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## Managing deep sea mining revenues for the public good- ensuring transparency and distribution equity<sup>★</sup>

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#### ABSTRACT

This paper is intended to provide an overview of key issues in the financial management of revenues and wealth associated with development of deep sea minerals. Setting up frameworks for DSM revenue management is a complex task. The paper should help the authorities identify what they need to do to maximize the benefits of DSM wealth for their citizens.

The paper is the product of a close collaboration between the Geoscience Division (GSD) of the Pacific Community (SPC), and those of the Pacific Financial Technical Assistance Centre (PFTAC) of the International Monetary Fund (IMF). It was produced with the financial assistance of the European Union and the International Monetary Fund.

## 1. Introduction

The exploitation of deep sea mineral (DSM) deposits in the Pacific has the potential to generate new, and possibly substantial, revenues for countries in the region. Properly managed, DSM wealth can raise living standards and economic opportunities for current and future generations. On the contrary, poorly managed, such wealth may not only be wasted, but also has the potential to cause great economic and social harm [1]. In May 2014, the Pacific Community (SPC) through the SPC-EU Deep Sea Minerals Project, and the Pacific Financial Technical Assistance Centre (PFTAC) organised a regional training workshop in Rarotonga, Cook Islands [2], to discuss issues relating to the financial management of DSM resources. One year later, in August 2015, a follow-up workshop was organised in Fiji to focus on developing fiscal regime and revenue management options for DSM [3]. The Regional Financial Framework for Deep Sea Minerals Exploration and Exploitation (RFF) [4] launched in June 2016 presents key elements of the major topics discussed.

The main objective of the RFF is to support Pacific Island countries (PICs) in setting up their national DSM fiscal and wealth management frameworks. Although some PICs have already begun to set up fiscal revenue frameworks while others have some form of long-term saving funds that could be used in managing DSM wealth, some PICs are only at a early stage.

A critical aspect of the RFF is to highlight the different elements

that should be comprised in a sound DSM fiscal management framework with the view of helping to ensure that the potential benefits of DSM resources are used to achieve the maximum benefits for current and future generations of PICs. The main elements include: (i) a high degree of transparency in all areas of the framework to ensure good understanding and support for the various major elements, and to guard against mismanagement; (ii) a strong public financial management system to ensure efficient fiscal framework implementation; (iii) a medium-term fiscal policy framework to ensure that the DSM revenue flow does not destabilize the economy; and (iv) a wealth management framework to ensure that benefits of DSM revenues are shared appropriately between current and future generations, and to minimize potentially damaging macroeconomic effects of spending too much too quickly.

The aim of this paper is to provide a summary of the key elements of the RFF. It will be divided into three sections addressing respectively the institutional, legal and transparency arrangements; the public financial management and the fiscal policy framework and finally, the wealth management framework.

## 2. Institutional, legal and transparency arrangements

A clear institutional framework is needed for establishing a DSM

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fiscal framework. It is generally recommended that the lead department be the Ministry of Finance, working in consultation with departments responsible for managing DSM activities.

It should be noted that the implementation of a DSM fiscal and revenue management regime will be helped if there is early public discussion and consensus on objectives and key features. This will require public consultation processes, and robust government and parliament discussions before final decisions are made. The importance of this cannot be over-emphasised, particularly given uncertainty over whether DSM resources can be replenished over economically relevant horizons.

It is also of vital importance that the fiscal framework be established in advance of issuing initial prospecting or exploration licences and before the DSM revenues start flowing. Shortcuts might be costly, and it is therefore important to start the process as soon as possible. Although a broad and inclusive planning process may take more time, a consultative approach should ease implementation and lead to a more sustainable framework in the long term [5].

Transparency is a prerequisite for a successful DSM revenue management framework. Accordingly, the DSM fiscal regime should incorporate: competitive procurement procedures; quarterly and annual reporting; independent audits; clearly delineated decision-making and oversight roles; and regular and accessible public disclosure of non-confidential/non-commercial information. It is anticipated that embedding transparency and oversight mechanisms into national laws will assist in reducing risks of corruption and mismanagement, and will be key to enable parliament, non-governmental organisations (NGOs), private sector, and society at large to hold government accountable for management of DSM revenues [6]. State commitment to transparency initiatives also benefits mining companies by reducing political and reputational risk, and assisting to highlight the contribution of their investment to the country [7].

## 3. Public financial management and the fiscal policy framework

Revenues deriving from DSM mining, if managed well, could potentially provide lasting benefits for PICs and contribute to sustained and broadbased economic growth and social development [8]. DSM revenues can be used for public investment in human and physical capital and improvement of public services, further increasing the economy's growth potential. DSM revenues can also be used to build up economic buffers to weather external shocks and save for future generations.

## 3.1. Establishing public financial management arrangements to increase use effectiveness

However effective use of revenues collected from DSM mining will require Governments to put in place appropriate public financial management arrangements [9]. Access to relevant information and adequate capacity to handle the particular complexities of the DSM sector are also essential factors. Several technical organisations such as the Pacific Community (SPC) and the Pacific Financial Technical Assistance Centre (PFTAC) can assist by providing technical assistance and policy/legal advice.

In addition, a medium-term macroeconomic policy framework, integrating planning and budgeting, is essential to ensure that the revenue flow does not destabilize and undermine good macroeconomic performance. It is therefore recommended that the use of DSM revenues be fully integrated into the national budget process and that any domestic development expenditure from DSM revenue be addressed through the budget process to enable sound macroeconomic and fiscal planning in the broader national context.

### 3.2. Conditions for effective implementation

Effective implementation of the DSM fiscal regime requires addressing a series of constraints or challenges relating to structural challenges, disclosure and transparency requirements, macroeconomic performance risks, budgetary planning etc.

### 3.2.1. Addressing structural weaknesses

Weaknesses in institutional and legal arrangements can seriously impede the successful implementation of public financial management arrangements and lead to severe consequences [10]. As a result, it is of critical importance that the legal and institutional framework be clear, particularly the fiscal revenue legislation. Within the fiscal revenue framework, issues are likely to arise that may not be adequately covered in existing legislation, for example, on international aspects of revenue management. It is also of critical importance that institutional and legal arrangements be put in place for some form of fund to manage the accumulation of wealth from DSM. If not properly addressed, such weaknesses in these areas can lead to losses of revenues, inefficient revenue management, poor macroeconomic outcomes, and undermine the credibility of the framework for domestic residents and foreign investors alike [11].

Attention should also be given to weaknesses in administrative processes. For the fiscal framework to be implemented effectively and efficiently, appropriate administrative processes need to be put in place. These include monitoring and enforcement processes to ensure that the revenues owed to the government are paid and; reporting and accounting frameworks to ensure that the flow of funds within the government are properly monitored. It is also essential to ensure that strong transparency and accountability mechanisms are established to avoid mismanagement of revenues like the one associated with the phosphate extracted from Nauru [12]. In the absence of strong administrative processes, there is a high risk of revenue loss, inefficiency and, potentially, corruption, with adverse consequences for the credibility of the entire DSM framework.

## 3.2.2. Disclosure and transparency

Transparency in all parts of the value chain, from when DSM revenues are received until disbursement is of paramount importance. Competitive procurement procedures, independent audits of financial accounts, and public disclosure of these reports, are important to enable society at large to hold government accountable. Public reports on a national DSM fund should be part of Government's regular annual budget documentation. Joining the Extractive Industries Transparency Initiative (EITI) has been an important path for many resource-rich countries to ensure disclosure and dissemination of information and to involve civil society organisations [13]. It is worth mentioning that as of today, Timor Leste is the only Pacific Island State EITI compliant whereas PNG and the Solomon Islands are candidates [14]. It is also important to put in place the relevant institutional and legal framework to ensure extensive transparency and public disclosure of DSM revenues. Emphasis may also be placed on the training of Cabinet members and Parliamentarians on their proper role in financial management and scrutiny: public financial management is not just a technical issue. Appropriate time and information flow should also be factored in for: (a) Integration between financial management and public policy objectives; (b) Long-term planning; and (c) External scrutiny.

### 3.2.3. Mitigating macroeconomic performance risks

 DSM revenues could also destabilize macroeconomic performance of PICs. If the pace of spending of DSM revenues significantly exceeds the ability of the economy to absorb such expenditure, the consequences are likely to be overheating of the economy, particularly in the non-tradable goods and services sectors, leading to accelerat-

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