ISBA/30/C/CRP.2
29 November 2024
English only

Thirtieth session
Council session, part I
Kingston,
17 – 28 March 2025

Elements to be relocated from the draft regulations on exploitation of mineral resources in the Area to the Standard and Guidelines and other rules, regulations and procedures of the Authority

Revised suspense document

Explanatory note

1. This document is a collation of the material removed from the consolidated text (ISBA/29/C/CRP.1) and the revised consolidated text (ISBA/30/C/CRP.1) based on the discussions during the third part of the twenty-eighth session, the twenty-ninth session and the written proposals received.

2. Delegations and observers are reminded that during the negotiations of the draft regulations on exploitation of mineral resources in the Area, many delegations have asked for highly technical elements to be moved from the draft exploitation regulations to the relevant Standard and Guidelines and other rules, regulations and procedures. Therefore, the text below is placed in suspense, and not discarded. The content will inform in particular the forthcoming consideration of Standards and Guidelines.

3. The revised suspense document contains explanations and indication of where the elements originates from in the draft exploitation regulations and where the proposals are anticipated to later be placed. Furthermore, the reference to the original ISBA text and date is inserted in order to trace the development of the text.

Moved from:

Regulation 2, paragraphs 3 and 6

The revised draft text of the Co-Facilitators of the Informal Working Group on Institutional Matters (ISBA/28/C/IWG/IM/CRP.2) - Moved in February 2024.

To be placed:

For the use of policy discussions and possible incorporation

The text:

3. Exploitation in the Area shall not commence until the legal framework intended for the effective protection and preservation of the Marine Environment is adopted and scientific evidence demonstrates that the Exploitation will be conducted in such a manner as not to cause significant and harmful changes to the Marine Environment and its resources and to effectively protect and preserve the Marine Environment pursuant to article 145 and [article 209 of] Part XII of UNCLOS.]

[3 Alt Exploitation shall not be authorized in the Area unless, inter alia, phase one and two Standards and Guidelines are adopted, and effective protection of the Marine Environment from harmful effects

can be ensured consistent with Article 145 of the Convention [and including biological diversity and ecosystem integrity] [and effective protection of human life in accordance with Article 146 of the Convention].

[3 Alt 2. Exploitation in the Area shall not commence until:

(a) the legal framework intended for the effective protection and preservation of the Marine Environment has entered into force [and the Authority has adopted an environmental policy];

(b) the implementation of [Target 3 of] the Kunming-Montreal Global Biodiversity Framework is well on track in the area beyond national jurisdiction; and

(c) scientific evidence demonstrates that Exploitation will be conducted in such a manner so as: not to cause significant and harmful changes to the Marine Environment and its resources, [pursuant to article 196 of , and] to effectively protect and preserve the Marine Environment[, including biological diversity and ecosystem integrity] pursuant to Article 145 and Part XII of the Convention [including biological diversity and ecosystem integrity], and not to impede the full implementation of [Target 3 of] the Kunming-Montreal Global Biodiversity Framework in the area beyond national jurisdiction.

[…]

[6. Members of the Authority, Sponsoring States, Contractors, and the Authority shall use best endeavours in their actions to uphold public trust in and regulatory integrity [of the Authority], and shall not engage on decisions in which they have a conflict of interest.]

Moved from:

Regulation 17, para 7(d)

The revised draft text of the President (ISBA/28/C/WOW/CRP.2) – Moved in February 2024.

To be placed:

Material change to a work plan provision

The text:

(d) In order to progress from Exploration to Exploitation of a site within the Contract Area, where such Exploitation activity was not covered by the agreed Plan of Work, the Contractor must submit a new environmental impact statement and revised Plan of Work, in accordance with regulation 46.bis and which must be approved by the Authority in accordance with Regulations 12 to 16.

Moved from:

Regulation 20 (6) (b) bis

The consolidated text (ISBA/29/C/CRP.1) – Moved in November 2024.

To be placed:

To be decided.

The text:

(b) bis. The cumulative environmental impact does not exceed the thresholds set by the applicable Regional Environmental Management Plan as a result of the renewal, and that such renewal does not hinder the achievement of the strategic and regional environmental goals and objectives;

Moved from:

Regulation 21 (2) (a) and (b)

The consolidated text (ISBA/29/C/CRP.1) – Moved in November 2024.

To be placed:

Suggested deleted

The text:

(a) Termination due to a Contractor's material non-compliance under its terms of sponsorship: termination to takes effect [no earlier] [no later than] [6] months after the date of receipt of the notification by the Secretary-General; [or]

(b) Termination due to reasons other than those listed in paragraph (a) above: termination to takes effect no [earlier] [later] than 12 months after the date of receipt of the notification by the Secretary-General.

Moved from:

Regulation 25 (2)

The consolidated text (ISBA/29/C/CRP.1) – Moved in November 2024.

To be placed:

Suggested deleted as the para has been replaced with the alternative version. Paras 3-5 are suggested deleted.

The text:

2. Where, as part of a revised Plan of Work, the Contractor delivers a revised Environmental Impact Statement, Environmental Management and Monitoring Plan and Closure Plan under paragraph 1 above, regulation 57 (2) shall apply mutatis mutandis to such Environmental Plans [if the modification to the Environmental Plans constitutes a Material Change], and such Environmental Plans shall be dealt with in accordance with the procedure set out in regulation 11.

3. Provided that, where applicable, the procedure under regulation 93bis] has been completed, the Commission shall, at its next meeting, provided that the documentation has been circulated at least 30 Days before the meeting, examine and assess the Feasibility Study and any revised Plan of Work supplied by the Contractor under paragraph 1 above, and in the light of any [submissions received under regulation 93bis] on the Environmental Plans.

4. If the Commission determines that the revised Plan of Work, including any amendments thereto dealt with in accordance with regulation 57, continues to meet the requirements of regulations 12 and 13, it shall recommend to the Council the approval of the revised Plan of Work. [If the Commission determines that it does not meet said requirements, the procedure established in Regulation 14 (b) will be applied.]

5. The Council shall consider the report and recommendation of the Commission relating to the approval of the revised Plan of Work in accordance with paragraph 11 of section 3 of the annex to the Agreement.

Moved from:

Regulation 26, paragraph 3bis

The revised draft text of the President (ISBA/28/C/WOW/CRP.2) – Moved in February 2024.

To be placed:

EPG Standard and Guidelines

The text:

3 bis. The Environmental Performance Bond shall take the form of a letter of credit or surety bond guaranteed by a financial institution with a long-term credit rating of AA or better from Fitch Ratings, Moody's or Standard & Poor and meeting the other financial criteria provided for in the Standard.

Moved from:

Regulation 29, para 2, second sentence and para 3-4.

The revised draft text of the President (ISBA/28/C/WOW/CRP.2) – Moved in February 2024.

To be placed:

In relevant annex or standard and guidelines.

The text:

If business practices are suspended due to global economic conditions or force majeure, the Contractor shall be allowed to maintain a longer suspension. The Commission shall [in consultation with the Economic Planning Commission], upon determining that the reasons for the reduction or suspension are reasonable, including where the prevailing economic conditions make Commercial Production impracticable, [of for other circumstances beyond the Contractor's control] recommend approval of the suspension to the Council. The Council shall, based on the recommendation of the Commission, decide on the reduction or suspension requested by the Contractor. The Contractor may apply for more than one suspension. [During the period when the Contractor reduces or suspends production, the annual fixed fee or royalties paid by the Contractor shall be exempted or deducted appropriately].

3. In the event of any suspension in mining activities, the Contractor shall continue to monitor and manage the Mining Area in accordance with the Closure Plan. Where suspension continues for a period of more than 12 months, the Commission may require the Contractor to submit a final Closure Plan in accordance with regulation 60.] Where the Contractor elects to suspend all production for more than five consecutive years, the Council may [suspend] [terminate] the exploitation contract following consultation with the Contractor, and the Contractor [may] [shall] be required to implement the final Closure Plan.

4. A Contractor shall notify the Secretary-General as soon as it recommences any mining activities, and no later than 72 hours after such recommencement, and, where necessary, shall provide to the Secretary-General such non-market information as is necessary to demonstrate that the issue triggering a reduction or suspension has been addressed. The Secretary-General shall notify the Council that production has recommenced.

Moved from:

Regulation 29 Alt.

The revised draft text of the President (ISBA/28/C/WOW/CRP.2) – Moved in February 2024.

To be placed:

Relevant Guidelines

The text:

Reduction or suspension in production due to market conditions

1. In pursuance of Regulation 2(2)(a) relating to the efficient conduct of activities, and the avoidance of unnecessary waste, and to ensure that the resources are being mined optimally in accordance with the Mining Work Plan, a Contractor shall, in accordance with Best Industry Practices:

(a) Avoid inefficient mining practices;

(b) Minimize the generation of waste in the conduct of exploitation in the Area

2. A Contractor shall include in its annual report under Regulation 40 such information and Reports as the Secretary General requests, in accordance with the Standards and Guidelines, to demonstrate that the Contractor is meeting the obligations in paragraph 1 above.

3. If the Secretary General becomes aware that Contractor is not meeting the obligations in paragraph 1 above, by way of written notice to the Contractor, request a review of mining and processing activities carried out under the Plan of Work. The Contractor shall implement any modifications to bring the Mining Workplan and any mining and processing practice into conformity with Best Industry Practices.

4. Members of the Authority shall, to the best of their abilities, assist the Secretary General through the provision of Data and information in connection with this regulation where processing, treatment and refining of ore from seabed mining occur under their jurisdiction and/or control.

Moved from:

Regulation 44 ter

The consolidated text (ISBA/29/C/CRP.1) – Moved in November 2024.

To be placed:

General policy

The text:

Environmental Goals and Objectives

1. In performing their roles and obligations under the Convention, the Agreement, and all relevant rules, regulations and procedures of the Authority, Contractors, the Enterprise, the Authority and its organs, and Sponsoring States shall be guided by the Strategic Environmental Goals and Objectives, set out in paragraphs 6 and 7.

2. The Council shall ensure that the Strategic Environmental Goals and Objectives pursuant to paragraphs 6 and 7 are operationalized through regionally and Mineral specific environmental objectives [including] in Regional Environmental Management Plans.
3. The Council shall ensure that the Strategic Environmental Goals and Objectives pursuant to paragraphs 6 and 7 and the regionally and Mineral specific environmental objectives [in Regional Environmental Management Plans] pursuant to paragraph 2 are further operationalised through environmental thresholds, developed pursuant to Regulations 45(2) and 94, prior to the assessment of the first application for a Plan of Work for exploitation.
4, Contractors, applicants, the Council and the Commission shall ensure that a proposed Plan of Work reflects and contributes to the achievement of the Authority's [Strategic] Environmental Goals and Objectives, [including those] pursuant to paragraphs 6 and 7 as well as the relevant regionally and Mineral specific environmental objectives pursuant to paragraph 2.
5. The Authority shall keep its Strategic Environmental Goals and Objectives under periodic review and ensure amendments to reflect advances in scientific research and knowledge. Where the Authority's Environmental [Goals and] Objectives are revised, the Commission shall:
(a) inform Contractors and Sponsoring States and discuss whether any modification of a Plan of Work is required pursuant to Regulation 57; and
(b) recommend to the Council any necessary amendments to other relevant instruments, including Standards, Guidelines, and Regional Environmental Management Plans.
6. The strategic Environmental Goals are to sustain [and contribute to restoring] marine (benthic and pelagic) ecosystem integrity, including the physical, chemical, geological and biological environment, [and contributing to restoring ecosystem integrity].
7. The Authority's strategic Environmental Objectives are to:
(a) Prevent [non-negligible] loss of [biodiversity, including] genetic diversity, species richness, habitat or community types, and structural complexity;
(b) Maintain the ability of populations to replace themselves, including ensuring population connectivity and the preservation of suitable habitat;
(c) Prevent significant changes in the distribution, abundance or productivity of species [of flora and fauna];
(d) Prevent further jeopardy to endangered or threatened species or populations of said species;
(e) [Prevent the degradation] [Sustain] of ecosystem functions (e.g. the long-term natural productivity of habitats, elemental cycling, trophic relationships);
(f) Prevent non-negligible risks of Contamination by pollutants, damage to [flora and fauna]/[species], or other harmful effects to ecosystem integrity during any phase of the mining process;
(g) Prevent significant changes in the atmosphere, climate and weather patterns, the terrestrial environment, or the Marine Environment;
(j) Prevent significant adverse effect on air and water quality;
(h) Maintain resilience to prevent regime shift, and to support recovery from cumulative impacts, including mining, that can affect source populations and communities, connectivity corridors, life-history patterns and species distributions;
(i) Sustain ecosystem services, including carbon sequestration, recognizing that many are yet to be discovered;
(k) Prevent non-negligible risks that will undermine the protection and conservation of the natural resources of the Area and the prevention of damage to the [flora and fauna]/[species] of the Marine Environment;
(l) Prevent degradation, or risk of degradation to special biological, scientific, archaeological, or historical significance of the Area or the Marine Environment. This shall include the preservation of vulnerable and unique marine ecosystems.]

Moved from:

Regulation 47 Alt:

- One sentence in para 3 (a),
- Point (i)-(iii) of para 4 (b), and
- Point (i)-(v) of para 4 (f)

The fourth revised draft text of the Facilitator of the Informal Working Group on the Protection and Preservation of the Marine Environment (ISBA/28/C/IWG/ENV/CRP.3/Rev.1) – Moved in February 2024.

To be placed:

Relevant Standard

The text:

One sentence in para 3 (a):

The EIA shall be based on relevant environmental baseline data: *"that captures temporal, (seasonal and interannual) and spatial variation"*

Point (i)-(iii) of para 4 (b):

A stage for assessment of environmental impacts in accordance with Regulations 47bis, including:

"[(i) An update to the environmental risk assessment, as developed during scoping, describing the likely impacts on the marine environment and [objects of an archaeological historical nature] and predict the nature and extent of the [Environmental Impacts and] Environmental Effects [and risks] of the Exploitation including residual impacts, cumulative [effects], including existing and foreseen mining operations, other activities and natural phenomena.

(ii) An evaluation of harmful effects on the [marine] environment and ecosystem services, [based] on [a scientific-based approach, including] clear and transparent assessment criteria and a robust evidence base, [applying] Best Available Scientific Information and where applicable, relevant traditional knowledge of Indigenous Peoples and local communities];

(iii) The presentation and evaluation of potential mitigation measures, and subsequent statement of management and monitoring commitments ([to inform preparation of the Environmental Management and Monitoring Plan), to [monitor] mitigate, [manage], avoid and minimize [harmful] effects [to the marine environment], and monitor residual impacts;]"

Point (i)-(v) of para 4 (f)

(f) A proactive consultation by an applicant or Contractor with Stakeholders at all stages, in accordance with the applicable Standards and taking into account the applicable Guidelines, which includes:

"[(i) Providing Stakeholders with access to up-to-date and comprehensive [environmental data and] information [relating to] the proposed activities [their] impacts,

(ii) Using best efforts to obtain Stakeholder comments on the draft scoping report and draft environmental impact statement for a reasonable period.

(iii) Provide a reasonable opportunity for Stakeholders to raise enquiries and to make known their views,

(iv) Make publicly available Stakeholder comments received during the consultation process, including on the applicant or Contractor's own website, and

(v) Record and address, in the scoping report and Environmental Impact Statement respectively, any substantive and relevant Stakeholder comments received.]"

Moved from:

Regulation 48

The consolidated text (ISBA/29/C/CRP.1) – Moved in November 2024.

To be placed:

Relevant Standard

The text:

48(4)(i bis): "(…) including the implications of those uncertainties for the Environmental Impact Assessment and its findings (…)".

Moved from:

DR 54, para 2, litras a-h

The fourth revised draft text of the Facilitator of the Informal Working Group on the Protection and Preservation of the Marine Environment (ISBA/28/C/IWG/ENV/CRP.3/Rev.1) – Moved in February 2024.

To be placed:

Relevant standard on the Environmental Compensation Fund

The text:

Those rules and procedures shall include, inter alia:

(a) A mechanism for financing the funds in accordance with Regulation 56, including replenishment upon disbursement;

(b) A description of how the funds and any interest generated will be managed and by whom;

(c) The process for accessing the funds;

(d) The type of damages and purposes eligible for claims against the funds in accordance with regulation 55;

(e) The standard of proof required for claims against the funds;

(f) A policy on refunds of Contractor payments into the funds;

(g) A process for determining disbursements or refunds from the funds; and

(h) The promotion of the participation of affected persons or other Stakeholders in decisions about disbursement of funds.

Moved from:

Regulation 64 bis to Regulation 64 qui

The third revised draft text of the Chair of the Open Ended Working Group on the Financial Terms of a Contract (ISBA/28/C/OEWG/CRP.6) – Moved in February 2024

To be placed:

Relevant standard

The text:

Regulation 64 bis
Determination of the applicable equalization measure
1. If a Contractor's most recent Equalization Measure Audit confirms that:

(a) the Contractor does not have any Tax Exemptions from its Sponsoring State(s); and

(b) the Contractor does not receive any Subsidies from its Sponsoring State(s),

then the Contractor shall pay the Top-up Profit Share Payment to the Authority.

2. If a Contractor's most recent Equalization Measure Audit confirms that:

(a) the Contractor does have Tax Exemptions from its Sponsoring State(s); and/or

(b) the Contractor does receive Subsidies from its Sponsoring State(s),

then the Contractor shall pay the Additional Royalty to the Authority.

3. A Contractor shall ensure that an Equalization Measure Audit shall be carried out prior to the commencement of Commercial Production and periodically thereafter as determined by the Authority in accordance with the relevant Standard and applicable Guidelines. Promptly on its completion a Contractor shall forward a copy of the Equalization Measure Audit to the [Secretary-General] [Commission].

4. A Contractor will pay for each Equalization Measure Audit, which shall be undertaken by an Independent Auditor in accordance with the relevant Standard and applicable Guidelines.

5. A Contractor and Sponsoring State(s) shall fully assist an Independent Auditor undertaking an Equalization Measure Audit and shall provide the Independent Auditor with all relevant documentation, including but not limited to the Contractor's audited accounts, any sponsorship agreement or other arrangements between the Contractor or any of its Related Entities and the Sponsoring State(s) or any other government authority in any jurisdiction, any contract, and any other documents that evidence or provide the Contractor with an actual or potential Tax Exemption or Subsidy.

6. If a Contractor or any of its Related Entities, at any time after the initial Equalization Measure Audit has been completed, enters into, or otherwise agrees, or receives the benefit of, any arrangement that could be considered to provide the Contractor with an actual or potential Tax Exemption or Subsidy, the Contractor shall immediately notify the [Secretary-General][Commission]. The [Commission] may, in accordance with the relevant Standard and applicable Guidelines, determine that an Equalization Measure Audit must be carried out.

Regulation 64 ter Additional Royalty

1. The Additional Royalty payable under Regulation 64Bis is in addition to the royalty provided for in Regulation 64.

2. If required under regulation [64Bis], a Contractor, from the [commencement of the Second Period of Commercial Production] [fifth anniversary of the date of commencement of Commercial Production], shall pay an Additional Royalty in respect of mineral-bearing ore sold or removed without sale from the Contract Area as provided for in Appendix IV to these regulations.

3. The Authority shall set an Applicable Additional Royalty Rate in respect of the Additional Royalty to be paid by the Contractor to the Authority for the Minerals which constitute polymetallic nodules, as set out in the relevant Standard and applicable Guidelines.

4. The Applicable Additional Royalty Rate shall be [8%].

5. The Additional Royalty payable to the Authority for each [royalty return period] [Calendar Year] shall be equal to X minus Y, where:

(a) X is the product of the Applicable Additional Royalty Rate multiplied by the Aggregate Relevant Metal Value for that [royalty return period] [Calendar Year]; and

(b) Y is any amount of Allowable Sponsoring State Tax that has not been deducted in previous [royalty return periods][Calendar Years] when calculating an Additional Royalty payment or a Top-up Profit Share Payment, calculated in accordance with the Standard and taking into account the Guidelines. In no circumstances shall the Additional Royalty be less than zero.

6. A payment from a Contractor to the Sponsoring State(s) is an Allowable Sponsoring State Tax, where:

(a) the payment is an actual cash payment made by the Contractor to its Sponsoring State(s) in respect of taxes and/or royalties [related to activities associated with] [accruing from seabed mining under] the exploitation contract;

(b) there is a [signed letter] [receipt] from the Sponsoring State's tax authority stating the actual cash amount paid by the Contractor to the Sponsoring State for taxes and/or royalties [related to activities associated with] [accruing from seabed mining under] the exploitation contract; and

(c) where there is a signed letter from an Independent Auditor confirming the actual cash amount paid by the Contractor to the Sponsoring State for taxes and/or royalties [related to activities associated with] [accruing from seabed mining under] the exploitation contract.

(d) The Contractor shall pay for the audit referred to in regulation [64Ter.6(c)].

(e) [Draft Regulations 27, 66, 67, 68, 69, 70, 71, 72, 73, 74, 75, 76, 77, 78, 79, 80, 81, 82 and 89 shall apply to the Additional Royalty as they apply to the royalty.

(f) Appendix IV definitions apply to the Additional Royalty as they apply to the royalty.

(g) Draft Standard sections 1 to 4 apply to the Additional Royalty as they apply to the royalty.]

Regulation 64Qua
Top-up Profit Share Payment

1. If required under regulation [64Bis], a Contractor, from the [commencement of the Second Period of Commercial Production] [fifth anniversary of the date of commencement of Commercial Production], shall pay a Top-up Profit Share Payment [as provided for in Appendix IV to these regulations].

2. The Authority shall set an Assumed CIT Rate in respect of Top-up Profit Share Payment to be paid by the Contractor to the Authority, as set out in the relevant Standard and applicable Guidelines.

3. The Assumed CIT Rate shall be [25%].

4. The Top-up Profit Share Payment payable to the Authority for each [royalty return period] [Calendar Year] shall be equal to A minus B, where:

(a) A is the Assumed CIT Rate multiplied by Profits for that [royalty return period] [Calendar Year]; and

(b) B is Total Eligible Payments for that year, calculated in accordance with the Standard and taking into account the Guidelines. In no circumstances shall the Top-up Profit Share Payment be less than zero.

5. Profits for the [royalty return period] [Calendar Year] are equal to C plus D plus E (without double counting) where:

(a) C is the sum of the Income for that [royalty return period] [Calendar Year] from Relevant Activities from all Related Entities that have not met the Inclusion Criteria;

(b) D is the sum of the Income for that [royalty return period] [Calendar Year] from all activities from all Related Entities that have met the Inclusion Criteria; and

(c). E is the Income of the Contractor for that [royalty return period] [Calendar Year].

6. Total Eligible Payments for a [royalty return period] [Calendar Year] are equal to Eligible Royalty Payments to the Sponsoring State(s) for that [royalty return period] [Calendar Year] plus Eligible Tax Payments for that [royalty return period] [Calendar Year].

7. Eligible Royalty Payments are royalties payable to the Sponsoring State(s) by the Contractor [related to activities associated with] [accruing from seabed mining under] the exploitation contract.

8. Eligible Tax Payments are equal to F plus G, where:

(a) F is the sum of Covered Taxes [incurred][paid] by all Related Entities to the Sponsoring State(s) or any other government authority in any jurisdiction arising due to Income that has been included in the calculation of Profits provided for by regulation 64Qua.5 for that [royalty return period] [Calendar Year]. Any payment made to any Sponsoring State(s) or any other government authority due to Income not included in the definition of Profits in Draft Regulation 64Qua.2 is not an Eligible Tax Payment; and

(b) G is Covered Taxes [incurred][paid] by the Contractor to the Sponsoring State(s) [or any other government authority in any jurisdiction] for that [royalty return period] [Calendar Year].

9. A Contractor shall lodge with the Secretary-General a Top-up Profit Share Return not later than 90 Days after the end of each [royalty return period] [Calendar Year]

10. A Top-up Profit Share Return shall include the following information for each [royalty return period] [Calendar Year], in accordance with the Standard and taking into account the Guidelines:

(a) the Top-up Profit Share Payment due, Profits, Income, Income included in Profits, Total Eligible Payments, Eligible Royalty Payments, and Eligible Tax Payments for that [royalty return period] [Calendar Year];

(b) for each Related Entity, whether it meets the Inclusion Criteria;

(c) for each Related Entity that meets the Inclusion Criteria, its Income, Total Eligible Payments, and Eligible Tax Payments;

(d) for each Related Entity that does not meet the Inclusion Criteria, its Income from relevant Activities, Total Eligible Payments, and Eligible Tax Payments;

(e) audited accounts for the Contractor and its Related Entities;

(f) for each Related Entity that does not meet the Inclusion Criteria, audited segmented accounts for each of those Related Entities showing the Income, Eligible Tax Payments and Covered Tax payments from Relevant Activities and separately from non-Relevant Activities; and

(g) any other information, document or anything required under the Standards, Guidelines or reasonably requested by the Authority for the administration and validation of the Top Up Profit Share Payment.

11. A Profit Share Audit shall be carried out by an Independent Auditor [employed by and reporting to the Authority and] in accordance with the relevant Standard and applicable Guidelines.

12. A Contractor will pay for each Profit Share Audit.

Regulation 64Qui
Applicable Standards for financial payments

1. The Authority shall adopt Standards [and Guidelines] providing for the effective operation of the Additional Royalty and Top-up Profit Share Payment, including but not limited to:

(a) definitions of Inclusion Criteria, Subsidies, Relevant Activities, and Tax Exemptions;

(b) applicable rates for the Assumed CIT Rate and Applicable Additional Royalty Rate;

(c) definitions of Related Entities, Income and Covered Taxes that will be based to the greatest extent practical on the Pillar 2 Global Anti-Base Erosion Model Rules, or alternatively, may directly reference

the relevant articles of the Pillar 2 Global Anti-Base Erosion Model Rules (as amended or updated from time to time);

(d) the criteria an auditor must meet to be an Independent Auditor;

(e) the criteria for the Equalization Measure Audit and Profit Share Independent Audit;

(f) the fees for the Equalization Measure Audit and Profit Share Audit;

(g) the format and required content of the Top-up Profit Share Return;

(h) the penalties, fees, and interest that the Authority shall levy on a Contractor due to non-cooperation with an Independent Auditor, late submission of a Top-up Profit Share Return, failure to submit a Top-up Profit Share Return, submission of an incomplete Top-up Profit Share Return, late payment of the Top-up Profit Share Payment and non-payment of a Top-up Profit Share Payment; and any other provisions as required.

Moved from:

Regulation 96 bis.

The third revised draft text of the Facilitator of the Informal Working Group on Inspection, Compliance and Enforcement (ISBA/28/C/IWG/ICE/CRP.2) – Moved in October 2023.

To be placed:

In the Rules of Procedure (ROP)

The text:

Decisions of the Compliance Committee shall be taken by consensus. If all efforts to achieve consensus has been exhausted, or time is of the essence, decisions may be taken by a majority of members present and voting. In the case of a tie, the Chair of the Compliance Committee shall have the decisive vote.

The Compliance Committee shall meet at regular intervals using virtual means, and in urgent cases involving possible instances of non-compliance, shall convene on short notice. Members of the Compliance Committee shall rotate among themselves on a monthly basis in order to ensure that one member is always available "on call" in cases of non-compliance that require urgent action. In addition, the Compliance Committee shall appoint its own chair and vice chair. Unless otherwise determined by the Compliance Committee, the Chair of the Commission, the Chief Inspector and a member of the Secretariat designated by the Secretary-General shall be invited to attend the meetings of the Compliance Committee but without the right to vote. The Secretary-General shall facilitate the meetings of the Compliance Committee.

Moved from:

DR 97, para 2

The third revised draft text of the Facilitator of the Informal Working Group on Inspection, Compliance and Enforcement (ISBA/28/C/IWG/ICE/CRP.2) – Moved in October 2023.

To be placed:

Inspector Code of Conduct

The text:

Actions of the Inspectors are specifically guided by the rules and obligations contained within the Code of Conduct. Below to be inserted as examples/principles the inspectors shall be guided by.

The inspectors shall be guided by transparency, accountability, probity, professionalism and non-discrimination.

Moved from:

DR 101 bis

The fourth revised draft text of the Facilitator of the Informal Working Group on Inspection, Compliance and Enforcement (ISBA/28/C/IWG/ICE/CRP.3) – Moved in February 2024.

To be placed:

General whistleblowing policy of the Authority

The text:

Whistle-blowing procedures

1. The [Compliance Committee] [Assembly, in collaboration with the Council] shall develop and implement:

(a) whistle-blowing policy for the staff of the Authority, the Inspectorate, the Enterprise, and personnel of Contractors, and

(b) a public complaints procedure to facilitate reporting to the Authority by any person of any concerns about the activities of a Contractor, or the Authority.

(2) The whistle-blowing and complaints procedures under this Regulation must:

(a) be publicly advertised,

(b) be easy to access and navigate,

(c) enable anonymous reporting,

(d) trigger investigations of reports by independent persons, and

(e) be proactively communicated by the Secretary-General to Contractors and their staff, and other Stakeholders.

3. A Contractor, [its subcontractors and their agents] shall have in operation whistle-blowing and complaints procedures relating its activities as well as those of its subcontractors and agents, which must be publicly advertised, and which should include details of the Authority's equivalent procedures to enable direct reporting to the Authority by a complainant where preferable.

Moved from:

DR 102

Moved in November 2024.

To be placed:

Rules of Procedure on inspection, compliance and enforcement

The text:

5. The Committee shall meet at regular intervals preferably using virtual means, and in urgent cases involving possible instances of non-compliance, shall convene virtually and on short notice. Members of the Committee shall rotate among themselves on a monthly basis in order to ensure that one member is always available "on call" in cases of non-compliance that require urgent action. In addition, the Committee shall appoint its own chair and vice chair. Unless otherwise determined by the Committee, the Chair of the Commission, the Chief Inspector and a member of the Secretariat designated by the Secretary-General shall be invited to attend the meetings of the Committee but without the right to vote. The Secretary-General shall facilitate the meetings of the Committee.

Moved from:

Annex IV of the Regulations

The fourth revised draft text of the Facilitator of the Informal Working Group on the Protection and Preservation of the Marine Environment (ISBA/28/C/IWG/ENV/CRP.3/Rev.1) – Moved in February 2024.

To be placed:

Relevant Standard and Guideline

According to the informal drafting group on restructuring the Environmental Impact Assessment Process, a majority of Annex IV should be moved to either Standard or Guidelines. This is laid out in Annex IV of the informal working groups report and https://www.isa.org.jm/wp-content/uploads/2024/07/Joint-text-proposal-EIA-EIS-restructure-July-2024.pdf.

In respect of the subdivision between standards and guidelines, please see the suggestions by the drafting group: https://www.isa.org.jm/wp-content/uploads/2024/07/Joint-text-proposal-EIA-EIS-restructure-July-2024.pdf

The text:

Executive summary: Information provided in the executive summary should include:

(a) A description of the proposed project, its objectives, if any, a description of alternatives analysed, and a justification of the alternative chosen;

(a) bis. A description of alternatives analysed;

(b) Anticipated Economic, financial and other benefits to be derived from the project, and the beneficiaries for each, [including humankind];

(c) A description of anticipated and cumulative, risks and impacts of the activity, as assessed by experts, (including, but not limited to, oceanographic, geological, biological, socioeconomic and sociocultural) including the expected spatial extent and duration of impacts and cumulative impacts in relation to the identified baselines, and the expected recovery rates of the system [to its original state]; [suggested deleted]

(d) Measures to minimize and Mitigate anticipated and Cumulative Environmental Impacts, support recovery of the Marine Environment from impacts,] and a description of any anticipated and cumulative residual impacts, that may occur despite Mitigation, noting how the Mitigation hierarchy is being employed in assessing impacts;

(d bis) A description of any residual impacts;

(d ter) Expected recovery rate of the Marine Environment impacted;

(e) Linkages with development of the Environmental Monitoring and Management Plan and the Closure Plan; and

(f) Consultation undertaken with other parties and Stakeholders.

Section 1

1.1. Background

Summarize briefly the project being proposed, including all main activities and locations.

1.2. Project viability

Provide information on the viability of the proposed development, its economic context and why the project is needed.

Provide understanding of the policy on alternatives being followed by the applicant. The determination of project viability may include a summary of feasibility investigations related to geophysical, engineering, geotechnical, oceanographic, biological and other components of project operations.

1.3. Project history

Summarize briefly the work undertaken up to the date the Environmental Impact Statement was finalized and ready to be submitted to the Authority. This should include a brief description of the resource discovery, the Exploration undertaken, depth zones, and any component/ system testing conducted to date. The time, location, and parties involved in Exploration work should be included. For the component/ system testing, provide a brief description of activities here. If applicable, include any report(s) related to results of component/system testing and Test Mining studies including any monitoring and assessment of the Environmental Impacts in an appendix.

1.4. Project proponent

Summarize the credentials of the proponent, including major shareholders, other contracts or licences held (including in other jurisdictions), previous and existing contracts with the Authority The proponent's technological and environmental expertise, capacity and financial resources should be outlined, and the proponent's environmental record for this work and any previous comparable works should be summarised as well as how they intend to support commitments made elsewhere in the application.

1.5. This report

This section should constitute a guide for users of the Environmental Impact Statement on how to effectively use the information contained in the Environmental Impact Statement.

1.5.1. Scope

Provide detail as to what is and is not included, and which risks have been prioritised and which received less emphasis, in this Environmental Impact Statement, based on the Scoping Report and previous feedback from the Authority and Stakeholders. Link to other supporting information.

1.5.2. Report structure

This subsection should refer to the prescribed structure of the template but should also indicate where to find information that is not obvious from the table of contents, for example in cases where the Environmental Impact Statement relates to a larger project covering several Mining Areas within the Contract Area or for an Environmental Impact Statement that contains a large volume of information (especially multiple volumes). Authorship should be provided for chapters.

1.5.3. Consultation overview

Provide overview of mandatory, as well as any voluntary stakeholder consultation processes and consultations.

Section 2

2.1. Applicable national and international legislation policies and procedures

Outline the national and international legislation, procedures and policies, for example those adopted in accordance with Article 209 of the Convention to prevent, reduce and control pollution of the Marine Environment, including the coastline, from activities in the Area, as well as applicable rules, regulations and procedures of the Authority, applicable Standards and taking into consideration Guidelines and the relevant Regional Environmental Management Plan, that is applicable to the proposed Exploitation activities in the Area, including any guidance provided for implementation and how the proposed operation will comply with them.

2.2. Other applicable national legislation, policies and regulations

Outline any other legislation, policies, regulations or Sustainable Development Bills that do not necessarily apply specifically to seabed mining or the environment, but may be relevant to the proposal (e.g., shipping regulations, maritime declarations, flag State laws, climate. This section should also refer to national regulations and laws that relate to the effects of Exploitation activities on coastal States [].

2.3. Applicable international and regional agreements

In addition to the United Nations Convention on the Law of the Sea and the 1994 Agreement relating to the Implementation of Part XI of the Convention, list the international and regional agreements applicable to the operation, (whether directly or via incorporation into domestic laws cited in section 2.2 above), such as relevant conventions, including Annexes and Guidelines, of the International Maritime Organization related to Protection of the environment, biodiversity and safety. These include the International Convention for the Safety of Life at Sea (SOLAS), the International Convention for the Prevention of Pollution from Ships (MARPOL), the Ballast Water Management Convention (BWMC), the International Convention on the Control of Harmful Anti-fouling Systems on Ships and the 1996 Protocol thereof and the Convention on Biological Diversity and the Convention on Migratory Species of Wild Animals and the international legally binding instrument under the United Nations Convention on the Law of the Sea on the conservation and sustainable use of marine biological diversity of areas beyond national jurisdiction (BBNJ); and describe how the proposed operation will comply with them.

2.4. Other applicable standards, principles and Guidelines

Discuss applicable standards and Guidelines, including those mandated by the source(s) of funding for the operations, that will be adhered to or aligned with throughout the operation, such as those of the Authority not already included in section 2.1, the Equator Principles, the Environmental Management Standards of the International Organization for Standardization, the Code for Environmental Management of Marine Mining of the International Marine Minerals Society, the Performance Standards on Environmental and Social Sustainability of the International Finance Corporation and the Standards of the Extractive Industries Transparency Initiative.

2.5. National Processes related to Sponsoring State permits

Describe any national processes followed and permits received from the Sponsoring State in relation to the Environmental Impact Assessment.

Section 3

3.1. Project area definition

3.1.1. Location

Include coordinates of the project area, detailed location maps (drawn to scale), showing the relevant sites proposed as Contract Area and Mining Area and any other features that can be usefully marked upon the map at the time of application, including the locations of Impact Reference Zones and Preservation Reference Zones as well as locations of other nearby contract areas or known seabed infrastructure. Provide general location of the project on a regional map.

[Provide a map (drawn to scale), and list the coordinates detailing the location of the project area, with the proposed Contract Area, the sequence of areas planned to be mined (Mined Areas), the Impact Reference Zones (IRZ) and Preservation Reference Zones (PRZ) for each Mined Area, and the presumed impact zones covering the benthic and pelagic extent of sediment plumes created by the Exploitation activities. Add any other features that can be usefully marked upon the map at the time of application, including the locations of other nearby contract areas or known seabed infrastructure. Provide general location of the project on a regional map.]

The map should indicate Areas of Particular Environmental Interest, Sites/Areas in Need of Protection, or other sites designated for particular status under the rules, regulations, procedures of the Authority, applicable Standards and taking into consideration Guidelines, or relevant Regional Environmental Management Plan, [as well as area-based designations] of other competent authorities, as well as information on any other known conservation or spatial measures and other uses of the Marine Environment (e.g. submarine cables and pipelines, long-standing scientific research sites and established fishing areas) in the vicinity of the project area. The map shall also identify the nearest coastal States and States that may be affected by Exploitation activities, and any adjacent [] contract sites. This map may be the same as the map supplied in Annex 1 Section II.

3.1.2. Associated activities

Describe the supporting activities and infrastructure required (e.g., transportation corridors, ports for disembarkation of vessels, ports for unloading of ore that are outside the direct mining site, anchoring areas for vessels and machinery).

3.2. Mineral resource

Provide details of the type of resource proposed for extraction (e.g. sea floor massive sulphides, polymetallic nodules, ferromanganese crusts), the type, size, shape, tonnage, volume grade and distribution pattern of the Mineral deposits. Estimates of the inferred indicated resource should be provided on the basis of the international CRIRSCO reporting template or national accepted codes (NI 43-101, JORC Code) and the official Mineral classification of the Authority (PMN, PMS and CFC).

3.3. Project components

Provide background information on the proposal and the technologies and equipment to be employed, and include the subsections set out below.

3.3.1. Project scale

Provide an overview of the spatial (horizontal and vertical) and temporal (seasonal and annual) scales of the Exploitation activities , including volumes, depth of penetration into the seabed. Provide an overview of physical, chemical, geological and oceanographic properties of material to be recovered, dewatered and deposited or discharged into the water column or back to the seabed, and the target depth range for any such discharge, [in accordance with the applicable Standards and Guidelines]. This should include an account of the [residual] area to be directly impacted over time, including the water column and seafloor beyond the Contract Area, if applicable, as well as the likely extent of any secondary impacts (e.g., sediment plumes, noise, light), which will be discussed in greater detail later.

3.3.2. Mining Equipment

Describe any equipment expected to [be used] [] for mining and support operations (e.g., mining vessels/platforms, supply vessels, barges), including the anticipated frequency of vessel movements for these activities. Also, including a description of any specific technologies developed to reduce impacts should be included.

Provide details of methodologies of exploitation (drilling, dredging, excavating, disposing of waste, constructing and operating or maintaining Installations, pipelines and other devices) and give specifications of the technologies to be employed in relation to Best Environmental Practice, including relevant diagrams and drawings, that address: the Mining Workplan, timelines and the general mining sequence, the technologies to be engaged in Exploitation activities , the depth of penetration into the seabed the specific technologies developed to reduce the direct impact of Exploitation activities (e.g. noise, light, plumes) and other details of the Exploitation activities subsea and on the surface. Describe the energy requirements of the requisite machinery.

3.3.3. Transport and materials handling

Provide a description of all methods to be used to transport the Mineral-bearing ore, including from the sea floor to the surface [and how it relates] to Best Environmental Practice, and any methods related to the trans-shipment of the Mineral-bearing ore, including transfers at sea. [] Also, [include] a description of any [measures and] technologies developed to [avoid,] reduce [and Mitigate] impacts [anywhere] in the water column ([e.g.] generation of plume at the seafloor, turbidity in the water column, addition of bottom sediments to the surface waters)[] during the different phases for collection, separation, lifting, transportation, processing, and discharge of effluents.

3.3.4. On-site processing

Provide a detailed description of the plan for processing of the mineralized material that will occur within or above the Area [and how it relates] to Best Environmental Practice, including water column activities (such as riser pipe transfer) and shipboard processing. Include a description of any methods to be used on the sea floor to separate the mineralized material from surrounding sediment and/or rock, as well as any dewatering and separation of the mineralized material at the surface.

This section should also cover any disposal of seawater[] and include the spatial layout of the activities over time which will provide a comprehensive map of the disturbance area from which to assess harm to the Marine Environment.

Include a description of the waste management, transport, disposal and discharge of sediment, wastes or other effluents into the Marine Environment and the disposal of waste from general ship operations, including the specific technologies and methods to be adopted to reduce harmful impacts of such disposal to the Marine Environment. The description should acknowledge respective [] Standards and Guidelines [of the Authority] as well as other applicable legal frameworks. Describe the management of shipboard wastes to be transported to shore-based disposal facilities, including the handling and management of hazardous materials , together with a description of the nature of such material and its transportation, storage and disposal. [] Also, a description of any specific technologies developed to reduce impacts should be included.

3.4. Commissioning

Describe the pre-production activities that will take place with regard to the establishment and set-up of the site for Exploitation activities. The management of this process (such as the establishment of safety zones around vessels) should also be described.

3.5. Construction and operating standards

Outline the design codes or certification standards to which the equipment will be or has been built, as well as the operating standards that will be applied to Exploitation activities, including [any relevant] Best Available Technology and Best Environmental Practice [guidance] issued by the [] Authority. This section should include subsections such as those set out below.

3.5.1. Design codes

3.5.2. Health and safety

3.5.3. Workforce description

This section should also outline capacity-building objectives and commitments.

3.6. Decommissioning and Closure

Describe the steps that will occur when the Exploitation activities are completed or in the event of an emergency, including the Decommissioning and removal of offshore infrastructure or the temporary suspension of Exploitation activities, under a Closure Plan.

3.7. Other alternatives considered

Provide an account of alternative options that were rigorously explored and objectively evaluated, including a no-action alternative, that were considered and rejected in favour of the current proposal with justification as to why the alternatives were rejected. Aspects should include the selection of the mine site, mine production scenarios, equipment design and engineering decisions, including technologies selected to reduce the direct impact of Exploitation activities, Environmental Impacts, financial feasibility, transport and materials handling, shipboard processing and stakeholder support. A no mining scenario must be included.

3.8 Environmental management measures to Mitigate impact

Provide a summary description of [the sufficiency of information on environmental management measures and] [] measures taken to [avoid, reduce and] Mitigate adverse impacts to the physical, chemical, geological, biological, socioeconomic and sociocultural environment, [while developing the project].

3.9. Development timetable (detailed schedule)

Provide a description of the overall timetable, from initiation and equipment construction through the implementation of the mining programme, to the Decommissioning and closure of operations. The description should include the major phases of the operation as well as the milestone dates on which relevant tasks are expected to be completed. Information on the development timetable provided under this section should clearly communicate the different phases in the development proposal. For reasons of clarity, a flow chart or a Gantt or PERT (Programme Evaluation and Review Technique) chart should be used where appropriate. Information provided in this section should include the following:

(a) The funding arrangement for the proposed activity, or whether the availability of funds is subject to this or other approvals being granted;

(a) bis Timing of expected regulatory approvals;

(b) Pre-construction activities including the development and testing of mining equipment, operations and systems in situ (if applicable);

(c) A construction schedule and staging timetable;

(d) An infrastructure development schedule;

(e) A monitoring schedule (during and after operations); and

(f) A Closure schedule.

Whether the availability of funds is subject to approvals should be noted on the timetable.

3.12. Studies completed

Describe any prior research/Exploration that could provide relevant information for this Environmental Impact Statement and future activities. These studies should be detailed in the appendices.

3.13. Methodology for Collecting Baseline Data

For each of the baseline descriptions of the Marine Environment in sections 4 [], describe the methodology for collecting and analysing baseline data, including:

spatial and temporal extent of sampling;

spatial and temporal frequency of sampling;

gear used for sampling and any modifications or calibrations conducted to the gear;

results of power analysis;

limitations of sampling and how this may impact certainty of impact assessments; and

any cooperation with other research programmes in the Area, such as with the Authority, States, other Contractors, or non-governmental organizations.

Highlight any deviations from baseline data collection requirements provided in relevant Standards and Guidelines, and the Regional Environmental Management Plan, and provide a rationale for those deviations.

Assess the sufficiency of baseline data collected and compiled in view of the aim to establish mining-related environmental change in relation to natural variability.

Raw baseline data [] used to analyse and provide a description of the Marine Environment shall be included in the Annexes of the Environmental Impact Statement or, if the data [has] been previously submitted to the Authority, the applicant may provide a link to the Authority's database where the data [is] stored or other location where such information has been made available online.

3.14. Methodology for Summarizing Baseline Data

Provide a description of the methodology used to summarize baseline data collected. This shall include:

(a) description and justification of transformations performed to the data and analyses used to summarize the data;

(b) a list of program(s) used to analyse results;

I a list of methods to determine species identification and life history; and

(d) any limitations associated with the results of the analysis.3.15. Methodology for Assessment of potential Environmental Impacts and Environmental Effects to the Marine Environment

For each assessment of potential Environmental Impacts and Environmental Effects in sections 7 and 8 and socioeconomic [and sociocultural] environment in section 9, describe the methodology used to assess impacts and Environmental Effects from proposed operations and alternatives considered in section 3.7. in line with the applicable regulations and Standards and taking into consideration Guidelines.

Data [and], predictive models used to analyse and provide a description of the Marine Environment shall be included in the Annexes to the Environmental Impact Statement or, if the data [and/or] model has been previously submitted to the Authority, other location where such information has been made available online. Each description of methodology used to assess impacts shall include:

a description and justification of analyses and models used to summarize the data; and

any limitations associated with the analysis or results.

Section 4

4.1. Key messages

Provide an overview of key content (this information can be provided in a box that contains up to 6 bullet points on either the main aspects covered or the main findings).

4.2. Regional overview

Describe the general baseline environmental conditions [and expected trends and variability] of the site and Impact Area, in accordance with the Standards and taking into consideration Guidelines on baseline data collection, including but not limited to the physical, chemical and geological oceanographic setting within a broader regional context and taking into account the applicable Regional Environmental Management Plan. This should be a brief section that includes a map. A more detailed site-specific and Impact Area description will be provided in accordance with the sections below.

4.3. Studies completed

Describe any prior research/Exploration studies (including methods used for completing the studies based on Best Available [] Techniques that could provide relevant information for this Environmental Impact Statement. This research should be detailed in the appendices [and/]or in reports attached to the appendices. [The environmental baseline data collected for the Authority, as outlined in exploration contract conditions, should accompany the Environmental Impact Statement.]

4.4. Meteorology and air quality

Provide a general Characterization of the local meteorology (e.g., wind directions and speeds, seasonal and interannual patterns and variability). Provide description of air quality, including chemical characteristics. This section may be most relevant to surface operations and the general risk assessment.

4.5. Geological properties and habitat classification

Provide a baseline description of the nature and extent of the Mineral resource and bedrock within a broader geological context. Describe the geological petrographic and geomorphological setting of the mining sites, the Impact Areas, and the designated [Impact and] Preservation Reference Zones [] including sea floor mapping (bathymetry and backscatter), high-resolution sub-bottom profiling, and sedimentation rates, and refer to submarine features such as hydrothermal vents, seamounts abyssal hills and canyons as appropriate.

Provide habitat classification using an appropriate system as prescribed in the applicable Standard, taking into consideration the Regional Environmental Management Plan.

4.6. Oceanographic setting

Provide a description of oceanographic aspects including but not limited to thermohaline conditions, optical properties and turbidity, surface, []water [column] and bottom currents regime, tides, waves, turbulence, and oceanographic fronts, eddies and climate change projections, including spatial variation at and above the site. Seasonal and longer-term variability is an important element. Detail is required on the regional setting, as well as the specific mining site and Impact Area, and the designated [Impact and] Preservation Reference Zones [], and should include changes in physical conditions and processes according to depth and horizontal distance from the proposed mine site to boundaries of the Impact Area. For activities conducted in areas of seamount chains, hydrothermal vent fields, trenches and canyons or other areas with complex bathymetry, oceanographic currents will be influence by topographic forcing and will require a more detailed oceanographic assessment, including targeted sampling programs, to determine the Impact Area. Climate change projections should also be included.

4.7. Chemical oceanographic setting

Provide a description of water mass characteristics at the mining sites, the Impact Areas, and the designated [Impact and] Preservation Reference Zones [] and above the sites at various depths of the water column, including the structure and development of the oxygen minimum zone in particular near the sea floor (up to 200m above bottom), that includes nutrients, particle loads, temperature and dissolved gas profiles, vent-fluid characteristics if applicable, turbidity, etc.

Provide a description of chemical oceanographic properties at the mining sites, the Impact Areas, and the designated [Impact and] Preservation Reference Zones [], throughout the water column and horizontally from the proposed mine site, that includes nutrients, particle loads, temperature, oxygen, salinity, density, particulate and dissolved organic matter, pH, chemical composition, including, but not limited to, concentrations of trace metals, dissolved gas profiles, depth range and characteristics of oxygen minimum zone, redox regimes, carbonate saturation, hydrocarbon and spatial (horizontal and vertical) and temporal (seasonal and interannual) variability of these properties, and vent-fluid characteristics if applicable.

4.8. Seabed substrate and sub-seabed characteristics

Provide a description of seabed substrate and sub-seabed composition (to benthic subsurface layers) of the wider mine sites, the Impact Areas, and the designated [Impact and] Preservation Reference Zones, including, but not limited to, physical, chemical, geological and oceanographic properties, specific gravity, bulk density, sediment composition, physical and chemical composition of pore-water and pore-water profiles, grain size, mineralogy sediment mechanics, dissolved and particulate organic and inorganic carbon, nutrients, carbonates, redox regimes, and spatial (horizontal and vertical) and temporal (seasonal and interannual) variability in these characteristics). Substrate composition shall be described to a depth below the seafloor prescribed in the Standard on Baseline Information and taking into consideration [the applicable] the Regional Environmental Management Plan.

4.8. bis. Rare or sensitive habitats

Identify and describe the physical and chemical characteristics of rare or sensitive habitats in line with the respective international guidelines (FAO 2009, Azores Criteria 2010) [and policy decisions (inter alia from UN and CBD) on hydrothermal vents, ridges, seamounts, as well as oceanographic fronts or eddies, abyss hills and canyons and other geological and oceanographic features.] [part in square brackets suggested deleted]

4.9. Natural hazards

Provide a description and trend analysis of variation related to applicable potential natural hazards for the site, including, but not limited to, volcanism, seismic activity, cyclone/hurricane, tsunamis, climate-related oceanographic changes and variability, slides, slumps, etc. and how these may develop in future, e.g. as a consequence of climate change.

4.10. Noise and light

Provide a description of local ambient noise and light at the seabed, throughout the water column and at the surface, including, but not limited to, light intensity, backscatter, and attenuation, bioluminescence, and spatial (horizontal and vertical) and temporal (seasonal and interannual) variability in these characteristics, indicating pertinence to fauna where known.

4.11. Greenhouse gas emissions

Provide a description and quantification of the level of gas and fluid emissions from anthropogenic activities [related to the proposed Exploitation activities in the proposed Mining Area], as well as those affecting sea floor and water-column chemistry.

[4.12. Climate Change

Description of the expected changes in physical and chemical oceanographic conditions and processes in the broader area of the mine site due to climate change.]

4.13. Summary of the existing physicochemical environment

Summarize key findings and include notes on special considerations for rare or sensitive habitats, hydrothermal vents, ridges, seamounts and oceanographic fronts or eddies, abyss hills, fracture zones and canyons and other geological and oceanographic features described in this section. It is anticipated that this summary will be up to one page and be more extensive than the key messages section.

Section 5

The description of the site should be divided by depth regime (surface, midwater from 200m depth to 50m above bottom and benthic including benthopelagic, where appropriate) or otherwise as indicated in the relevant Regional Environmental Management Plan and provide a description of the various biological components and communities that are present in or utilize the area. The Standard on baseline environmental data collection shall guide the drafting of this section by providing information on the minimum amount of detail required for an acceptable baseline description. The detail in this section is expected to be based on a prior Environmental Risk Assessment that identified, and thus the elements that need to be measured and assessed in the Environmental Impact Assessment.

5.1. Key messages

Provide key messages (overview of main findings, covered in six or fewer bullet points).

5.2. Regional overview

Provide regional context for the baseline environmental conditions [and expected trends and variability]of the mining site and Impact Areas, and the designated [Impact and] Preservation Reference Zones [], including but not limited to the general biological setting, [taking into account] in accordance with the applicable Regional Environmental Management Plan. This should be a brief section that includes a habitat classification map. A more detailed description of the mining site, the [Impact and] Preservation Reference Zones [] and Impact Area description will be provided in accordance with the sections below.

5.3. Studies completed

Describe any prior research/Exploration studies (including methods used for completing the studies based on Best Available [Science using Best Available Techniques] that could provide relevant information for this Environmental Impact Statement and future activity. This research should be detailed in the appendices [and/or in reports], and the environmental reference baseline data collected for the Authority, as outlined in the Exploration contract conditions, should accompany the Environmental Impact Statement.

5.4. Biological environment

Provide a description of biological and ecological properties in the region and the mine site, with special focus on the designated Preservation Reference Zones PRZ and the total mine site and Impact Area, including diversity, abundance, biomass, life history parameters, relevant behaviour, including feeding rates, community-level analyses, connectivity, trophic relationships, resilience, ecosystem functions and services as well as seasonality and spatial (horizontal and vertical) and temporal variability. Any work on ecosystem models and appropriate ecosystem indicators, etc., should also be presented here. This section should span the size range from megafauna to microbial communities and shall be guided by the variables given by the Standard for the establishment of baseline environmental data.

The description of the benthic [and pelagic communities and] ecosystem [with functional relationships] is structured by depth range, as this enables a direct link to the source and location of an impact. For each depth zone, (at least surface, []water [column] and [seafloor] as below) there should be an inventory of the known taxonomic/ecological groups (e.g., plankton, fish, marine mammals, marine turtles, benthic microbial invertebrates, demersal scavengers), in accordance with the Authority's Guidelines.

Describe the biological communities and ecosystem functions, structured by depth ranges in accordance with the applicable Standards and taking into consideration Regional Environmental Management Plans, [which] may encompass:

surface seawater

epipelagic zone (< 200 metres)

mesopelagic zone (200-1000 metres),

bathypelagic zone (1000 - 4000 metres),

abyssopelagic zone (4000 - 6000 metres),

hadalpelagic zone (> 6000 meters),

demersal zone (part of the water column near to and significantly affected by the seabed), and

benthic zone.

The description should evaluate the temporal and spatial variability in distribution and composition.

The description should include the size and habitat distributions of the fauna and their life history stages (such as larval and juvenile stages, which differ from the adult stage) as well as trophic pathways. Discussions of species and communities should include considerations of whether they are endemic (restricted to just the site, resource substrate or region) or are known to be rare, threatened or endangered.

Migratory and highly mobile species should be included where foraging ranges / migration pathways / management units have been noted as overlapping with proposed operations during scoping.

The climate Mitigation functions and services of the ocean shall also be described (including CO2 update and sequestration, or nutrient cycling).

5.4.1. Surface

Describe the biological communities from the surface to a depth of 200 metres, including [] plankton (phytoplankton and zooplankton, microbial plankton and organic matter), micro-nekton, surface/near-

surface fish such as tuna, and seabirds, marine turtles and marine mammals. Address factors provided in 5.4, as well as spatial and temporal variability and trends, in distribution and composition.

5.4.2. [Midwater] [Water Column]

Describe the pelagic communities and their habitat in the open water from a depth of 200 metres down to 50 metres above the sea floor, and include particulate organic matter, microbes, zooplankton, nekton, mesopelagic, bathypelagic and abyssopelagic fishes and deep-diving mammals. Particular focus should be given to gelatinous and other fragile taxa which may be most vulnerable to sediment loads.] Address factors provided in 5.4, as well as spatial and temporal variability.

5.4.3. Benthic

Describe the known benthic microbial, invertebrate and fish communities, including infauna, epifauna, benthopelagic fauna, and demersal fish and scavengers, up to an altitude of [ca.] 50 metres above the sea floor [(or the height of the nepheloid layer)] and at least 5 meters below (into the sediments). This inventory should include considerations of species richness, biodiversity, faunal densities, taxonomic uniqueness, community structures and connectivity, etc. Ecosystem functions, such as bioturbation, habitat and food [supply] and elemental cycling etc. should also be covered in this section. Address factors provided in 5.4, as well as spatial and temporal variability and patchiness.

5.4.3.bis. Rare or sensitive habitats and species

Identify and describe the biological characteristics of rare or sensitive habitats and species potentially affected by the planned Exploitation activities. The identification (as in 4.8bis) shall be guided by the respective international guidelines (FAO 2009, Azores Criteria 2010) [and policy decisions (UNGA, CBD) and include features such as hydrothermal vents, ridges, seamounts, as well as oceanographic fronts or eddies, abyss hills and canyons and other geological and oceanographic features.] Identify any unique, rare and threatened elements and their potential vulnerability to the effects of mining, outline which habitats and communities can be considered representative and their distribution, indicate existence and connectivity to the same habitats and communities outside the mine site and the potential impact zone.]

5.4.4. Alt. Ecosystem and community-level description

Summarize existing community and ecosystem-level studies. This should include integration of connectivity studies (e.g. life history and recruitment research), trophic interactions and the linkages between food energy and contaminants in the food chain (including benthopelagic couplings) and ecosystem functioning / services. Food energy linkages and the complexity of the food web should be included, giving consideration to the impacts that may result from contaminants or other disruptions to the food web. Understanding across depths should be provided. Emphasis might be placed on knowledge of trophic levels, the degree of interaction between benthic and pelagic communities, whether there are specialized predators that could be more vulnerable than generalists, and the complexity of the food web and species interactions, with a view to gaining an idea of the resilience of the system to disturbances. It is important to consider wider community relationships to enable assessments to move beyond community descriptions to incorporate potential changes in ecosystem function. [Identify, preserve and distribute to the scientific community any unique, rare and threatened elements, outline which habitats and communities can be considered representative and their distribution, indicate existence and connectivity to the same habitats and communities outside the mine site and the potential impact zone.]

5.5. Summary of the existing biological environment

Summarize the findings focusing on key ecosystems and species determined above. It is envisaged that this summary will be up to one page in length.

Section 6

6.1. Key messages

Provide key messages (overview of main findings, covered in six or fewer bullet points).

6.2. Existing uses

6.2.1. Fisheries

Relevant fisheries shall be described here to further assess the socioeconomic impacts. This should include description of areas of significance for migratory fish stocks, such as spawning grounds, nursery areas or feeding sites. Any closed fishery areas such as VME closures, MPAs, or voluntary closures must be named and taken into consideration. Provide a 'heat map' showing important fishery areas in relation to proposed operations and note any areas of interaction or cumulative impact.

6.2.2. Marine traffic

This section describes the non-project-related marine traffic occurring within the Contract Area and uses the Regional Environmental Management Plan in accordance with IALA's regulations to provide a summary of regional movements. Provide a 'heat map' showing densities of marine traffic in relation to proposed operations and note any areas of interaction or cumulative impact. Provide this per season if repeatable seasonal variation exists.

6.2.3. Submarine cables

This section describes the [known] in situ non-project-related submarine cables occurring within the Contract Area. Provide a map showing known submarine cables in relation to proposed operations and note any areas of interaction or cumulative impact.

6.2.4. Tourism

Describe areas used by cruise liners and for game fishing, sightseeing, marine mammal watching and other relevant tourism activities. Provide a 'heat map' showing densities of tourism in relation to proposed operations and note any areas of interaction or cumulative impact. Provide this per season if repeatable seasonal variation exists.

6.2.5. Marine scientific research

Outline the [past, present and planned] scientific research programmes taking place in the [region], studying the essence of phenomena and processes occurring in the Marine Environment and the interrelations between them.

6.2.5. Sociocultural values and uses

List sociocultural [values and] uses the project area (e.g., traditional navigation routes, migratory paths of culturally significant marine species, sacred sites and waters associated with ritual or ceremonial activities of Indigenous Peoples and local communities as well as known or suspected objects or sites of an archaeological or historical nature, taking into account the work of the United Nations Educational, Scientific and Cultural Organization referred to in Regulation 35(2).

6.2.6. Other

List other uses of the project area that are not related to the above (e.g., other, Exploitation projects sports and leisure).

6.2. bis Planned uses

Describe the planned uses of the area for which information is publicly available (e.g. other Exploitation Contracts, Exploration contracts, fisheries, maritime traffic, tourism, marine scientific research, submarine cables, area-based management tools).

6.3. Sites of an archaeological, historical significance

List any sites of archaeological or historical significance that are known to occur within the potential area of impact. Provide a map as applicable showing known archaeological and historical sites in relation to proposed operations and note any areas of interaction or cumulative impact taking into account the work of the United Nations Educational, Scientific and Cultural Organization referred to in Regulation 35(2).

6.4. Summary of existing socioeconomic and sociocultural environment

Summarize key findings regarding the socioeconomic and sociocultural environment. It is envisaged that this section will be up to a page in length, and more extensive than the key messages.

Section 7

It should include for each component a description of:

(a) The [hazard: detailing the] source (action, temporal and spatial duration), [probability and frequency of the risk] and [the] nature [and severity] of the disturbance;

(a) bis [Exposure characterization: evaluation and probability of exposure of the ecosystem components (see section 5) to the identified hazard,] nature, duration and extent of any actual or potential impact, including cumulative effects and taking into account ecological and biologically significant areas;

(a) ter The methods used to determine impacts (including the assumptions and limitations of any impact modelling or other analysis undertaken);

(b) Risk evaluation and management: Document how decisions were taken to determine] Measures to prevent, Mitigate and manage such impacts; and

(c) The unavoidable residual impacts that will remain, including their expected longevity.

(d) The extent to which any potential impacts and Environmental Effects may occur [beyond the Contract Area or] in areas under a State's national jurisdiction.

The detail in this section is expected to be based on the Environmental Risk Assessment carried out according to the relevant Regulations, Standards and by taking into consideration Guidelines that will have identified the main impacts, and thus the elements that need to be emphasized in the Environmental Impact Assessment.

7.1. Key messages

Provide an overview of the key content covered in section 7.

7.2. Description of potential impact categories

Provide an overview and description of the categories of potential impacts caused by [hazards owing to] the proposed Exploitation activities.

Key elements that need to be included are:

(a) The major types of potential impacts, such as habitat removal, variations in communities' composition, the creation of sediment plumes, dewatering plumes, noise, light, etc.;

(b) Descriptions of impact studies carried out during Exploration (e.g., component testing and the resulting observations from the associated monitoring);

(b) bis. Descriptions of Test Mining studies undertaken prior to the application;

(c) Descriptions of the results of any Environmental Risk Assessments, which should be included as separate reports or appendices where appropriate; and

(d) Descriptions of the methods applied to describe and quantify impact categories and assessment from impact to receptor (including the assumptions and limitations of any impact modelling undertaken);

7.2. bis. Description of impact pathways

The preferred approach for this template is to include for each receptor descriptions of:

(a) The methods used to determine the pathway from impact to receptor (including the assumptions and limitations of any impact modelling undertaken);

(b) The source(s) of impact;

(c) The nature, spatial extent and temporal extent of potential impact(s), including cumulative impacts;

(d) Measures that will be taken to avoid, minimise or Mitigate such impacts; and

(e) The unavoidable (residual) impacts that will remain, including their expected longevity and outline the measures that will be taken to ensure long-term site compliance with the environmental quality objectives, quantitative thresholds, and indicators in accordance with these Regulations and the applicable Standard, and taking into consideration Guidelines.

7.2. ter. Receptors and impacts

Receptors for which this will be done include:

(a) Meteorology and air quality

(b) Geology [and Geophysics]

(c) Physical oceanography

(d) Chemical oceanography of the mine site and Impact Area

(e) Seabed substrate characteristics

Impacts to be considered include:

(a) Sediment plume generation,

(b) Discharge of water,

(b)bis Energy flow pathways (such as hydrothermal fluid),

(c) Noise and light,

(d) Greenhouse gas emissions and climate change emissions (including estimated greenhouse gas emissions and a greenhouse gas emissions assessment where appropriate)

Effects to be considered include:

(a) Changes in temperature and salinity of water,

(b) Optical characteristics / water clarity,

(c) Turbidity / particulate loading,

(d) Sediment characteristics (including changes in the sediment composition, grain size, density and pore-water profiles),

(e) Discharge plumes (frequency, spatial extent, composition and concentration, etc.),

(f) Primary sediment plume (frequency, spatial extent, composition and concentration),

(g) Dissolved gas levels,

(h) Nutrient levels,

(i) For a sea floor massive sulphide project, the modification of vent-fluid discharges, if present, should be addressed.

7.8. Accidental events and Natural hazards

Discuss impacts of accidental events and the cumulative effects of the Exploitation activities in relation to any natural hazards that could occur, including, but not limited to, volcanism, seismic activity, cyclone/hurricane, tsunamis, etc. and the measures that will be taken to avoid, remedy or Mitigate those impacts.

7.9. Noise and light

Provide a description of the expected emissions of noise and light from the proposed operations.

7.10 Greenhouse gas emissions and climate change

Provide an assessment of gas and chemical emissions from proposed operations, relative to emissions both natural and anthropogenic activities. Subsections should include estimated greenhouse gas emissions and a greenhouse gas emissions assessment where appropriate.

7.11. Cumulative impacts

Provide a description of the source of nature and extent of any interactions between various potential Environmental Impacts and Environmental Effects across the environment. Where they may have cumulative effects, they must be considered on both spatial and temporal scales over the lifetime of the proposed Exploitation activities and in the post-Closure period and alternatives considered.

7.12. Proposed operations impacts

Cumulative within the mining site and Impact Area of the mining proposed herein.

7.13. Regional operation impacts

Cumulative between activities, actions, or natural phenomena, where known in the region.

7.14. Other issues

Outline here other, more general issues, as applicable.

7.15. Summary of residual effects

Summarize key findings on potential Environmental Impacts and Environmental Effects, environmental management measures, and any potential impacts and effects to areas under any State's national jurisdiction. A table may be a useful summary format to pull together the above elements in a simple visual mode. The table should include a column outlining the measures that will be taken to address potential Environmental Impacts and manage residual effects and ensure long-term site compliance with the environmental quality objectives, quantitative thresholds, and indicators in accordance with these Regulations and the applicable Standard and taking into consideration Guidelines.

Section 8

The analysis shall be structured by the depth ranges described in section 5 and shall for each component, provide a description of:

(a) The [hazard detailing the] source (action, temporal and spatial duration) [of the risk] and nature of the [ecological effects];

(a) bis. [Exposure characterization: evaluation and probability of exposure of the ecosystem components (see section 5) to the identified hazard,] nature and extent (temporal and spatial) of any actual or potential impact, including cumulative effects;

(a) ter. The methods used to determine impacts (including the assumptions and limitations of any impact modelling or other analyses undertaken);

(b) [Risk evaluation and management: Document how decisions were taken to determine] Measures [] to prevent, Mitigate and manage such impacts with reference to the submitted Environmental Management and Monitoring Plan; []

(c) The unavoidable residual impacts that will remain, including their significance and expected longevity.

(d) An evaluation of the impacts and effects against the applicable environmental goals and objectives, indicators and thresholds as identified in the applicable environmental Standards and Guidelines and in the applicable Regional Environmental Management Plan, [and]

(e) The extent to which any potential impacts and Environmental Effects may occur in areas beyond the Contract Area or under a State's national jurisdiction.

The detail in this section is expected to be based on the Environmental Risk Assessment, carried out according to the applicable Regulations, Standards and taking into consideration Guidelines that will have identified the main impacts, and thus the elements that need to be emphasized in the Environmental Impact Assessment.

8.1. Key messages

This section should provide an overview of the key content covered in section 8.

8.1.bis. Description of the key sources of Environmental Impacts

This section should describe the key sources of [risks and] impacts on the Marine Environment from the Exploitation activities.

8.2. Description of [hazards and the nature of] potential impact

Provide an overview and description of the categories of potential impacts caused by the hazards arising from the proposed Exploitation activities and alternatives considered. This should introduce the major types of impacts and their effects on the biotic environment, such as habitat removal, the crushing of animals, the creation of sediment plumes, noise and light, etc. and be referred to in subsequent descriptions and evaluations of potential Environmental Impacts and Environmental Effects from the hazards posed by the proposed operation and alternatives considered. A description should be included of any lessons learned from activities during the exploratory phase of the programme (e.g., mining system component tests).

Key elements that need to be included are:

(a) Description of the major types of potential impacts, such as habitat removal, the biological effects of sediment plumes and dewatering plumes, noise, light, etc. [Each impact has to be characterized by its nature, duration and extent of any actual or potential exposure, including cumulative effects and taking into account ecological and biologically significant areas, rare and fragile species and habitats.] These impact categories should be used in subsequent descriptions and evaluations of potential Environmental Impacts and Environmental Effects from the proposed operations.

(b) Descriptions of impact studies carried out during Exploration (e.g., component testing and the resulting observations from the associated monitoring);

(b) bis. Descriptions of Test Mining studies undertaken prior to the application; Descriptions of the results of any Environmental Risk Assessments, which should be included as separate reports or appendices where appropriate; and

(c) Descriptions of the methods applied to describe and quantify impact pathways and assessment in line with the applicable Standards and taking into consideration Guidelines, i.e. [the Environmental Impact Assessment] Guideline.

8.2. bis Description of impact pathways

The preferred approach for this template is to include for each impact pathway an overarching description of:

(a) The methods used to determine the pathway from impact to receptor (including the assumptions and limitations of any impact modelling undertaken);

(b) The source(s) of impact

(c) The nature, spatial extent and temporal extent of potential impact(s), including cumulative impacts;

(d) Measures that will be taken to avoid, minimise or Mitigate such impacts; and

(e) The unavoidable (residual) impacts that will remain, including their expected longevity and outline the measures that will be taken to ensure long-term site compliance with the environmental quality objectives, quantitative thresholds, and indicators in accordance with these Regulations and the applicable Standard, and taking into consideration Guidelines.

8.2.ter. [Assessment of risks] and impacts

[The Assessment of risks and impacts must be done in as much detail as possible for the following community Receptors [including]:

(a) Microbial communities

(b) Phytoplankton]

(b)bis zooplankton and micronekton

(b)ter nekton

(b)quat benthopelagic fauna, including scavengers

(c) Meiofauna (infauna / epifauna)

(d) Macrofauna (infauna / epifauna / demersal fish)

(e) Megafauna, including surface/near-surface fish such as tuna, and seabirds, marine turtles and marine mammals

As appropriate, these receptors are to be considered:

(a) at the surface (from the surface down to a depth of 200 metres)

(b) [for the water column] (from a depth of 200 metres down to 50 metres above the sea floor), [separate for the different water masses, including deep diving and migratory species]

(c) up to an altitude of 50 metres above the sea floor, including zooplankton, [scavengers] nekton, mesopelagic and bathypelagic fishes and deep-diving mammals.

Impact [categories] to be considered include:

(a) Sediment plume generation [(frequency, spatial extent, composition and concentration)],

(b) discharge [plumes]

[(b bis) Seafloor destruction]

(c) Noise and light [emissions]

(d) Greenhouse gas emissions and climate change emissions (including estimated greenhouse gas emissions and a greenhouse gas emissions assessment where appropriate).

Effects to be considered include:

(a) changes in temperature [] salinity [stratification and mixing] of water [column],

(b) optical characteristics / water clarity

(c) turbidity / particulate loading

(d) sediment characteristics (including changes in the sediment composition, grain size, density and pore-water profiles)

(e) [effects of] discharge plumes, [Contamination and pollution, turbidity, temperature change]

(f) primary sediment plume (frequency, spatial extent, composition and concentration)

(g) dissolved gas levels

(h) nutrient levels

(i) For a sea floor massive sulphide project, the modification of vent-fluid discharges, if present, should be addressed.

8.6. [Summary of] Ecosystem/community level [effects caused by the project]

[Analyse and] describe [potential and probable] effects on the ecosystem [and ecosystem dynamics during the term of contract and long-term].

8.6.1. Potential [other effects and] impact to be addressed

8.6.1.1. Noise and light

Provide a description of the expected emissions of noise and light from the proposed operations and any potential Environmental Effects, especially any impacts of noise on avoidance, masking and availability of prey (e.g., on marine mammals) and fish. [Indicate the range of light pollution and potential effects in the different depths.] Provide a description of the measures that will be taken to ensure compliance with applicable environmental quality objectives and quantitative thresholds for noise and light levels for relevant fauna, in accordance with these Regulations and the applicable Standard, and taking into consideration Guidelines.

8.6.1.2. Greenhouse gas emissions and climate change

Effects of mining on ocean climate Mitigation functions and services should be described (including any anticipated alteration of CO2 uptake and sequestration, or nutrient cycling.)

[8.6.2. Environmental management measures to Mitigate impacts]

Moved to section “8.7 bis”

8.7. Cumulative effects

The nature and extent of any interactions between various impacts where they may have cumulative effects must be considered. This should include an evaluation of the spatial and temporal intensity of mining and its effects on other impacts including existing uses considered in the Assessment and described in Section 9 of the Environmental Impact Statement as well as an evaluation of the resulting cumulative effects to the ecological balance of the Marine Environment, including the spatial and temporal extent of such effects. Describe how spatial and temporal cumulation will differ between faunal groups and different habitats.

Provide a description of the source of nature and extent of any interactions between various potential Environmental Impacts and Environmental Effects across the environment. Where they may have cumulative effects, they must be considered on both spatial and temporal scales over the lifetime of the proposed Exploitation activities and in the post-Closure period and alternatives considered.

8.7.1. Proposed operations effects

Cumulative effects [of the proposed mining with all other known influences and effects, including from other Exploitation activities,] within the scope of the site and Impact Area of the mining proposed herein.

8.7.2. Regional operations effects

Cumulative effects [on a regional scale, due to Authority-related and other] activities to be analysed by the Secretariat according to the [Regional Environmental Management Plans. The analysis will periodically be provided in a regional quality status report.]

[8.7 bis. Mitigation hierarchy measures to avoid, reduce and Mitigate the effects caused by the project

8.7bis.1 Decision-making

Explain here how decisions were taken to Mitigate Environmental Effects, and what were the goals to be achieved.

8.7bis.2 Measures taken to avoid, reduce and Mitigate effects, including alternatives

8.7bis.3 Expected unavoidable residual effects

8.7bis.4 Restoration and Rehabilitation measures

Practicable Restoration and Rehabilitation of the project area – approach. The Restoration and Rehabilitation of the project area should be considered as a part of the Mitigation hierarchy. At this stage in the Environmental Assessment Process, there might be no final knowledge on the potential of Restoration and Rehabilitation in the area, so a plan should be proposed to develop this knowledge throughout the lifespan of the project and to prepare the decision on the issue at the end of the project. This should be done in accordance with applicable Standards and taking into consideration Guidelines.]

8.8. Summary of residual effects

Summarize key findings on potential Environmental Impacts and Environmental Effects, environmental management measures, residual effects, and any potential impacts and effects to areas under any State's national jurisdiction. Information on potential recovery times following disturbance and the longevity of residual effects should be included. This will give readers an understanding of the temporal component and efficacy of proposed Mitigation measures. A table may be a useful summary format to pull together the above elements in a simple visual mode. The table should include a column outlining the measures that will be taken to address potential Environmental Impacts and residual effects and ensure long-term site compliance with the environmental quality objectives, quantitative thresholds, and indicators in accordance with these Regulations and the applicable Standard and taking into consideration Guidelines.

[8.9 Practicable restoration and rehabilitation of the project area]

Moved to section "8.7 bis.4."

Section 9

9.1. Key messages

This section should provide an overview of the key content covered in section 9.

9.1. bis. Description of potential impact categories

Provide an overview and description of the categories of potential impacts caused by the proposed Exploitation activities. Key elements that need to be included are:

(a) the major types of potential impacts, such as habitat removal, the creation of sediment plumes, noise, light, etc. These impact categories should be used in subsequent descriptions and evaluations of potential Environmental Impacts and Environmental Effects from the proposed operations;

(b) Descriptions of impact studies carried out during Exploration (e.g., component testing and the resulting observations from the associated monitoring);

(c) bis Descriptions of Test Mining studies undertaken prior to the application;

(d) Descriptions of the results of any Environmental Risk Assessments, which should be included as separate reports or appendices where appropriate; and

(e) Descriptions of the methods applied to describe and quantify impact pathways and assessment.

9.1. ter. Description of impact pathways

The preferred approach for this template is to include for each impact pathway an overarching description of:

(a) The source;

(a)ter The methods used to determine impacts (including the assumptions and limitations of any impact modelling undertaken);

(a)bis The nature, spatial extent and temporal extent of potential impacts, including cumulative impacts;

(b) Measures that will be taken to avoid, minimise or Mitigate such impacts, including a comparative analysis of how measures taken may differ across alternative operations considered;

(c) The unavoidable (residual) impacts that will remain, including their expected longevity. The detail in this section is expected to be based on the scoping Environmental Risk Assessment that will have identified the main impacts, and thus the elements that need to be emphasized in the Environmental Impact Assessment; and

(d) The extent to which any potential impacts and effects may occur in areas under a State's national jurisdiction.

9.2.Impact identification

9.2.1. Impacts on existing human uses

For each of the following marine uses, describe:

Potential impacts and effects and issues to be addressed;

Environmental management measures to Mitigate impacts and effects;

Residual impacts and effects; and

Potential impacts and effects in areas under any State's national jurisdiction.

9.2.1.1 Fisheries and biological conditions

A description of potential impacts, e.g., effects from light and noise on fisheries and biological conditions, with proposed management measures and a description of residual impacts.

9.2.1.2bis Submarine cables

A description of potential impacts on [known] non-project-related submarine cables occurring within the project area, along with proposed management measures and a description of residual impacts.

9.2.1.3 Tourism

A description of potential impacts and issues to be addressed, along with proposed management measures and a description of residual impacts.

9.2.1.4 Marine scientific research

A description of potential impacts and issues to be addressed, along with proposed management measures and a description of residual impacts, according to the IALA's regulations.

9.2.2 Impacts on Sociocultural values and uses

A description of potential impacts and issues to be addressed pertaining to sociocultural uses of the area (e.g., traditional navigation routes, migratory paths of culturally significant marine species, sacred sites and waters associated with ritual or ceremonial activities of Indigenous Peoples and local communities), along with proposed management measures and a description of residual impacts.

9.2.3 Impacts on Ecosystem Functions and Services

A description of potential impacts of the operation on any ecosystem functions and services, for example, carbon burial and sequestration, taking into account the relevant Guidance.

9.2.4 Other impacts

List other potential impacts that are not related to the above (e.g., submarine cables, other Mineral Exploration or Exploitation projects).

9.2.5 Impacts on Planned uses

Describe the potential impacts on planned uses of the area for which information is publicly available (e.g. fisheries, maritime traffic, tourism, marine scientific research, submarine cables, area-based management tools).

9.2.6 Impacts on Area-based management tools

A description of potential impacts and cross-boundary issues to be addressed, along with proposed management measures and a description of residual impacts.

9.3. Impacts on Sites of an archaeological or historical nature

Describe, as applicable, potential impacts to sites of archaeological, or historical significance that are known to occur within the potential area of impact, along with proposed management measures, taking into account the work of the United Nations Educational, Scientific and Cultural Organization referred to in Regulation 35(2).

9.4. Gender Impact analysis

Assess and analyse how the proposed operations may impact on gender roles and relationships.

9.5. Summary of socioeconomic and sociocultural environment

Summarize findings on management measures, residual effects, and any potential impacts and effects, (including to sociocultural conditions). A table may be a useful summary format to pull together the above elements in a simple visual mode. Potential cumulative effects should also be included.

Section 10

For each component include:

(a) The nature and extent of any impact;

(b) Measures that will be taken to avoid, Mitigate or minimize such impact; and

(c) Residual impacts.

10.1. Extreme weather

For example: hurricanes/cyclones.

10.2. Natural hazards

For example: volcanic eruptions, seismic events.

10.3. Accidental events

For example: leakage or spillage of hazardous material, fires and explosions, and collisions, including potential loss of equipment.

10.4. Maritime safety and interactions with shipping

Provide a description of predicted maritime safety issues and potential interactions with other vessels from the proposed activities with reference to compliance with the relevant conventions.

10.5. Emergency Response and Contingency Plan

Provide a description of an Emergency Response and Contingency Plan.

10.6. Waste management

Provide a description of proposed vessel waste management, with reference to compliance with relevant conventions, legislation and principles, and methods of cleaner production and energy balance.

10.7 Balast Water management

Provide a description of proposed vessel balast water management where applicable, with reference to compliance with relevant rules and principles, and methods of cleaner production and energy balance.

[10.8. Hazards arising from natural, accidental and discharge events

Discuss any impacts of accidental events and the cumulative effects of the Exploitation activities and natural hazards, and the measures that will be taken to avoid, remedy or Mitigate those impacts.] [suggested deleted]

Section 10 bis

Identify any relevant areas of uncertainty and gaps in knowledge and their implications for the Environmental Impact Assessment and its findings

Section 11

11.1. Organizational structure and responsibilities

This section should show how the Contractor's environmental team fits into its overall organizational structure. Responsibilities and professional qualifications of key personnel should be outlined.

11.2. Environmental management system

A full Environmental Management System shall exist at the time the Environmental Impact Statement is submitted. The applicant has to demonstrate that it will be capable of managing appropriate relevant environmental questions and outline the standards that will be considered and/or aligned with when developing the system for the project.

11.3 Environmental Management and Monitoring Plan

An Environmental Management and Monitoring Plan will be submitted as a separate document for the Authority's approval prior to the commencement of Exploitation activities. This section should provide an overview of what the Plan would entail.

11.3.1 Mitigation and management

Summarize the Mitigation and management measures that will be taken, based on the impact minimization and Mitigation analysis undertaken as part of the Environmental Impact Assessment, and as described in the Environmental Impact Statement in Sections 7, 8, and 9.

11.3.3 Closure Plan

A Closure Plan will be submitted as a separate document for the Authority's approval prior to the commencement of Exploitation activities . However, this section should provide an overview of what the Closure Plan will entail, including Decommissioning, continued monitoring and Rehabilitation measures, if applicable.

11.4 Reporting

Outline how data collected at the mine site and Impact Area will meet reporting requirements and best scientific practices outlined in Annex VII on the Environmental Management and Monitoring Plan.

11.4.1 Monitoring

Outline how [information and] the results of monitoring studies will be reported to the Authority, as well as the frequency and format of data releases in accordance with the regulations and Standards and taking into consideration Guidelines.

11.4.2 Incident reporting

Outline how Incidents will be reported and managed.

Section 13

13.1 Consultation methods

Provide a description of the nature and extent, participation and outcomes of consultation(s) that have taken place with Stakeholders, and how their comments have been addressed in the Environmental Impact Assessment. This will include the description of the mechanisms [and criteria] used to manage the diversity of Stakeholders addressed and comments provided.

This includes describing the mechanism(s) used to consult with different groups and how this aligns with the applicable Standards and Guidelines, also incorporating criteria for Preservation Reference Zones and Impact Reference Zones.

13.2 Stakeholders

List Stakeholders that have been consulted and explain the process by which Stakeholders were identified. This should include a brief description of the Stakeholders and a historic overview of any previous activities conducted by the Stakeholders in The Area.

13.3 Public consultation and disclosure

Provide a description of the goals and consultation workshops/meetings that occurred prior to the preparation of the report, including outlining any concerns and comments made by Stakeholders and how these will be addressed, and, if not, describe the reasons for that decision.

13.4 Commission consultation

Summarize the Commission's recommendations on the Scoping Report and proposed Terms of Reference for the applicant's Environmental Impact Assessment submitted to the Commission, and justification for any deviation either from those submitted Terms of Reference, or from the Commission's recommendations.

13.5. Stakeholder [and coastal State] Consultation

Describe how comments received under Stakeholder consultation have been or will be taken into account, or why they have not been taken into account, and the reasons for that decision. The summary should be based on the detailed response of the applicant to each consulted party and be available for review.

13.4 Continuing consultation and disclosure

Outline any further consultation with Stakeholders that has been deemed necessary and is being planned.

Section 14

Including the decision-makers and Stakeholders, have a clear understanding of the intention behind the use of certain terms in the Environmental Impact Statement. The glossary should be included in the table of contents for the Environmental Impact Statement and referenced in the introduction section.

Section 15

If independent scientists or other experts were involved in any of the work, they should be listed. [] The names, current and validated contact information, occupational qualifications and their role in the generation of the Environmental Impact Statement of such people should also be included. A statement that those individuals so named concur with the content of the report should be included. Any conflict of interest must be identified, disclosed in detail in this section including the way it was and continues to be managed.

Moved from:

Annex VI, A, paras 2 and 3

The revised draft text of the President (ISBA/28/C/WOW/CRP.2) – Moved in February 2024.

To be placed:

Standard and Guidelines on Health and Safety Plan

The text:

2. The Health and Safety Plan must contain, as a minimum:

(a) Requirements regarding minimum age and medical fitness for all personnel working and living on a vessel or installation;

(b) Requirements for the competency and training, including mandatory safety training, for all personnel working and living on a vessel or installation;

(c) A description of the measures taken to ensure that the vessel or installation is appropriately and sufficiently staffed in order to ensure that the vessel or installation is operated safely, efficiently and with due regard to security under all conditions;

(d) Information about the number and positions of all personnel working or living and working on a vessel or installation;

(e) Details of shore-based management providing assistance to the vessel or installation, including the designated person with responsibility and authority for monitoring the safety, health and security of operations and with direct access to the highest level of management;

(f) Definitions of levels of authority and effective lines of communication between and among shore staff and personnel on board vessels and installations;

(g) A description of the duties of the master and/or the person designated by the master to take responsibility for the implementation of and compliance with the occupational safety and health plan;

(h) A description of an effective fatigue management strategy determining operational workload requirements matching onboard manning levels and onshore support resources as well as work schedules indicating the maximum hours of work or minimum hours of rest for all personnel living and working on a vessel or installation;

(i) Information about the medical care available on the vessel or installation and the communication and response plans in the event that additional or onshore medical care is required;

(j) Arrangements and procedures for the safe transfer of personnel to and from or between vessels or installations;

(k) A description of foreseeable occupational hazards, an assessment of their likelihood and consequences, and associated preventative and control measures;

(l) Details regarding procedures for hazard identification and risk assessment on vessels or installations and the preventive and protective measures adopted based on the outcomes of those procedures;

(m) Details of procedures, plans and instructions for key operations concerning the safety of the personnel, vessels and installations;

(n) A description of the equipment and tools to be provided to ensure that all operations are conducted in such a manner as to minimize any adverse effects on the occupational safety and health of personnel to the extent necessary;

(o) Identification of critical equipment and technical systems that may result in hazardous situations;

(p) A description of crew accommodations and recreational facilities enabling and promoting the personnel's health and well-being, and information on their conformity to relevant rules, regulations and standards;

(q) Details of procedures to ensure that the vessels or installations are maintained in conformity with the provisions of the relevant rules and regulations and with any additional requirements that may be established;

(r) Details of audit and review processes, and information on procedures for the implementation of corrective action, including measures intended to prevent recurrence;

(s) Information on procedures ensuring that non-conformities, accidents and hazardous situations are reported, investigated and analysed with the objective of improving safety and prevention;

(t) Details of the procedures for the communication of information between the company/owner/operator and competent authorities and organizations, including the Authority;

(u) Details of the warning mechanisms intended to alert the Authority, together with the type of information to be contained in the warning;

(v) Details regarding consultations with personnel on vessels or installations and, where appropriate, the representative workers' organizations, on the preparation and implementation of the vessel's or installation's occupational safety and health policies and programmes and the procedures to ensure the continuous improvement of the policies to take into account changes in practice and technology;

(w) The occupational safety and health policy and programme for each vessel or installation engaged in activities in the Area; and

(x) Procedures for the periodic review of the plan and for its updating.

3. An occupational safety and health policy and programme for a vessel or installation engaged in activities in the Area must contain the following to ensure a safety culture on board the vessel or installation:

(a) An occupational health, safety and environmental awareness plan to inform all personnel engaged in activities in the Area as to the occupational and environmental risks that may result from their work and the manner in which such risks are to be dealt with;

(b) A plan for the communication of the occupational health, safety and environmental awareness plan;

(c) A training plan to establish a safety culture for occupational safety and health for the vessel or installation, including mandatory personal safety training and specific task and equipment training, including the labelling of safety-related equipment;

(d) The roles and responsibilities of:

(i) Masters, officers or other personnel responsible for safety and health, including occupational safety and health on a vessel or installation;

(ii) The vessel or installation safety committee;

(iii) The worker representative on the safety committee.

(e) Requirements, policies and training on the vessel or installation to address the following:

(i) Food and water safety;

(ii) Hygiene and sanitary facilities;

(iii) Measures to prevent disease and vermin;

(iv) Safety, and structural and design features of the vessel or installation, including means of access and asbestos-related risks;

(v) Provision of personal protective equipment for personnel;

(vi) Machinery;

(vii) Ambient factors in the workplace and living accommodation on the vessel or installation, including exposure to noise, vibration, lighting, ultraviolet light, non-ionizing radiation and extreme temperatures;

(viii) Air quality, ventilation and the effects of other ambient factors, including tobacco smoke;

(ix) Structural features of the vessels or installations and means of access, and materials;

(x) Special safety measures on and below deck on vessels and installations;

(xi) Loading and unloading of equipment;

(xii) Fire prevention and fire-fighting;

(xiii) Anchors, chains and lines;

(xiv) Dangerous cargo and ballast;

(xv) Work in enclosed spaces;

(xvi) Exposure to biological hazards;

(xvii) Exposure to radiological hazards;

(xviii) Exposure to chemicals;

(xix) Ergonomic hazards;

(xx) Physical and mental effects of fatigue;

(xxi) Effects of drug and alcohol dependency;

(xxii) Communicable diseases;

(xxiv) Emergency and accident response;

(xxv) Harassment and bullying;

(xxvi) Safety and occupational safety and health training of younger workers and trainees on the vessel or installation;

(xxvii) Protection for lone and isolated workers;

(xxviii) Protection of women workers and workers from vulnerable groups;

(xxix) Measures regarding the safety, and occupational safety and health, of any temporary workers.

4. The occupational safety and health policy and programme must also address:

(b) Procedures for the investigation, reporting and follow-up to any safety or occupational safety and health incidents, including occupational diseases;

(c) Protection of the privacy of personal and medical data of personnel.

Moved from:

Annex VI, B, para 2

The revised draft text of the President (ISBA/28/C/WOW/CRP.2) – Moved in February 2024.

To be placed:

Relevant standard and guidelines on Maritime Security Plan

The text:

2. The Maritime Security Plan must contain, as a minimum:

(a) Measures designed to prevent weapons, dangerous substances and devices that are intended for use against persons, vessels, installations or ports, and whose carriage is not authorized, from being taken on board the vessel or installation;

(b) An identification of the restricted areas, and measures for the prevention of unauthorized access to them;

(c) Measures for the prevention of unauthorized access to the vessel or installation;

(d) Procedures for responding to security threats or breaches of security, including provisions for maintaining critical operations of the vessel or installation, or vessel/port interface;

(e) Basic security measures for security level 1 (the level for which minimum appropriate protective security measures shall be maintained at all times), both operational and physical, that will always be in place;

(f) Additional security measures that will allow the vessel or installation to progress without delay to security level 2 (the level for which appropriate additional protective security measures shall be maintained for a period of time as a result of heightened risk of a security incident) and, when necessary, to security level 3 (the level for which further specific protective security measures shall be maintained for a limited period of time when a security incident is probable or imminent, although it may not be possible to identify the specific target);

(g) Procedures for evacuation in case of security threats or breaches of security;

(h) Duties of personnel on board vessels and installations who are assigned security responsibilities, and duties of other shipboard personnel relating to security aspects;

(i) Procedures for auditing the security activities;

(j) Procedures for training, drills and exercises associated with the plan;

(k) Procedures for interfacing with port facility security activities;

(l) Procedures for the periodic review of the plan and for its updating;

(m) Procedures for reporting security incidents;

(n) Identification of the vessel or installation security officer;

(o) Identification of the company security officer, including 24-hour contact details;

(p) Procedures to ensure the inspection, testing, calibration, and maintenance of any security equipment provided on board;

(q) Frequency of testing or calibration of any security equipment provided on board;

(r) Identification of the locations where the activation points of the vessel or installation security alert system are provided (when activated, a ship security alert system automatically transmits a ship-to-shore security alert to a competent authority,

(s) Procedures, instructions and guidance regarding the use of the vessel or installation security alert system, including testing, activation, deactivation and resetting, and regarding the limitation of false alerts.

(t) Cyber risks.

3. The Maritime Security Plan must establish that:

(a) All personnel on board vessels and installations have received security-related familiarization and security-awareness training or instruction;

(b) Personnel on board vessels and installations with designated security duties have attended a training course on those duties.

Moved from:

Annex X
Design Criteria for Impact Reference Zones and Preservation Reference Zones.

Revised Consolidated Text (ISBA/30/C/CRP.1) – Moved in November 2024

To be placed:

In the relevant Guidelines

The text:

3. To designate representative IRZs/PRZs requires characterisation of the pelagic and benthic environment including all sub-habitats that may be impacted by mining operations, and determination of regional distributions and patterns of connectivity of communities. Temporal variation must also be evaluated over multiple years.

5. All types of impact identified in the Environmental Impact Statement, must correspond with IRZ/IRZs which will enable the Contractor to monitor these impacts. Designation of multiple IRZs is possible for this purpose.

12. Abiotic and biotic parameters, within the IRZ and PRZ will need to be monitored to quantify impacts. This includes but is not limited to monitoring species diversity and function. To establish an adequate baseline and to find suitable indicator species (e.g., the sensitive species that will suffer most from an impact, key-stone species that are crucial for ecosystem processes, or species which abundance indicates a disrupted ecosystem functioning), it will be necessary to catalogue most species in the IRZ and PRZ in

question and unravel their functions. This will require sufficient sampling effort to collect sample sizes that allow for a meaningful comparison (i.e., with high statistical power).
13. The longevity of PRZs and duration of post-monitoring are important. The duration of post-mining monitoring should last until monitoring results show a trajectory towards recovery. Post-mining monitoring should be described in the final EMMP and/or Closure Plan no measurable difference between IRZ and PRZ can be detected anymore.

13 Alt. Post mining monitoring shall continue until gecosystem function returns to the level of the pre-mining condition agreed within the EMMP/Closure Plan and taking into account the time taken to reach a new equilibrium state.

15. To designate representative IRZs/PRZs requires characterisation of the pelagic and benthic environment including all sub-habitats that may be impacted by mining operations, and determination of regional distributions and patterns of connectivity of communities. Temporal variation must also be evaluated over multiple years.
16. An applicant will need to be able to demonstrate knowledge of species' ecological requirements (e.g. for successful reproduction); an average population density alone will not suffice.

Moved from:

Reporting from the intersessional working group on stakeholder consultation

To be placed:

Suggestions on content for the standard and guidelines on stakeholder consultation

The text:

Guidelines *will need to explain that such engagement should include meetings, workshops, webinars and other forms of engagement necessary, and guidance on how to undertake such engagement.*

Moved from:

Appendix II: Schedule of annual, administrative and other applicable fees

The revised draft text of the Co-Facilitators of the Informal Working Group on Institutional Matters (ISBA/28/C/IWG/IM/CRP.2) - Moved in February 2024.

To be placed:

Council decision on fees

The text:

Prescribed amount (United States dollars)

Annual fees	
Submission of annual report (Regulation 84)	[ ]
Application and other fees	
Application for the approval of a Plan of Work (Regulation 7(3)(j))	[ ]
Renewal of an Exploitation Contract (Regulation 20)	[ ]

Transfer of an interest in an Exploitation Contract and approved Plan of Work (Regulation 23)	[ ]
Use of a contract or approved Plan of Work as security (Regulation 22)	[ ]
Temporary suspension in Commercial Production (Regulation 29)	[ ]
Modification to a Plan of Work (Regulation 57)	[ ]
Approval of a revised/Final Closure Plan (Regulations 59(2) and 60)	[ ]
Approval of a revised Environmental Management and Monitoring Plan (Regulation 52(8)(b))	
[Other]	

Moved from:

Appendix III: Monetary Penalties

The revised draft text of the Co-Facilitators of the Informal Working Group on Institutional Matters (ISBA/28/C/IWG/IM/CRP.2) - Moved in February 2024.

To be placed:

Council decision on penalties

The text:

Penalty in respect of any under declaration or underpayment in respect of a royalty

Penalty in respect of any failure to deliver or furnish a royalty return

Penalty in respect of false royalty returns and information

Failure to submit an annual report according to Regulation 38

Other: to be considered e.g. relating to Notifiable Events (failure to notify); environmental & other Incidents; not achieving/exceeding environmental thresholds. A desktop study should be performed in connection with monetary penalties under comparable national regimes for extractive industries, including those relating to a broader range of breaches of the environmental provisions and failure to adhere to the Plan of Work annexed to an exploitation contract.

Moved from:

Appendix IV: Determination of a royalty liability

The third revised draft text of the Chair of the Open Ended Working Group on the Financial Terms of a Contract (ISBA/28/C/OEWG/CRP.6) – Moved in February 2024.

For explanation boxes and comments please refer to the Chair's text.

To be placed:

Relevant standard and guidelines on the royalty mechanism

The text:

In the present appendix:

Aggregate Relevant Metal Value means the aggregate of the Relevant Metal Values for each Relevant Metal calculated in accordance with the applicable Standard.

Applicable Royalty Rate means the royalty rate set out in the applicable Standard, which may be by a decision of the Council following any review under these regulations.

Average Listed Price means the average listed price for a Relevant Metal, calculated in accordance with the applicable Standard.

Average Grade means the average metal content of the Relevant Metal calculated in accordance with the applicable Standard.

Relevant Metal means a metal contained in the mineral-bearing ore identified and determined in accordance with the applicable Standard.

Relevant Metal Value(s) means the gross market value(s) of a Relevant Metal calculated in accordance with the applicable Standard.

Valuation Point is the first point of transfer of the mineral-bearing ore by delivery onto a vessel transporting the ore out of the Contract Area. In the instance where the transfer of mineral-bearing ore onto another vessel does not take place, the valuation point shall be on board the original vessel before it leaves the Contract Area.

1. The Authority shall set a royalty rate

The Authority shall set an Applicable Royalty Rate in respect of the royalty to be paid by the Contractor to the Authority for Minerals which constitute polymetallic nodules, as set out in the applicable Standard and ~~taking into account the any~~ Guidelines.

[1.bis. Additional Minerals

Additional Minerals shall be included in the calculation of the royalty should evidence become available that such minerals are being profitably extracted.

The Commission shall recommend to the Council for decision whether additional Minerals shall be included.

The inclusion of additional Minerals in the determination of the royalty shall constitute a review of rates of payments as described in Regulation 82.]

2. Calculation of royalty payable

The royalty payable to the Authority for each royalty return period shall be [the product of the Applicable Royalty Rate multiplied by the Aggregate Relevant Metal Value for that royalty return period] calculated in accordance with the Standard and taking into account the Guidelines.

Moved from:

Enclosure III: Draft Standard on the Financial Terms of a Contract

The revised draft text of the Co-Facilitators of the Informal Working Group on Institutional Matters (ISBA/28/C/IWG/IM/CRP.2) - Moved in February 2024.

For explanation boxes and comments please refer to the Chair's text.

To be placed:

Standard on the Financial Terms of a Contract

The text:

In the present Standard:
First Period of Commercial Production means a period of 5 years following the date of commencement of Commercial Production.

Listed Price means:

1. For copper, nickel and cobalt: the price (in United States dollars), quoted for the Relevant Metal in the Official Listing relating to that Relevant Metal for the relevant period.

2. For manganese: the price (in United States dollars), quoted for manganese ore in the applicable Official Listing for the relevant period.

Official Listing means the quoted or published price of the Relevant Metals as specified for each Relevant Metal in the Guidelines.

Second Period of Commercial Production means [a period of [x] years commencing on the day following the last day of the First Period of Commercial Production.] [the period commencing on the day following the last day of the First Period of Commercial Production.]

[Third Period of Commercial Production means the period commencing on the day following the last day of the Second Period of Commercial Production.]

Shipment means each shipment of mineral-bearing ore by a vessel transporting the ore out of the Contract Area.

Relevant Metals

1. For the purpose of polymetallic nodules and appendix IV, [during the First Period of Commercial Production] Relevant Metals will be copper, nickel, cobalt and manganese [only].
[2. During the Second Period of Commercial Production and subsequent periods of Commercial Production relevant metals will include copper, nickel, cobalt and manganese and may include other metals and substances, but only if there is substantial evidence that such other metals and substances are being processed from mineral-ore mined under the Exploitation Contract and are substantially increasing the value of polymetallic nodules mined in the area and in such case additional Standards will be published providing for the inclusion of these other metals and substances in aggregate relevant metal value.]

Calculation of Average Grade

1. In respect of each Relevant Metal, the Average Grade shall be the metal content of that Relevant Metal expressed as a percentage per dry metric ton of mineral-bearing ore in a Shipment.

2. The metal content of each Relevant Metal shall be determined based on samples of the mineral bearing ore collected at the Valuation Point in accordance with the sampling and assaying procedures set out in the Standards and any Guidelines.

Calculation of Average Listed Price

The Average Listed Price for a Relevant Metal shall be the Listed Price for the Relevant Metal for the month during which loading of that Shipment commenced.

Calculation of Relevant Metal Value and Aggregate Relevant Metal Value

1. The value of the mineral-bearing ore for a royalty return period shall be the Aggregate Relevant Metal Value for that period.

2. The Aggregate Relevant Metal Value for a royalty return period shall be the aggregate of the Relevant Metal Values for each of the Relevant Metals for that period.

3.The Relevant Metal Value for each Relevant Metal during the royalty return period shall be calculated as follows:

(a) For each Shipment: Quantity x Average Grade of the Relevant Metal x Average Listed Price for the Relevant Metal
(b) For the royalty return period: the aggregate of the Relevant Metal Values for each Shipment [which commenced loading] in the royalty return period

Where:

(i) Quantity means the quantity (in dry metric tons) of the mineral-bearing ore in each Shipment [which commenced loading] in a royalty return period and calculated in the light of the applicable Guidelines.
(ii) Average Grade is calculated in accordance with this Standard and in the light of the applicable Guidelines.
(iii) Average Listed Price is calculated in accordance with this Standard and in the light of the applicable Guidelines.

Determination of the Applicable Royalty Rate

The Applicable Royalty Rate shall be:

1. For the First Period of Commercial Production, [~~2~~ 3 %]; and

[1. Alt. For the First Period of Commercial Production, [12%]; and]

2. [For][From] the Second Period of Commercial Production, a rate no less than [~~5~~ 7.5 %] and no greater than [~~9~~ 12.5 %] determined by reference to the table below and the Notional Relevant Metal Value:

[2. Alt. [For][From] the Second Period of Commercial Production, a rate no less than [12%] and no greater than [25%] determined by reference to the table below and the Notional Relevant Metal Value:]

Where:

(a) Notional Relevant Metal Value means the [average Aggregate Relevant Metal Value per dry metric ton across all Shipments during the royalty return period].
(b) The [average Aggregate Relevant Metal Value per dry metric ton across all Shipments during the royalty return period] shall be calculated by dividing the Aggregate Relevant Metal Value for that royalty return period by the total Quantity shipped during that royalty return period.

Notional Relevant Metal Value [*(as may be adjusted in accordance with the Standards and Guidelines)*]	**Applicable Royalty Rate [for][from] Second Period of Commercial Production**
Less than [US$850] [US$ 510] per dry metric ton (x < [US$850/t] [US$ 510/t])	[5 7.5 %] [alt [12%]]

Greater than or equal to [US$850] [US$ 510] per dry metric ton but less than [US$925] [US$ 580] per dry metric ton ([US$850/t] [US510 X/t] ≤ x < [US$925/t] [US$ 580/t])	[6 8.75 %] [alt [15.3%]]
Greater than or equal to [US$925] [US$ 580] per dry metric ton but less than [US$1,000] [US$ 650] per dry metric ton ([US$925/t] [US$ 580/t] ≤ x < [US$1,000/t] [US$ 650/t])	[7 10 %] [alt [18.5%]]
Greater than or equal to [US$1,000] [US$ 650] per dry metric ton and less than [US$1,075] [US$ 720] per dry metric ton ([US$1,000/t] [US$ 650/t] ≤ x < [US$1,075/t] [US$ 720/t])	[8 11.25 %] [alt [21.8%]]
Greater than or equal to [US$1,075] [US$ 720] per dry metric ton ([US$1,075/t] [US$ 720/t] ≤ x)	[9 12.5 %] [alt [25%]]

[Commercial Production

1. Commercial Production shall commence on the date that recovery, for commercial purposes, of Minerals from the relevant Mining Area has reached at least [60%] of the design capacity outlined in the initial production phase of the Mining Work Plan for that Mining Area for [90] consecutive Days.

2. Recovery, for the purposes of Commercial Production, shall take place at the point at which Minerals from the Mining Area are transferred to a vessel directly following collection or removal from the seabed and ocean floor and subsoil thereof.

3. Once the Contractor determines that it is engaging in sustained large-scale recovery operations meet the criteria for the commencement of Commercial Production as set out in paragraph 1 above, which yield a quantity of materials in excess of the thresholds specified in the Standards, the Contractor shall promptly notify the Secretary-General of the proposed date of commencement of Commercial Production together with supporting documentation and other evidence as specified in the Standards.

4. The Secretary-General shall transmit the notification and supporting documentation and evidence to the Commission, which shall consider the proposal and supporting materials and approve or reject the Contractor's proposed date.

5. Promptly following approval or rejection by the Commission, the Secretary-General shall, as applicable, confirm the date of commencement of Commercial Production to the Contractor, or notify the Contractor of the rejection and invite the Contractor to re-submit its proposed date of commencement of Commercial Production.

6. Upon confirmation, the Secretary-General shall notify members of the Authority, in particular coastal states [in close proximity] [adjacent] to the [Mining Area][Contract Area], that Commercial Production has commenced and the location of the Mining Area(s).

7. The date of commencement of Commercial Production, will be the date confirmed to the Contractor according to paragraph 5.

8. If the Authority [or Inspectorate] has reasonable grounds to believe that the Contractor's recovery rate does not achieve the level defined in their Plan of Work within [6 months] of the start of recovery operations, the Contractor shall be required to modify its Plan of Work in accordance with Regulation 57.

9. The Contractor shall submit any additional information requested by the Authority [or Inspectorate] within [30] Days of any such request by the Authority.]

[Methodology for the review of Rates of Payments

1. In line with common practice in cross-country comparisons of fiscal regimes imposed on land-based Exploitation activities, the Commission, when undertaking a review pursuant to this Standard, will use average Effective Tax Rate (AETR) to make comparisons between the rates of payments for deep-sea mining operations and land-based mining operations exploiting similar minerals.

2. In addition, the Commission will draw on established methodology routinely used by intergovernmental organizations conducting such comparisons – for example, the International Monetary

Fund's Fiscal Analysis of Resource Industries (FARI) Methodology (see FARI Technical Notes & Manual, 2016).

EFFECTIVE TAX RATE Mining in the Area of deepsea minerals ISA Royalty + GovRev Pre-tax net cashflows	within range	EFFECTIVE TAX RATE Land-based mining of same or similar minerals GovRev Pre-tax net cashflows GovRev is all payments to government composed of royalty, income tax, resource rent tax, withholding taxes, and so on, as specified by the fiscal regime. Source: IMF Technical Note on FARI Methodology, 2016

3. The Commission will use the following information when conducting a review pursuant to this Standard:

(a) Pre-tax net cashflows for a typical deep sea mining project;

(b) Authority and government revenue from deep-sea mining operations; and

(c) Government revenue from land-based mining operations exploiting the same or similar minerals.

Pre-tax net cashflows for a typical deep-sea mining project

4. The ISA Financial Model will be updated based on best available pre-tax net cashflows data for the five years preceding the most recent review of rates of payments.

5. The data referenced in paragraph 4 above will include prefeasibility studies submitted by Contractors as part of their Exploitation Contract application, feasibility studies submitted 12 months before the commencement of Commercial Production and any annual reporting required during Commercial Production.

Authority and government revenue from deep-sea mining operations

6. Along with royalty payments to the Authority, the Commission shall review the fiscal regimes of governments who either already generate revenue from Commercial Production undertaken by Contractor(s) in the Area or those governments who could generate such revenue in the future if Contractor(s) with existing Exploration contracts were to proceed with Commercial Production. For the purpose of information covered under this paragraph, the Commission will use the median rate of government revenue as the appropriate metric.

Government revenue from land-based mining operations exploiting the same or similar minerals

7. The Commission shall review the fiscal regimes of land-based mining jurisdictions that have accounted for at least 80% of global (excluding seabed mining) production of the same or similar minerals during the preceding five years. For example, when reviewing rates of payment for Contractors who exploit polymetallic nodules, the Commission will review land-based mining jurisdictions accounting for at least 80% of global (excluding seabed mining) nickel, copper, manganese, and cobalt mining production during the preceding five years. For the purpose of the information covered under this paragraph, the Commission will use the median rate of government revenue as the appropriate metric.

8. Subject to the review conducted pursuant to these Standards, if the AETR for mining in the Area is determined to differ from the AETR for land-based mining exploiting the same or similar minerals, the Commission shall propose a recommendation for consideration by the Council to adjust the rates of payments with a view to bringing the AETR for Contractors within the range of AETR for land-based mining operations exploiting the same or similar minerals.]

Moved from:

Proposal from the intersessional working group on a review of payment mechanism.

To be placed:

Proposed Standard on the review of the financial terms of a Contract.

The text:

Review of the system of payments and the rates of payments (Regulation 81 and 82)

Introduction and Guiding Principles

1. The purpose of the review of the system of payments and the rates of payments is to ensure that the financial needs and objectives of the Authority are being fulfilled. The review process shall be governed by the provisions of the Convention, the Agreement, relevant international standards, and Good Industry Practice in extractives sector taxation. Specifically, Section 8 of the Annex to the Agreement sets out the following principles:

(a) 'The system of payments to the Authority shall be fair both to the contractor and to the Authority and shall provide adequate means of determining compliance by the contractor with such system [Paragraph 1(a), Section 8 of the Annex to the Implementation Agreement];

(b) 'The rates of payments under the system shall be within the range of those prevailing in respect of land-based mining of the same or similar minerals in order to avoid giving deep seabed miners an artificial competitive advantage or imposing on them a competitive disadvantage [Paragraph 1(b), Section 8 of the Annex to the Implementation Agreement];

(c) 'The system should not be complicated and should not impose major administrative costs on the Authority or on a contractor. Consideration should be given to the adoption of a royalty system or a combination of a royalty and profit-sharing system. If alternative systems are decided upon, the contractor has the right to choose the system applicable to its contract. Any subsequent change in choice between alternative systems, however, shall be made by agreement between the Authority and the contractor;' [Paragraphs 1(c), Section 8 of the Annex to the Implementation Agreement]

Additionally, Article 13 of Annex III to the Convention sets out the following guiding objectives for the Authority:

(a) 'to ensure optimum revenues for the Authority from the proceeds of commercial production [Convention, Annex III, Article 13.1(a).],

(b) 'to attract investments and technology to the exploration and exploitation of the Area, [Convention, Annex III, Article 13.1(b).] and

(c) to ensure equality of financial treatment and comparable financial obligations for contractors' [Convention, Annex III, Article 13.1(c)].

Any recommendation to adopt a new or revised system of payment or changes in the rates of payments must clearly demonstrate that the change will result in a payment regime that is significantly better at meeting the principles set forth under Article 13 of Annex III to the Convention and Section 8 of the Agreement.

Review Process

2. The Council shall regularly review both the system of payments and the rates of payments following the Commencement of Commercial Production in the Area.

3. The Council shall establish and regularly update a schedule for the review of the system of payments and the rates of payments following the commencement of Commercial Production in the Area.

4. The Secretary General shall ensure that the schedule referenced in paragraph 3 above is made publicly available.

5. Any review of the system of payments and rates of payments conducted pursuant to this Standard shall be completed within 12 months, unless otherwise decided by the Council.

6. The Council shall initiate the first review of the system of payments and the rates of payment on the five-year anniversary of the start of the first royalty period [i.e., January 1st or July 1st] corresponding to the first instance of commencement of Commercial Production in the Area. An illustrative example for a scenario is included in Figure 1 below.

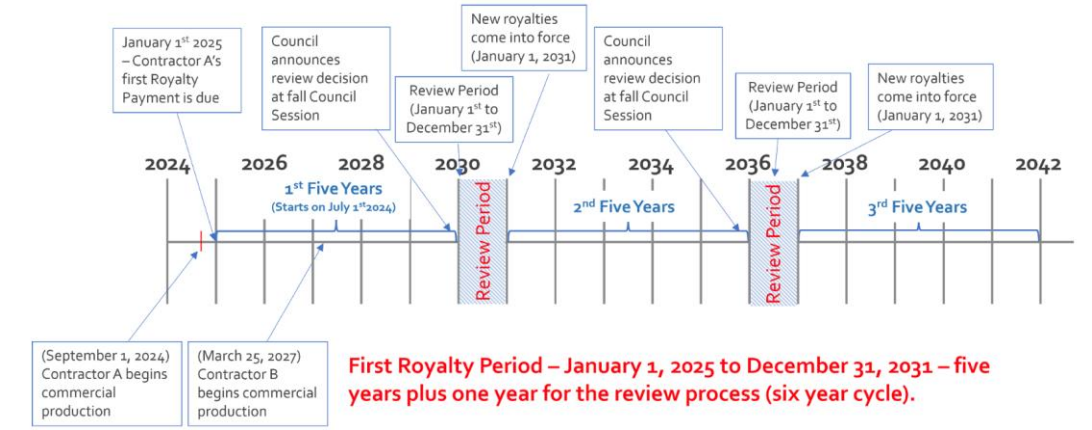


Figure 1: Example of a scenario with two Contractors entering Commercial Production at different times.

7. Subsequent reviews of the system of payments and rates of payments shall be initiated on a regular basis every five years following the conclusion of the 12 month period allocated for the previous review under paragraph 5.

8. Based on the review schedule, the Council shall ensure that adequate funds are allocated from the Authority's budget to undertake an effective and thorough review of the system of payments and rates of payments.

9. The Council shall task the Commission with preparing terms of reference for a review. The Council shall review and approve the terms of reference for the review at a Council meeting prior to the official scheduled initiation of the review process.

10. During a review, there should be a presumption that rates of payment and system of payments should not change unless there is evidence that rates currently in force have been set too high or too low, or that the system of payments is not performing as anticipated. Furthermore, any proposed change to the rates of payments and system of payments shall be material in nature and not an represent an administrative nuisance [e.g., change in rate of less than [#] percentage point should not be recommended].

11.The Commission will be responsible for:

(a) Undertaking the review

(b) Engaging third-party experts

(c) Ensuring consultations with relevant stakeholders, including Contractors, Sponsoring States, Member States eligible for a seat on Group C of the Council, the Enterprise, and the Economic Planning Commission (once established).

(d) Providing the Council with recommendations, in accordance with the established timeframe set out in paragraph 7, on whether any adjustments are warranted along with a supporting rationale.

12. The Council shall consider the recommendations of the Commission and shall decide whether:

(a) to adjust the rates of payments and what the magnitude shall be for such adjustments; and

(b) to adjust the existing system of payments or introduce a new system of payments.

13. Should the Council decide to adjust the rates of payments or the system of payments, such adjustment shall:

(a) take effect from the beginning of the first royalty period following the Council's decision under paragraph 12 [i.e., January 1st or July 1st];

(b) apply to all future Contract Areas and all Contract Areas where the first five years of Commercial Production have elapsed by the time that the adjustment takes effect.

14. Should the Council decide to adjust the system of payment, such adjustment would require written consent from current Contractors and shall:
(a) Take effect from the beginning of the first royalty period following the Council's decision under paragraph 12 (i.e., January 1st or July 1st); and
(b) Apply to all future Contract Areas and all Contract Areas where the first five years of Commercial Production have elapsed by the time that the adjustment takes effect.

Moved from:

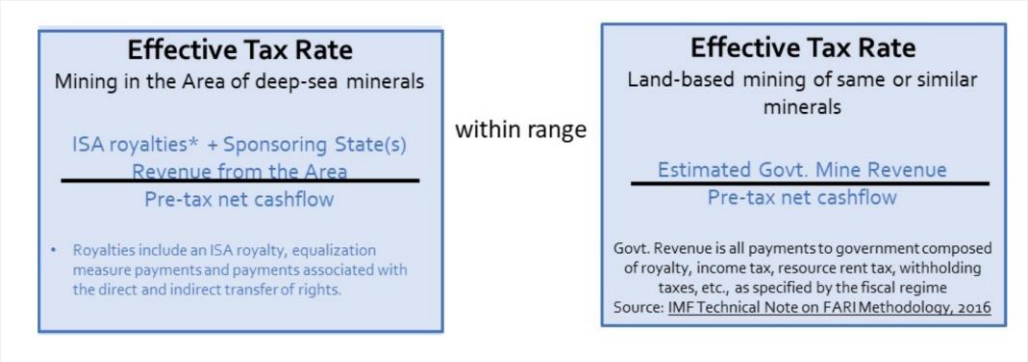
Proposal from the intersessional working group on a payment review mechanism

To be placed:

Standard on the methodology for the Review of Rates of Payments (Regulation 82)

The text:

1. In line with common practice in cross-country comparisons of fiscal regimes imposed on land-based mining operations, the Commission, when undertaking a review pursuant to this Standard, will use the average Effective Tax Rate (AETR) over the life of the mine to make comparisons between the rates of payments for deep-sea mining operations and land-based mining operations exploiting similar minerals.
2. In addition, the Commission will draw on established methodology routinely used by intergovernmental organizations conducting such comparisons – for example, the International Monetary Fund's Fiscal Analysis of Resource Industries (FARI) Methodology (see FARI Technical Notes & Manual, 2016).



3. The Commission will use the following information when conducting a review pursuant to this Standard:
(a) Pre-tax net cashflows from the ISA Financial Model for a typical deep sea mining project

(b) ISA and sponsoring state revenue from deep-sea mining operations, and forecasted ISA and sponsoring state revenue over the remaining years of the mine's life.
(c) Royalties, royalty rates, taxes and tax rates from land-based mining jurisdictions and the effective tax rate these result in when applied to the pre-tax net cashflows from the ISA financial model of a deep-sea mine.

Pre-tax net cashflows for a typical deep-sea mining project
4. The ISA Financial Model will be updated based on best available pre-tax net cashflows data for the five years preceding the most recent review of rates of payments.

5. The data referenced in paragraph 4 above will include prefeasibility studies submitted by Contractors as part of their Exploitation Contract application, feasibility studies submitted 12 months before the Commencement of Commercial Production and any annual reporting required during Commercial Production.

ISA and government revenue from deep-sea mining operations
6. Along with royalty and other payments to the Authority, the Commission shall review the fiscal regimes of sponsoring states as they are applied to the taxation of mining in the area. This will include sponsoring states whose contractors have already entered commercial production and the sponsoring states of those contractors who may enter commercial production in the next five years.

Government revenue from land-based mining operations exploiting the same or similar minerals
7. The Commission shall review the fiscal regimes of land-based mining jurisdictions that have accounted for at least 80% of global (excluding seabed mining) production of the same or similar minerals during the preceding five years. For example, when reviewing rates of payment for Contractors who exploit polymetallic nodules, the Commission will review land-based mining jurisdictions accounting for at least 80% of global (excluding seabed mining) nickel, copper, manganese, and cobalt mining production during the preceding five years.

8. Subject to the review conducted pursuant to these Standards, if the AETR for mining in the Area is determined to differ from the AETR for land-based mining exploiting the same or similar minerals, the Commission shall propose a recommendation for consideration by the Council to adjust the rates of payments with a view to bringing the AETR for Contractors within the range of AETR for land-based mining operations exploiting the same or similar minerals.

Moved from:

Enclosure IV: Draft Guidelines in accordance with Regulations 95 in respect of the administration and management of royalties prescribed in Part VII

The revised draft text of the Co-Facilitators of the Informal Working Group on Institutional Matters (ISBA/28/C/IWG/IM/CRP.2) - Moved in February 2024.

For explanation boxes and comments please refer to the Chair's text.

To be placed:
In Guidelines in accordance with Regulations 95 in respect of the administration and management of royalties prescribed in Part VII

The text:

Official Listings

1. Official Listing in respect of copper means [appropriate reference to be determined].

2. Official Listing in respect of nickel means [appropriate reference to be determined].

3. Official Listing in respect of cobalt means [appropriate reference to be determined].

4. Official Listing in respect of manganese: [appropriate reference to manganese ore to be determined].

Replacement of Official Listing

If:

1. any of the indices or publications listed as an Official Listing ceases to be published or determinable for a period of [one month] and there are reasonable grounds on which to conclude that the index or publication will continue not to be published on a consistent basis in future; or

2. any of the indices or publications listed as an Official Listing does not, in the opinion of the [Council] fairly and reasonably, whether due to persistent errors or omissions, a change in its methodology or for any other reason, reflect the fair market price of the Relevant Metal,

then the [Council] may determine a replacement Official Listing for the Relevant Metal, which shall be:

(a) the price for the Relevant Metal quoted on a recognized international mineral exchange or market;

(b) the published price for the Relevant Metal in a publication recognized for quoting or publishing prices of metals in an international market; or

(c) based on recommendations of the Commission [and following consultation with Contractors], a formula determined by the Council.

Worked example of royalty calculation

The following provides a worked example of the calculation of the royalty in accordance with Regulation 64, appendix IV, the applicable Standard and these applicable Guidelines. This is for illustrative purposes only.

WORKED EXAMPLE 1:

(see Worked Example 2 for details)	**Copper** Quantity (DMT) x Average Grade (%) x Average Listed Price (USD/t)	**Nickel** Quantity (DMT) x Average Grade (%) x Average Listed Price (USD/t)	**Cobalt** Quantity (DMT) x Average Grade (%) x Average Listed Price (USD/t)	**Manganese** Quantity (DMT) x Average Grade (%) x Average Listed Price (USD/t)
Shipment 1	US$47,025,000	US$128,700,000	US$49,500,000	US$62,622,000
Shipment 2	US$57,750,000	US$169,000,000	US$62,000,000	US$67,450,000
Shipment 3	US$75,625,000	US$171,600,000	US$73,700,000	US$70,290,000
Relevant Metal Value (US$)	US$180,400,000	US$469,300,000	US$185,200,000	US$200,362,000
Aggregate Relevant Metal Value (US$)	US$1,035,262,000			
Royalty Rate	First Period of Commercial Production	3%		
	Second Period of Commercial Production	Notional Relevant Metal Value	US$1,035,262,000 / 1,500,000 DMT = US$690/t	
		11.25%		
Royalty payable (First Period of Commercial Production)	US$1,035,262,000 x 3% = US$31,057,860			
Royalty payable (Second Period of Commercial Production)	US$1,035,262,000 x 11.25% = US$116,466,975			

WORKED EXAMPLE 2:

1. Calculation of royalty payable (see Appendix IV)

Applicable Royalty Rate multiplied by the Aggregate Relevant Metal Value

= ~~2~~ 3% x ~~US$1,591,760,000~~ US$1,035,262,000 = ~~US$31,835,200~~ US$31,057,860

(First Period of Commercial Production) Or

= ~~8~~ 11.25% x ~~US$1,591,760,000~~ US$1,035,262,000 = ~~US$127,340,800~~ US$116,466,975
(Second Period of Commercial Production, if two stage variable ad valorem)

2. Applicable Royalty Rate (see Standard)

If during First Period: ~~2~~ 3%

If during Second Period: ~~8~~ 11.25% (two stage variable ad valorem)

where ~~8~~ 11.25% based is on a Notional Relevant Metal Value of ~~US$1,061/t~~ US$690/t (as per table in Standard)

Notional Relevant Metal Value

= Aggregate Relevant Metal Value / total Quantity

= ~~US$1,591,760,000~~ US$1,035,262,000 / 1,500,000DMT

= ~~US$1,061~~ US$690 per ton

3. Aggregate Relevant Metal Value (see Standard)

Aggregate Relevant Metal Value = the aggregate of the Relevant Metal Value for each Relevant Metal during the royalty return period

= Relevant Metal Value for copper + Relevant Metal Value for nickel + Relevant Metal Value for cobalt + Relevant Metal Value for manganese

= US$180,400,000 + US$469,300,000 + US$185,200,000 + ~~US$756,860,000~~ US$200,362,000

= ~~US$1,591,760,000~~ US$1,035,262,000

Relevant Metal Value for Copper:

1. For each Shipment of copper:

Quantity x Average Grade of the Relevant Metal x Average Listed Price for the Relevant Metal

2. For the royalty return period:

The aggregate of the Relevant Metal Values for each Shipment which commenced loading in the royalty return period

Therefore, assuming 3 Shipments:

	Quantity (DMT)	Average Grade (%)	Average Listed Price (US$/t)	Relevant Metal Value (US$)
Shipment 1	450000	1.10%	9500	47025000
Shipment 2	500000	1.10%	10500	57750000
Shipment 3	550000	1.10%	12500	75625000
Aggregate for royalty return period				180400000

Relevant Metal Value for Nickel:

1. For each Shipment of nickel:

Quantity x Average Grade of the Relevant Metal x Average Listed Price for the Relevant Metal

2. For the royalty return period:

The aggregate of the Relevant Metal Values for each Shipment which commenced loading in the royalty return period.

3. Therefore, assuming 3 Shipments:

	Quantity (DMT)	Average Grade (%)	Average Listed Price (US$/t)	Relevant Metal Value (US$)
Shipment 1	450000	1.30%	22000	128700000
Shipment 2	500000	1.30%	26000	169000000
Shipment 3	550000	1.30%	24000	171600000
Aggregate for royalty return period				469300000

Relevant Metal Value for Cobalt:

1. For each Shipment of cobalt:

Quantity x Average Grade of the Relevant Metal x Average Listed Price for the Relevant Metal

2. For the royalty return period:

The aggregate of the Relevant Metal Values for each Shipment which commenced loading in the royalty return period

Therefore, assuming 3 Shipments:

	Quantity (DMT)	Average Grade (%)	Average Listed Price (US$/t)	Relevant Metal Value (US$)
Shipment 1	450000	0.20%	55000	49500000
Shipment 2	500000	0.20%	62000	62000000
Shipment 3	550000	0.20%	67000	73700000
Aggregate for royalty return period				185200000

Relevant Metal Value of Manganese:

1. For each Shipment of manganese:

Quantity x Average Grade of the Relevant Metal x Average Listed Price for the Relevant Metal

2. For the royalty return period:

The aggregate of the Relevant Metal Values for each Shipment which commenced loading in the royalty return period

3. Therefore, assuming 3 Shipments:

	Quantity (DMT)	Average Grade (%)	Average Listed Price (US$/t)	Relevant Metal Value (US$)
Shipment 1	450000	28.40%	~~1500~~ 490	~~191700000~~ 62622000
Shipment 2	500000	28.40%	~~2000~~ 475	~~284000000~~ 67450000
Shipment 3	550000	28.40%	~~1800~~ 450	~~281160000~~ 70290000
Aggregate for royalty return period				~~756860000~~ 200362000

Moved from:

Schedule

To be placed:

Reinserted if needed

The text:

"Additional Royalty" means the additional royalty payable in accordance with Regulations [64 bis] and [64 ter].

"Allowable Sponsoring State Tax" has the meaning given in Regulation [64 ter].

"Applicable Additional Royalty Rate" is the rate determined in the applicable Standard.

"Assumed CIT Rate" is the rate determined in the applicable Standard.

"Covered Taxes" has the meaning given to that term in the Pillar 2 Global Anti-Base Erosion Model Rules published by the OECD from time to time.

"Ecosystem Approach" means a comprehensive, integrated [and interdisciplinary] approach to the management of human activities based on the Best Available Scientific [Information]/[Evidence] and, where available, relevant traditional knowledge of Indigenous Peoples and local communities that accounts for marine ecosystems and their dynamics, to achieve ecosystems' conservation and sustainable use of, and the avoidance of interference with, the ecological balance of the Marine Environment.

[Alt. "Ecosystem Approach" means a comprehensive, integrated and interdisciplinary approach to the management of human activities based on the Best Available Scientific Knowledge to balance ecological, social and governance principles at appropriate temporal and spatial scales in a distinct geographical area to achieve ecosystem conservation and sustainable resource use. Scientific knowledge and effective monitoring are used to acknowledge connections, integrity and biodiversity within an ecosystem along with its dynamic nature and associated uncertainties. The ecosystem-based approach recognizes coupled socio-ecological systems, with stakeholders involved in an integrated and adaptive management process where decisions reflect societal choice.]

"Equalization Measure Audit" means an audit in respect of a Contractor carried out in accordance with the relevant Standard and applicable Guidelines to determine whether the Contractor has any tax exemptions or receives any Subsides from its Sponsoring State.

"Inclusion Criteria" means a substantial (but not necessarily the majority or primary) part of (i) its business is connected to or associated with, and/or (ii) its revenues are derived from, mining, harvesting, transporting, processing and/or sale of Minerals or Metals obtained under an Exploitation Contract.

"Income" has the meaning given to 'GloBE Income' in the Pillar 2 Global Anti-Base Erosion Model Rules published by the OECD [from time to time].

"Large Scale Production" means exploitation, production or removal from the Area of Mineral-bearing ore in a quantity which is in excess of the thresholds specified in the Standards.