve consensus in recommending the approval of the plan of work submitted by the Ministry of Natural Resources and Environment of the Russian Federation due to the formal objection of one member of the Commission. The objection was based on reservation concerning the data supplied by the applicant and the methodology applied by the technical working group for calculating the commercial value of the two areas identified in the application (regulation 12.4, ISBA/18/A/11).

29. The Commission did not have time to complete its consideration of the remaining three applications by UK Seabed Resources Ltd., the Government of India and Ocean Mineral Singapore Pte. Ltd. (being considered in that order). The Commission therefore decided to defer consideration of all four applications, to be taken up as a matter of priority at its next meeting.

## VII. Conclusion

30. The Commission emphasized that it had been unable to complete its agenda and that it had been possible only to give superficial consideration to several issues. While there had been substantial improvements in working practices, including the possibility of secure remote access to essential data and information, the Commission was still faced with an overwhelming workload. In particular, the Commission noted that it was required to give careful consideration to each new application for approval of a plan of work for exploration and that that aspect of its work could not be rushed.

31. The additional time allocated to the Commission in 2013 had enabled it to make progress on a number of important matters, including the issuance of recommendations for the guidance of contractors for the assessment of the possible environmental impacts arising from exploration for mineral resources in the area; selection of candidates and recommendations for the guidance of contractors and sponsoring States on the implementation of training programmes; the alignment of the nodules regulations with the sulphides regulations; and the review of the annual reports of contractors. The Commission had also considered six new applications for approval of plans of work for exploration and had completed its recommendations in respect of two of those applications.

32. Notwithstanding the above-mentioned progress, the Commission recalled that there were still many other outstanding matters that it had not had time to consider,

including a number of items that the Council had specifically requested the Commission to consider. These included:

- (a) Draft regulations for exploitation;
- (b) Standardization of data and format of the annual reports of the contractors;
- (c) Review of the environmental management plan for the Clarion-Clipperton Zone (due in 2014);
- (d) Analysis of regulation 11.2 of the nodules regulations and regulation 11.2 of the sulphides regulations and regulation 11.2 of the crusts regulations (“effective control”);
- (e) Recommendations for criteria for the implementation of regulation 23, paragraph 7, of the sulphides and crusts regulations relating to monopolization of activities in the Area;
- (f) Guidance on mechanisms of compensation for damage when neither the contractor nor the sponsoring State is responsible;
- (g) Guidance on implementation of monitoring programmes and provision for a staff of inspectors.

33. In the light of these circumstances, the Commission recommended that it continue to hold two meetings in 2014, with full services for both meetings. In that regard, the Commission noted that the provision of full conference services in 2013 had ensured the active participation of almost the full membership of the Commission at the meetings in February and July. The first meeting, to be held early in 2014, would be devoted to completing consideration of the outstanding applications and the consideration of issues relating to the exploitation code.



## Annex I

### **Decision by the Legal and Technical Commission relating to the methodology for review of annual reports of contractors**

1. The Commission recalled its concerns expressed to the Council at the eighteenth session in 2012 in regard to the growing workload of the Commission both now and in the foreseeable future and in particular, in regard to its ability to satisfactorily undertake the review of the annual reports of contractors. The Commission was pleased to note the positive support received from members of the Council, including the decision to hold an additional meeting of the Commission in 2013. Given the anticipated growth in the overall work of the Commission, it was noted that two meetings of the Commission in each year would be needed at least for the next several years.

2. In order to streamline and improve the efficiency of its procedures relating to the review of annual reports of contractors, the Commission decided to implement the following working procedures, at least provisionally for 2013, with a view to reporting further to the Council:

(a) The Commission will, as far as possible, designate the members of any technical working groups entrusted with reviewing the annual reports at its first meeting each year, so that the members of the working groups can prepare their work in advance;

(b) Taking into account the fact that annual reports of contractors are due to be submitted no later than 31 March each year, the Commission requested the secretariat to examine the possibility of making the annual reports of contractors accessible, through a secure website or similar mechanism, to designated members of the Commission in advance of the July meeting of the Commission. In that regard, the Commission took note of the measures and procedures established by the Secretary-General for the classification and secure handling of confidential data and information entrusted to the Authority;

(c) The Commission also recommended that the Secretary-General write to contractors to remind them of the obligation to submit annual reports and data in the format recommended by the Commission by 31 March 2013 and highlighting the importance of timely submission of reports to the efficiency of the Commission's work;

(d) The Commission also requested the secretariat to review its internal operating procedures to ensure that annual reports, and the data that they contain, are processed efficiently when they are received by the secretariat and that a full and complete preliminary technical evaluation of the annual reports is placed before the Commission for its consideration. This should also include a report by the secretariat on the data submitted by contractors, which should be entered into the relevant databases maintained by the Authority and made available for the members of the Commission to review;

(e) The Commission emphasized the value of periodic analyses of the progress of exploration activities setting each annual report within the context of the progressive work being completed by each contractor during the licence period, in particular for environmental baseline data and resource assessment data, and

encouraged the secretariat to continue to prepare such analyses for its review and consideration;

(f) The Commission decided that, in reporting to the Secretary-General and to the Council on its review of the 2013 annual reports of contractors, it would, on a provisional basis, follow the format proposed in document ISBA/19/LTC/CRP.6, subject to such modifications as may be necessary.

3. The Commission noted with appreciation the support of the secretariat for the adoption of the approach outlined above.

## Annex II

### **General comments on annual reports of contractors and on their five-year programme of activities**

#### **A. General comments on annual reports of contractors**

1. The Commission expressed its satisfaction to the secretariat for the creation of a secure website where annual reports of contractors had been made available to the Commission, and encouraged the development of the site by including additional information and documents, such as applications and contracts.

2. All 11 contractors submitted their annual activity reports for the 2012 period in a timely manner. Six additional contracts have either been signed during 2013 or are currently in the final stages of negotiation, and thus the first reports from those contractors will be forthcoming in subsequent years. Six more applications are currently being considered. It should be noted that some 17 annual reports will need to be considered in 2014 and possibly 23 or more from 2015.

3. All the reports submitted for 2012 follow the general template prescribed by the Commission (ISBA/8/LTC/2). All contractors have followed the general headings but the level of detail is highly variable and there remain significant inconsistencies in the quality of the reports. More specifically:

(a) Explicit presentation of the objectives is highly variable, making it difficult for the Commission to assess progress in implementing the programme of work;

(b) In previous evaluations of annual reports by the Commission, it was recommended that bulleted summaries of the key conclusions be included for each of the activity areas within the report, providing a clear focus for the evaluation process. This practice has been adopted in the more comprehensive reports, and should be standard across all reports;

(c) Some contractors have made explicit the continuity of the present year's work with previous work, and set it in the context of future work, but this is not universal. This inconsistency is compounded by differences in the level of detail and planning set out in the five-year programmes;

(d) Contractors must adopt the structure and format of the template, even if there is no reporting on particular items;

(e) The Commission invites the secretariat to request the contractors to comply with the data submission requirements related with exploration work, as stated in document ISBA/18/C/20.

4. The evaluation process provides the Authority with a useful overview of progress. However, it is a largely subjective exercise, and no formal criteria are available against which to judge the acceptability of a contractor's report or to measure their progress. It is recommended that a series of key "contractor milestones" with an appropriate threshold level, be devised in each activity area, by which progress can be measured. These should be included as part of the workplan of new applications in order that they can be incorporated into future contracts.

5. The rolling summary of annual achievements provided by one contractor is seen as good practice, and assists the transparency of the annual evaluation process. In cases in which contractors have provided a forward look of activities for the following year, this has also proved to be a useful contribution to the evaluation process. It is recommended that all contractors provide an overview of the following year's planned activities in their annual reports.

6. It is clear that the emphasis of effort on the different aspects of the contractors' activities is extremely variable, as is the pace at which each contractor is proceeding. Some contractors are focusing their efforts on developing mining technologies, while others are focused on environmental studies or exploration, but few are approaching all aspects of the required work with sufficient diligence and commitment.

7. It is a concern that the current system for evaluating contractors' annual reports relies heavily upon the corporate memory of the Commission members, due to time constraints. This has implications for the consistency of the Commission's feedback to contractors.

8. Based on regulation 26 of the nodules regulations, it is recommended that an advice be prepared stating the requirements for applying for an extension of the contract. In addition, the advice should include possible implications for the Authority and the contractor of such an extension.

9. Collaboration on work programme implementation between contractors should be encouraged.

## **B. General comments relating to the five-year programmes of activities of contractors**

10. The five-year programmes of activities appear to contain different levels of expectation for different contractors. Minimum requirements should be set for all contractors, including a more explicit breakdown of activities against which the contractors should report.

11. In addition to the programme of activities for the final five-year period, a supplementary implementation plan providing details of progress against each contractor's timeline would be useful. Contractors should provide a detailed account of how they plan to achieve the thresholds, as described in point 6, in identifying a first-generation mine site, finalizing baseline environmental data, developing a mining system prototype and setting in place processing arrangements by the end of their respective contracts. Contractors should be mindful of data and information to be submitted on expiration of the contract, in line with section 11 of annex 4 to the Regulations.

---