

## **Comments on International Seabed Authority Document “Developing a Regulatory Framework for Mineral Exploitation in the Area”**

The document serves as a good basis for the development of regulations. The detailed language that will eventually be developed for each section will be of interest as the International Seabed Authority (ISA) will need to balance their role as regulator and promotor of seabed mining.

### **Part I – Use of terms and Scope**

Concur that definitions will be very important to reduce ambiguity.

### **Part II – Forms of Application**

A plan of work should cover multiple exploitation areas as long as the resource is the same. Option 1 (page 8) would appear more desirable since this will reduce costs for the mining entity and resources needed by the ISA to review multiple documents. ISA may want to have language that provides flexibility in addressing multiple exploitation areas.

### **Part II - Data and Information Submitted for Approval of the Plan of Work for Exploitation**

Agree EIS and Social Impact Assessment can/should be combined.

### **Part II – Environmental Impact Statement (EIS) and Social Impact Assessment and Action Plan (SIA)**

Initial thought was that let the extent of impacts define the environmental impact area. However upon further assessment, the Impact Area may need to be defined. E & E has previously commented verbally that there could be some connected actions not currently being considered as part of the impact area. This includes ship transport to and from the site, ship servicing areas, and socio-economic impacts to sponsoring countries, etc. If the focus of impact area is only on the mined site then other impacts, some which are beneficial, are not being considered. ISA may want to look at definitions of “connected actions”.

### **Part II – Closure Plan**

Important to define what restoration means in the context of restorative obligations. Mining entities will need to know upfront what will be required so they can determine the feasibility of meeting those obligations.

### **Part II – Fees for Applications**

If the ISA can cover those costs that would be preferable for a mining entity since they will have no control over the review process. One option would be to have the mining entity pay upfront for those review costs and then get a refund from the ISA (assuming a royal fee is set up) once mining revenue is generated.

## **Part II – Public Review of EIS and Environmental Management Plan (EMP)**

ISA may want to consider a formal process called Stakeholder Mapping Process to help identify users of/over the mined area and other likely interested stakeholders. These stakeholders would be notified and provided opportunities to provide input. This could be done in conjunction with other review/public input mechanisms.

## **Part II – Missing Section?**

Should there be a time line for ISA to process applications (section titled Application Processing Schedule)? A mining entity and their financial backers will need to have some certainty the application is being processed and reviewed in a timely manner. While this may put an increased pressure on ISA, it provides some degree of certainty and fairness and moves the review process forward.

## **Part III – Performance Requirements**

In considering a maximum time interval after the exploration stage and the exploitation stage, the ISA may also need to factor in time for environmental approvals.

## **Part IV – Protection and Preservation of the Marine Environment**

Agree that a lot of work will be needed here. In addition it will be important to address issues associated with cumulative impacts.

## **Part IV – Environmental Management**

ISA may want to consider flexibility in the frequency of EMP and EMS audits based on the scale and consistency of mining operations.

## **Part IV – Strategic Environmental Management Plan (SEMP)**

A SEMP has merit and we are assuming this would be based on a regional (The Area) EIS per EMP requirements. A SEMP would help address cumulative impacts, set parameters for preservation reference zones/etc. and establish environmental management procedures that will be followed. This will aid exploitation contractors in the development of their lease area EMPs, implement regionally acceptable practices, and ensure more consistency between the different exploitation applications.

## **Comments on High Level Issues**

High Grading of Mineral Deposits - Understand the reason for potentially not cherry picking the resource but let economics and environmental considerations determine what areas should be mined. There are clearly environmental benefits to leaving lower grade areas unmined. The footprint of impact will be less. For a precautionary principle it would seem that mining a smaller high grade area is better than mining a larger lower grade area with similar ecological/environmental conditions. As more information

is gained on the impacts to the marine ecosystem and technologies improve then it may be environmentally and economically viable/appropriate to mine lower grade deposits sometime in the future. To help jumpstart the exploitation of polymetallic nodules, there may need to be increased economic incentives to offset risks of early mining operations.

Data Collection – This is not listed but from our experience the question of “how much data is enough to assess impacts and address stakeholder concerns” is an issue on most marine projects. This will definitely be an issue for deep sea mining projects as there will always be some degree of uncertainty and risks no matter how much data is collected. The amount of allowable uncertainty and risk depends on who is being asked. One of the primary objections to deep sea mining is we don’t know enough about the deep sea environment. With that type of thinking deep sea mining will not occur for a very long time. To help mitigate that objection, it will be important to continue linking some of the uncertainties to the application of the precautionary principle and adaptive management approaches.

**Comments on Draft Action Plan**

We would like the opportunity to provide input on the EIS regulation development.