



# Concept Environmental and Social Review Summary

## Concept Stage

### **(ESRS Concept Stage)**

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**BASIC INFORMATION**

**A. Basic Project Data**

Country	Region	Project ID	Parent Project ID (if any)
Iraq	MIDDLE EAST AND NORTH AFRICA	P178935	
Project Name	Integrated Persistent Organic Pollutants (PoPs) Management Project		
Practice Area (Lead)	Financing Instrument	Estimated Appraisal Date	Estimated Board Date
Environment, Natural Resources & the Blue Economy	Investment Project Financing	3/27/2023	6/22/2023
Borrower(s)	Implementing Agency(ies)		
Ministry of Finance	Ministry of Environment		

Proposed Development Objective

Improve the management of Obsolete Pesticides (OPs), Persistent Organic Pollutants (PoPs) and Polychlorinated Biphenyls (PCBs) in Iraq through policy, regulatory and institutional actions and safe disposal of targeted stockpiles

Financing (in USD Million)	Amount
<b>Total Project Cost</b>	<b>102.49</b>

**B. Is the project being prepared in a Situation of Urgent Need of Assistance or Capacity Constraints, as per Bank IPF Policy, para. 12?**

No

**C. Summary Description of Proposed Project [including overview of Country, Sectoral & Institutional Contexts and Relationship to CPF]**

The project responds to Iraq’s national priorities of managing hazardous waste and chemicals and its international commitments under Stockholm Convention on environmental sound management of PCBs, OPs and unintentional POPs (uPOPs). The project will also help prepare an updated comprehensive NIP for all POPs and address all aspects of their management and monitoring throughout their life cycle.

Given the anticipated large quantities of POPs in Iraq and limited budget available, the project aims to maximize its impacts by identifying selected interventions at critical locations that mitigates environment and health risks to the



local communities. In addition, the project will facilitate establishment of implementation models that enables scaling up interventions for POPs management beyond the project period. The project proposes to achieve the objectives through the following four components.

**Component 1: Comprehensive Road Map for Sustainable Management of OPs, POPs, PCBs, and Other Hazardous Chemicals (US\$2.237 million)**

**Sub-component 1.1: Review and Update Iraq National Implementation Plan for POPs (US\$0.50 million)**

Amendments to the Convention are one of the key factors requiring an update of the NIP. The sub-component will support the review and update of Iraq's NIP, 2017 for POPs to comply with Article 7 under the Stockholm Convention and submission to the Stockholm Convention Secretariat. Based on the initial inventories / plans, this sub-component will also assess the national infrastructure and capacity for the management of all POPs, developing the new POPs inventories, and updating the initial POPs inventories. Thus, quantitative, and qualitative national inventories for OPs, POPs, UPOPs and IPOPs (excluding PCBs) will also be carried out.

The sub-component will also update the existing action plans for the initial POPs listed under the Convention and develop action plans necessary to address the newly adopted POPs. Action Plans for new POPs may include provisions for: Hexabromodiphenyl Ether and Heptabromodiphenyl Ether (HBDEs), PFOs and Perfluorooctane Sulphonyl Fluoride (PFOS-F), SCCPs, Endosulfan and Lindane.

The updated NIP through assessments and stakeholder consultations will (i) prioritize/ rank actions based on obligations set out in the Convention, risks to human health and environment; (ii) setting out cost-effective action plans for the newly adopted POPs; and (iii) revised action plans of the initial POPs listed under the Convention.

**Sub-component 1.2: National inventory of PCB contaminated transformers, capacitors and oil (US\$.150 million)**

While there is no national comprehensive inventory of transformers and the level of PCB contamination, it is estimated that Iraq has about 240,000 power transformers across the country. The project through this component, proposes to carry out an inventory for online, offline, and abandoned power transformers and capacitors in Iraq and identify PCB contaminated transformers and their level of contamination in each site. In addition to providing a clear picture on the extent of PCB contamination in the power sector, the inventory will also support development of good engineering practices with regard to health and safety protocols, sampling, testing, and labeling of PCB oil.

**Sub-component 1.3: Establishing an Enabling Framework for POPs Management (US\$0.237 million)**

This sub-component will assess policy, institutional and regulatory gaps for the implementation of NIP and other requirements of implementing Stockholm convention. Based on this assessment, the project will support development and implementation of (i) policies for the prevention and management, (ii) regulations for ensuring compliance, (iii) monitoring systems for tracking the entire value chain of import, production, supply, usage, and disposal, (iv) protocols and guidelines for the storage, handling and usage, and (v) standards and guidelines for the risk-based remediation of sites contaminated by OPs, POPs and PCBs and hazardous chemicals.

**Component 2: Management and Elimination of POPs (US\$8 million)**



Sub-component 2.1: Prevention and Disposal of Persistent Organic Pollutants and Obsolete Pesticides (US\$3.00 million)

The assessment of environmental hot spots carried out by United Nations Environment Program (UNEP) in 2005 and POPs NIP prepared by UNEP with GEF funding, has identified about 103 tons of OPs including 421 liters of Endosulfan and a backlog of about 142,000 empty pesticide containers at Al-Suwaria warehouse of the Ministry of Agriculture (MoA). It is, however, it is estimated that there are many more public institutions and various private sector entities with stockpiles of OPs/ POPs, which are not surveyed. This sub-component will identify these additional stockpiles of OPs/ POPs in the context of a national POPs Pesticides inventory. This would comprehensively define the extent of contamination at the Al-Suwaria warehouse site and also identify additional OP storage sites in Iraq. In addition, the sub-component will also (i) assess the health and environmental risks at each of the identified locations and (ii) identify priority locations (based on a specific criteria of risks, sensitivity, cost and implementation time) for the disposal/destruction of OPs and rehabilitation/ remediation of the site(s).

This will also include (i) identifying appropriate technologies, preparing required plans to initiate capture, segregation, and containment of obsolete pesticide stockpiles and contaminated material; (ii) undertake the physical excavation, packaging and removal of the recovered stockpiles and contaminated materials; and iii) provide for its secure temporary storage. This component essentially accomplishes the project's immediate priority requirement above, by preventing further release of OPs and their general spread into the global environment.

In addition, for the contaminated materials whose destruction represents a priority in terms of local risk and achieving GEF strategic objectives of maximizing volume of obsolete pesticides eliminated, the project will support their disposal based on of BAT/BEP applicable technology and appropriate environmental safeguards procedures. The sub-component will also support containment of legacy OPs and associated contaminated material to prevent their continued release into environment through packaging, storage and disposal of high concentration OPs.

Overall this sub-component aims to support safe management of about 1000 tons of OPs and will be implemented by following 'Learning by Doing Approach', so that the capacity of MoE and MoA is developed for (i) updating the inventory on a regular basis, (ii) monitoring and tracking the entire value chain such as import, production, supply, handling, usage, and disposal, and (iii) disposal/ destruction of OPs and POPs beyond the project implementation. This would also include a system for tracking and management of OPs by MoElc and MoA.

Sub-component 2.2: Reduction and Disposal of PCBs (US\$5.00 million)

Based on the national inventory of PCB to be developed through sub-component 1.2, this component will support environmentally sound treatment/disposal of the equipment and dielectric fluids t or treat such units so that levels of contamination are reduced below the low POPs limit (50 ppm) for PCBs specified under the Stockholm Convention and abiding by the best international practice. A realistic and pragmatic phase-out plan of PCBs containing equipment (in-service and out-of-service) will be developed in close consultation with the government and equipment owners. The first step will be to establish a robust management system, to identify and monitor the PCBs contaminated equipment in use and in storage. The system will have a dynamic component to follow the reduction of PCB contaminated equipment in use and amount being taken out of service.



Depending on the quantity and types of PCBs identified, appropriate technology will be selected best suited to treat / dispose in the context of Iraq. Overall, this sub-component aims to contribute to global environmental benefits by safely disposing and/ or decontaminating 3000 tons of PCB-containing equipment and wastes (transformers, capacitors, and PCB contaminated oil) in an environmentally sound manner. By applying BAT and strict environmental practices during the disposal of PCB wastes, the releases of unintentional POPs during the disposal process will be avoided.

The project will build on the experience of successful POPs and PCB projects in Egypt and Lebanon, and will follow the overall ‘Learning by Doing Approach’ of the project, so that the capacity of MoE and Ministry of Electricity is developed for (i) updating the inventory on a regular basis, (ii) monitoring and testing transformers for PCB contamination, and (iii) disposal/ destruction of PCBs beyond the project implementation. This would also include a system for tracking and management of PCBs by MoE and MoElc.

#### Component 3: Knowledge Management, Institutional Strengthening and Capacity Building (US\$2.5 million)

The project as part of this component will support building the technical, analytical and infrastructure capacity of key stakeholder Ministries of Environment, Agriculture and Electricity. In addition to building technical capacity as outlined in components 1 and 2 above, this component will provide specific customized comprehensive training programs for (i) conducting inventory (ii) inspection, monitoring, handling and management; (iii) monitoring and testing of transformers for PCB decontamination, (iv) management and disposal and destruction, (v) implementation and enforcement of policies and regulations formulated for the sustainable management of OPs, POPs, uPOPs, PCBs and other hazardous chemicals.

This subcomponent will (i) assess local analytical capacity and priority of pollutants to be measured based on their relevance in the country and build capacities of national laboratories and academic research laboratories to test for POPs parameters and (ii) provide needed infrastructure for POPs assessment, measurement, analysis, and prevention measures ensuring compliance to the commitments under Stockholm Convention and sustainable management of chemicals and hazardous substances.

#### Component 4: Project Management and Monitoring (US\$ 0.75)

This component will support operating costs associated with day-to-day project management and implementation including procurement, financial management, and environmental and social management functions to be carried out by the Project Management Unit (PMU).

This component will support: i) hiring of international and national technical experts with knowledge and expertise on POPs and hazardous waste management to provide technical support to project implementation; ii) monitoring & evaluation of the project outcome indicators and results by collecting evidence-based information and data, and reporting to the World Bank and the GEF, as well as a mid-term and technical evaluations following the World Bank and GEF guidance; and iii) project launch and completion workshops.

### **D. Environmental and Social Overview**



D.1. Detailed project location(s) and salient physical characteristics relevant to the E&S assessment [geographic, environmental, social]

The project will be implemented across Iraq and will be designed to build the capacities and systems for understanding, planning, improving the management of POPs comprising OPs and PCBs in the country through policy, regulatory and institutional actions and safe disposal of targeted stockpiles these substances. While, exact locations of the stockpiles are not identified as yet, according to the preliminary work carried out by the United Nations Environment Program (UNEP) in 2005 and POPs NIP, it is understood that most of the sites are located in industrial/agricultural areas in the seven conflict affected governorates of Ninewa, Anbar, Salah Ad-Din, Diyala, Kirkuk, Baghdad, and Babel.

In terms of environmental profile of Iraq, over 42 percent of the country is desert, with prairies making up about 12 percent. The country is mostly arid or semi-arid and receives about 100– 200 mm of rainfall. However, the north part of the country receives an annual rainfall of about 1000 mm. In terms of flora and fauna, reports of MoE indicate the presence of 417 bird species, 106 marine fish species and 4500 plant species in the country. Further, the World Wide Fund for Nature (WWF) identified six biomes and 12 eco-regions across Iraq. Accordingly, Marshlands, Arabian Desert, Mesopotamia Shrub Desert, Middle East Steppes habitat, Forests Zagros Mountains and Coastal Marine Habitats are considered as six main habitats in the country.

With regard to pollution, due to series of conflicts over a long periods of time, it is estimated that Iraq has about (i) 81 chemical contaminated hotspots spread over 10,569 hectares of land in seven conflict affected governorates; (ii) 2.3 million hectares of unusable land; (iii) deteriorating air pollution across major cities; (iv) generates about 13.14 million tons of municipal solid waste, 119,425 tons of hazardous waste and 6,432 ton of health care waste every year.

The key environmental challenges of Iraq will thus be to address the issues of (i) conflict pollution, related to widespread contamination of land by military wastes, land mines and hazardous chemicals; (ii) oil pollution caused by the destruction during multiple conflicts; (iii) management of natural resources to address the widespread ecosystem degradation; and (iv) climate change and desertification which exacerbates the ecological impacts of an already harsh climate characterized by low rainfall and high summer temperatures, with differentiated impacts on men, women, internally displaced and vulnerable population.

D. 2. Borrower's Institutional Capacity

The Ministry of Environment (MoE), the main implementing agency for the project has no specific experience of implementing World Bank financed projects and hence no experience in implementing Bank safeguards and/ or ESF. However, being an apex agency in charge of environmental regulations in the country, the ministry has a strong experience of implementing various environmental laws and standards. In addition, the ministry has also received capacity building support from the World Bank in 2014/15 on 'Environmental Impact Assessment and Inspection'. Further, the Ministry of Agriculture (MoA) and Electricity (MoElc) who will be the other two participating ministries of the project, have experience of implementing World Bank financed projects.

In addition MoE has implemented similar activities on hazardous waste and contaminated site management with international agencies such as United Nations Environment Program (UNEP). In 2015, UNEP as part of the assessment



of Environmental Hotspots, provided intensive class room and on site training on environmental site assessments to the teams of MoE and other Ministries. Similarly, World Bank through the ongoing activity on ‘Support to Environmental Hotspots’ has provided a comprehensive training (class room and on field) including management of E&S issues for the management of contaminated sites.

Thus, the technical and regulatory expertise of MoE and the experience of MoA and MoElc in implementing Bank financed projects, provides a good basis implementing E&S aspects in the current project. Further, the Project Management Unit (PMU) at MoE will be responsible for ensuring that project activities are assessed from environmental and social point of view and necessary environmental and social instruments are prepared and implemented in compliance to the Bank's ESF. For the purpose of implementing environmental and social standards, dedicated environmental and social Specialists will be deployed within the PMU. Given the high risk nature of the project, strong theoretical and practical knowledge of E&S, EHS/OHS issues associated with hazardous waste management will be the key requirement for the environmental specialists to be hired in the PMU. In terms of functions, the E&S specialists will be responsible for coordinating environmental and social management activities of the project, including adequate implementation of Environmental and Social Management Framework (ESMF), site-specific Environmental and Social Impact Assessments/Environmental and Social Management Plans (ESIAs/ESMPs), site-specific Resettlement Plans (RPs) if required, Labor Management Procedures (LMP), and Stakeholder Engagement Plan (SEP). In addition, the E&S task team of the World Bank will also provide hands-on support during project preparation and implementation to build capacity of the PMU and also ensure compliance with the E&S requirements as per the ESF. The MoE will also ensure that all contractor, consultants and service providers from which it will procure services adhere to World Bank's ESF requirements.

Public Disclosure

## II. SCREENING OF POTENTIAL ENVIRONMENTAL AND SOCIAL (ES) RISKS AND IMPACTS

### A. Environmental and Social Risk Classification (ESRC)

High

#### Environmental Risk Rating

High

The Environment Risk Rating is considered High. The overall outcome of the project will be positive, as the PDO of the Project, aims to Improve the management of POPs containing OPs and PCBs in Iraq through policy, regulatory and institutional actions and safe disposal of targeted stockpiles. However, POPs are highly toxic and exposure to these substance can happen through food, environment or accidents. These substances can negatively affect humans, plant and animal species, and natural ecosystems both in close proximity and also at significant distance from the original source of the discharge. In case of humans, the exposure to POPs can cause several negative health effects including death, cancers, allergies, hypersensitivity, developmental changes, damage to the central and peripheral nervous systems, disruption of the endocrine, reproductive, and immune systems. Some or many of the impacts highlighted above, will possibly cause significant, long-term, irreversible EHS risks and adverse impacts on the population and environment, when exposed to POPs and/ or project activities. The exposure could happen during the implementation of project activities such as handling (collection, packaging, storage) and disposal of PoPs, leading to EHS/ OHS risks to the people involved in the operations and also to the neighboring communities. Some of the impacts can't be mitigated or can be addressed with special interventions requiring complex and/or unproven mitigation and/or compensation measures or techniques. In addition, the project activities could also lead to



contamination of soil from spills of OPs/ PCBs and hazardous chemicals during sampling, temporary storage and treatment/ disposal stage. Considering this, the environment risk of the project is rated as 'high' . In terms of specific locations, the project targets to support management and disposal of 1000 tons of OPs and 3000 tons of PCBs. However, no sites were identified only one potential location with 103 tons of OPs, 421 liters of Endosulfan and about 142,000 empty pesticide containers at Al-Suwaria warehouse of the Ministry of Agriculture . But, the nature and level of pollution and the risk to the local population at this site is unknown. It is estimated that there are a number of public facilities and various other locations owned by private sector entities, with similar stockpiles of OPs and PCBs. However, assessing the environmental and health risks associated with these sites and their prioritization for remediation requires detailed assessments, laboratory infrastructure and international expertise. Such detailed assessments for each site (including Al-Suwaria site referred above) will be carried out based on a detailed inventory and site assessment to be carried out during implementation phase of the project and the sites within highest risks will be chosen for remediation. The Government of Iraq (GoI) and the PMU, will prepare necessary ESF instruments for all such sites where OPs and PCBs will be treated/ disposed and remediation and the project and will ensure that proper handling of POPs stockpiles while carrying out the remediation process is ensured. In addition, the Government/ Project will also engage in a robust stakeholder engagement process during the assessment and prioritization of sites and the design of remediation plans.

**Social Risk Rating**

Moderate

The Social Risk Rating is considered Moderate . Although the true extent of POPs and hazardous waste contaminated land in Iraq is yet to be confirmed, as indicated above, it is estimated that about 2,371,350 ha of land has been rendered unusable due to land mines and that at least a further 10,569 ha of land is polluted by hydrocarbons and other chemicals. This situation leads to health and safety impacts on local communities and potentially placing an additional burden on social welfare and health care systems that are already strained. The activities of the project aimed to dispose POPs and improve the management of these chemicals is expected to address these issues. In terms of impacts, based on the available information, implementation of various activities through the project are not expected to involve acquisition of private land and causes direct adverse social impacts. However, occupational health and safety impacts to the workers and local communities are likely during implementation. Also, many of the storage sites of OPs are located in the warehouses/ store yards and isolated industrial sites. Hence, no loss of agriculture revenue and livelihood impacts are anticipated. In fact, the agriculture revenue is expected to improve, after the issues of groundwater pollution and soil contamination are addressed through the POPs management activities proposed by the project. The overall social risk at this stage is Moderate , however the risk will be reassessed during preparation phase of the project based on more specific information on potential sites that may be available and confirmed at the appraisal stage. In line with the Bank's ESF requirements and complying to ESSs, appropriate E&S instruments will be prepared during implementation phase, for each of the sites prioritized where OPs and PCBs disposal is proposed. These instruments will evaluate all social risks including labor influx, child labor, gender-based aspects, discrimination, and impacts on local communities and appropriate mitigation measures will be recommended. Engagement of stakeholders in all phases of the project and periodic monitoring according to the World Bank Environmental and Social Framework will also be ensured. Overall project level and sub-project level functional Grievance Mechanism (GM) will also be established and communicated during the stakeholder consultations. It will also be ensured that the GM is available at implementing agency's website.

**B. Environment and Social Standards (ESSs) that Apply to the Activities Being Considered**

**B.1. General Assessment**

Public Disclosure



## ESS1 Assessment and Management of Environmental and Social Risks and Impacts

### **Overview of the relevance of the Standard for the Project:**

This standard is relevant as the project through activities under Components 1 and 2 will (i) identify stockpiles of OPs/ POPs, (ii) assess health and environmental risks at each of these locations, and (iii) identify priority locations for the disposal/destruction of OPs and POPs and appropriate rehabilitation/ remediation of the site(s). Disposal/destruction of about 1000 tons of OPs and 3000 tons of PCBs is envisaged by the project.

POPs are highly toxic and exposure can take place through diet, environmental exposure, or accidents. They negatively affect humans, plant and animal species, and natural ecosystems. The key project risks are anticipated during the collection, transport, handling, and disposal of the POPs and PCBs. Some health risks associated with the project activities are highlighted under the ESRC section.

The Republic of Iraq on March 8, 2016, signed the Stockholm Convention on Persistent Organic Pollutants (POPs) and it came into force on May 6, 2016, after completing the country's constitutional procedures. To comply with the Convention's requirements, the country initiated the preparation of the National Implementation Plan (NIP) in 2017 through a US\$800,000 GEF Grant (ID9690) with United Nations Environment Program (UNEP) as implementing agency. The NIP focused on initial POPs and doesn't include industrial POPs such as SCCP, PFOS, HBCD, etc.

In addition, Iraq has also signed many international conventions, developed many environmental policies and regulations to control the usage, storing, handling, and management of pesticides such as Law No. 47, 2012, Hazardous Waste Management Instructions No. (3) of 2015, Cabinet Resolution No. (3) of 2019 on the Solid Waste Management System, Safety instructions for storing and handling chemicals, No.4, 1989, Instructions No. 6, 1986 on how to handle escarole PCBs., etc. These legislations/ laws stipulate management and monitoring systems for using POPs. The project through Components 1 and 3 proposes to identify additional measures for strengthening and improvement of these regulations.

Based on current understanding, the capacity of the country to adequately handle POPs is weak. During the project preparation, further analysis will be carried out to ensure that the project activities through component 3 can contribute to enhancing this capacity with due consideration to the key priorities that the Project resources can cover.

The project will not be able to identify any specific site (s), for the disposal of OPs or PCBs during the preparation or by appraisal phase. This, as outlined in Para 24 of the PCN, is due to the fact that identification of any specific site (s) will involve (i) identification of stockpiles of OPs/ POPs through the national inventory proposed to be carried out through component 1 of the project, (ii) assessment of health and environmental risks at each of the identified locations and (iii) identifying priority locations (based on specific analysis of risks, sensitivity, cost and implementation time) for the disposal/destruction of OPs and rehabilitation/ remediation of the site(s). This would require expertise, infrastructure and international experience. Hence this will be carried out during the first year of the project implementation and sites with OP stockpiles totaling up to 1000 tons and PCBs of 3000 tons will be identified. One of the potential sites (Al-Suwaria warehouse) referred earlier will also go through this assessment process and chosen for remediation, if prioritized. Given that, carrying out these tasks requires significant financial and technical resources (and time) and is also one of the important objectives of mobilizing GEF grant resources, which will be



made available only after project approval. The actual disposal of OPs/ PCBs, thus is expected to be carried out in the second year of the project.

Overall E&S Approach: Considering the above, it is proposed to prepare an ESMF for all the activities of the project by appraisal and specific ESIA's will be prepared during implementation phase for the sites that will be identified after completing necessary technical and risk assessments, as explained above. Being a 'High' risk project, all such ESIA's will be submitted for RSA's review and clearance, before commencing the bidding process to hire the contractor for the disposal of OPs and PCBs at any particular site.

The ESMF will include E&S factors to be (i) considered in the identification/ prioritization of sites for PoPs disposal, (ii) integrated in carrying out field assessments; (iii) considered in the development of disposal and/ or remedial plans to reduce, mitigate and/or offset adverse risks and impacts, (iv) provisions for estimating and budgeting the cost of such measures, and information on the agency or agencies responsible for addressing project risks and impacts, including its capacity to manage environmental and social risks and impacts. The ESMF will also include adequate information on the area in which sub-projects are expected including potential environmental and social vulnerabilities of the area; potential impacts that may occur and mitigation measures that might be expected to be used. In addition the framework will clearly define the procedure to be followed for carrying out sub-project specific ESIA's/ ESMPs, their review, clearance, implementation, monitoring and reporting, institutional mechanisms for managing E&S issues in the project, Grievance Mechanisms and necessary budgetary allocations.

TA Activities: Sub-component 1.3 of the project focuses on establishing an enabling framework for POPs management in Iraq. As part of this, the project will assess policy, institutional and regulatory gaps for the implementation of NIP and other requirements of implementing the Stockholm convention. These activities are technical assistance in nature and do not involve any physical work on the ground. However, the establishment of policies and regulations under Component 1 may lead to downstream activities such as prevention and management, storage, handling and usage, remediation of sites contaminated by OPs, POPs, and PCBs, and hazardous chemicals. These downstream activities might have environmental and social risks and impacts. To address this aspect, the project as part of such TA activities will integrate E&S requirements and measures to address potential impacts/risks, as an integral part of policies and regulations that may be developed. In addition, the ESCP to be developed for the project will also include a commitment from the borrower to ensure that the TA activities shall only be undertaken pursuant to terms of reference reviewed and approved by the Bank. Such terms of reference shall ensure that the TA takes into account, and calls for the application of relevant provisions of ESSs and the borrower's own laws relating to the environmental and social aspects.

Impacts on Informal workers/ Waste Pickers: As indicated earlier, the storage sites of OPs are located in warehouses and industrial sites. Hence, these are not open dump sites and are not accessible to waste pickers and/ or informal workers. In many instances, these sites are protected by their respective public or private owners. In addition, given the nature of chemical substances and the risks associated with them, waste pickers do not collect these materials for recycling (except when they are dumped in open dumpsites). Despite this, the team will review this aspect (including any impacts on vulnerable groups) during the preparation phase and necessary measures/ strategies (including livelihood support or restoration plans, etc.) will be proposed in the ESMF and relevant site-specific ESIA's to be prepared during implementation. During the preparation of these documents, the borrower will conduct meaningful consultations with stakeholders and will prepare a robust grievance mechanism to handle complaints and concerns.

**Areas where "Use of Borrower Framework" is being considered:**



Borrower Framework will not be considered.

### **ESS10 Stakeholder Engagement and Information Disclosure**

This standard is relevant to this project. In order to ensure that a consistent, comprehensive, coordinated, and culturally appropriate approach is taken to stakeholder engagement and project disclosure, the Borrower will prepare and disclose a SEP acceptable to the Bank and disclose. Engaging with local communities is crucial to informing the prioritization exercise and laying the foundation for the activities under this project, this can be key to understanding the needs of local communities and vulnerable groups and draw upon as an important factor when identifying priority sites for remediation activities. Furthermore, stakeholder consultation is one of the important elements and it contributes to building trust between the government and local communities.

The project will hence dedicate sufficient time for local stakeholder consultations during the project lifecycle. This will comprise of two-level stakeholder consultations, one with the agencies such as MoE, Ministry of Oil (MoO), local governorates and the second with local communities to better understand the risks and economic development potential associated with the sites. The consultations with stakeholder agencies are proposed to be organized in a broader workshop, where the inventory of sites is presented, and the risks and prioritization criteria will be discussed. The modalities of the consultations with the local communities will depend on the security and COVID situation in the country and the level of access afforded to the consultant’s team to such field locations. If formal consultations are not feasible other techniques such as focus group discussions or surveys through questionnaires will also be considered. In all situations, the consultations will follow Bank’s technical note on “Public Consultations and stakeholder Engagement, March 2020”.

Based on the above exercise, the prioritization of sites will be further refined and the sites for detailed assessment and development of remediation plans will be identified. The project’s stakeholder engagement plan will include specific actions for all these components. The ESIA/ESMPs to be prepared for the PCBs decontamination will also include Emergency Respond Plan (ERP) and this will be disclosed to local communities. The SEP will be disclosed prior to Appraisal and it will be updated, as necessary, throughout the project cycle (preparation and/or implementation). A stakeholder grievance mechanism (GM), as part of SEP, is operationalized for the project to allow for feedback and complaints. As part of GM design, the Borrower will assign a focal point handling proper implementation of SEP, as well as ensuring that the GM is functioning with grievance log, timelines, and tracking system.

## **B.2. Specific Risks and Impacts**

**A brief description of the potential environmental and social risks and impacts relevant to the Project.**

### **ESS2 Labor and Working Conditions**

This standard is relevant to this project. The project will use various workers. The Borrower will prepare and disclose the Labor Management Procedures (LMP) by appraisal. The LMP is applicable to the project workforce, i.e. the direct workers comprising the staff/ PMU officials from (MoE), contracted workers comprising all consultants (individual and firms) hired by MoE, and contracted for various project activities. Primary supply workers include the workers/ staff of equipment and material supply agencies for various contractors involved in the project.



No community workers are anticipated to be involved at this stage of the project. If any need for the use of community workers is identified, this will be reflected in the LMP. Whereas any civil servants working on the project will remain subject to their existing public sector employment conditions. Given the high risk of exposure, major labor risks associated include health and safety risks such as exposure to physical, chemical and biological, hazardous materials during project implementation. The borrower will take steps to prevent accidents, injury, and disease arising from, associated with, or occurring in the course of work by minimizing, as far as reasonably practicable, the causes of hazards. The LMP will contain a specific section on the types of training the workers (content, frequency, etc.) on handling/disposal of hazardous wastes (including OP, POPs and PCBs). The national labor legislation in Iraq is largely consistent with the requirements of the ESS2, but in a few areas, gaps exist, which will be addressed in the LMP of the project. The Borrower will ensure that the contractors are legitimate and reliable entities and that they have in place labor management procedures applicable to the project that are compliant with this LMP including with the above-mentioned measures to bridge the gap between national legislation and the ESS2 requirements. Particular attention will be given to OHS which is key while handling POPs and PCBs.

The Borrower will ensure that no force labor or a persons under 18 allowed to work on project activities. A Code of Conduct acceptable to the Bank will be included in the LMP to mitigate the risk of harassment or misconduct SEA/SH risk in the workplace and in contact with communities. A redress mechanism for work-related grievances will be provided to project workers with necessary considerations for confidentiality.

### **ESS3 Resource Efficiency and Pollution Prevention and Management**

This standard is relevant to this project, as the project will contribute to the management of hazardous wastes by supporting the management of 1000 tons of OPs and 3000 tons of PCBs.

The Borrower will comply with the country requirements and international good practices for the management (including storage, transportation, and disposal of hazardous wastes) in compliance to the national legislations and applicable international conventions, including those relating to transboundary movement. Depending on site specific technical, economic and sustainability considerations, the project will support disposal and/ or treatment of POPs in country or abroad. To ensure compliance to ESS 3 requirements, the ESMF will lay out broader principles and guidelines in the selection of appropriate disposal strategies and these will be assessed in the respective site specific ESIA. These will include but not limited to socio-economic factors, the sensitivity of the surroundings, distance to ecosystems (rivers, habitat, etc.), E&S impacts of the proposed disposal strategy and mitigation measures required, etc.

Since, POPs are hazardous substances and the activities will be carried out contracting firms/ agencies, the Borrower/ PMU will hire agencies/ contractors/ consultants, who are reputable and legitimate enterprises licensed by relevant government and/ or international regulatory agencies. With respect to transportation, disposal of these substances the PMU will obtain chain of custody forms to the final destination and these will be documented appropriately.

Other potential impacts/risks associated with cleaning up activities (at stockpile sites) and transportation include inter alia contamination of soil from spills of PCBs and hazardous chemicals at the sampling, temporary storage and



treatment / disposal stages. These impacts/risks and the proportionate mitigation measures will be evaluated broadly in the ESMF and assessed specifically in the respective sub-project ESIA.

In case of sites with legacy pollution issues, the project will undertake a health and safety risk assessment of the level of pollution and its impacts on communities, workers, and the environment. Remediation of the site to address this pollution in addition to disposal of OPs will be carried out by the project to address the risks/ pollution in accordance with the GIIP.

#### **ESS4 Community Health and Safety**

This standard is relevant. Disposal of OPs and PCBs could cause negative impacts/risks during implementation and overall positive impacts after disposal/ remediation is complete, on the neighboring communities in term of health and safety. Obsolete pesticides are comprised of Persistent Organic Pollutants (POPs) which are considered some of the most dangerous pollutants for human health and the environment. POPs have four distinct characteristics: (i) they are toxic, causing adverse health effects, such as birth defects, and damage to immune and respiratory systems; (ii) they are environmentally persistent and resist breakdown by natural processes, and can remain in the environment for decades; (iii) they bio-accumulate exponentially up the food chain, reaching the greatest magnitudes in mammals and humans; and (iv) they are semi-volatile, which enables them to travel great distances through cycles of evaporation and atmospheric cycling and deposition. Broad measures, based on the nature and type of OPs and PCBs proposed to be handled and the proportionate and commensurate mitigation measures will be covered in the Environmental and Social Management Framework (ESMF) and must meet ESS4 requirements. Moreover, through its Code of Conduct, PMU will set itself a framework of ethical standards and rules, which is going to be binding for all staff. The Code of Conduct lays down provisions that help to deal with conflicts of interest and to prevent corruption at an early stage. PMU staff must agree to adhere to the Code of Conduct under the terms of their employment contracts. The code of conduct will be signed by all project workers and contractors as well.

No significant risks related to labor influx are expected due to the project, as the most project workers are expected to be recruited locally and influx of workers will be limited to a small number on international experts.

The Borrower will work closely with traffic monitoring entities in order to provide road safety. Hazardous materials will be controlled so as to avoid their open access/ exposure to the communities. As the transport of Hazardous materials is anticipated, an Emergency Response Plan will be prepared as part of the ESIA/ESMP. Also, the Borrower will be responsible for addressing grievances of the local communities.

With regard to SEA/SH risks, the LMP will prescribe the inclusion of a Code of Conduct in contracts and associated training as well as the setting up of a Grievance Mechanism with a special track for processing complaints related to SEA/SH.

Other risks/impacts might result from clean-up sites, including accidents and fires that may impact communities that may reside in the area or depend on resources that may contaminate as a result of clean-up activities. Hazards and threats to community health and safety will be further assessed in the ESMF and ESIA that will be prepared for the project activities. During the transport of the hazardous material, the Borrower might need the use of security forces



to escort the convoys. The project will therefore comply with the WB guidelines on the use of security forces. The Project ESIA's will provide relevant provisions related to the use of security forces if needed.

#### **ESS5 Land Acquisition, Restrictions on Land Use and Involuntary Resettlement**

No land acquisition is anticipated for the project activities and therefore no impacts of resettlement are anticipated, as all the project activities will be carried out in the existing storage sites/facilities owned by the the Government and other agencies. This would also be applicable for temporary and/ or intermediate storage facilities that may be required for some sites, before the POPs are transported for disposal or decontamination. No economic displacement/ livelihood impacts are also anticipated either to the local communities or to the informal workers/ waste pickers. This is due to the fact that (i) OPs are hazardous substances stored in in warehouses/ storage sites; and (ii) PCBs are found in electric transformers and other instruments, not easily accessible to waste pickets and others. Thus, it is not expected that the project activities will generate negative impacts covered under ESS5. However, a further analysis of these issues will be carried out during the preparation of the ESMF and any specific measures/ actions needed will be identified. In addition, sub-project/ site specific ESIA's to be carried out during the implementation phase of the project will also assess these impacts, including any impacts on land use and will recommend ESMPs appropriately.

#### **ESS6 Biodiversity Conservation and Sustainable Management of Living Natural Resources**

This standard is relevant. The project activities (based on current information) are not expected to cause adverse risks and impacts on habitats and the biodiversity, as most of the works will be done at the existing warehouses/ storage sites, electric sub-stations and transformer sites. However, accidental spills during decontamination/ remediation process or during transport of OPs for disposal, could impact biodiversity and natural habitats. A broad level of assessment (based on the geographic location of biodiversity resources vis-à-vis possible POPs location) of project activities on biodiversity and natural resources will be carried out in the ESMF and more specific assessment will be carried in the location specific ESIA's to be carried out during the implementation.

#### **ESS7 Indigenous Peoples/Sub-Saharan African Historically Underserved Traditional Local Communities**

ESS7 is not relevant.

#### **ESS8 Cultural Heritage**

ESS8 is not relevant for this project. No direct impact on cultural heritage nor new cultural artifacts are expected.

#### **ESS9 Financial Intermediaries**

ESS 9 is not relevant for the Project because its implementation arrangements do not consider involvement of any financial intermediaries.



**B.3 Other Relevant Project Risks**

Given the security situation in Iraq, ‘Conflict and Violence’ is another risk factor that need to be considered for the overall project. In addition, continuing COVID 19 pandemic poses challenges to project preparation. To mitigate these risks and as outlined in the concept note, the Bank team will adopt flexible approaches such as (i) virtual missions; (ii) reverse preparation and implementation missions in Jordan or Beirut; (iii) explore alternate implementation arrangements such as deployment of Third-Party Monitoring Agencies (TPMA) both for the project activities also for E&S implementation; (iv) consider access restrictions and quickly adapt to changing circumstances on the ground. The team will also rely on WBG’s security assessments and FCV monitoring systems and plan project preparation and implementation, accordingly.

**C. Legal Operational Policies that Apply**

<b>OP 7.50 Projects on International Waterways</b>	No
<b>OP 7.60 Projects in Disputed Areas</b>	No

**III. WORLD BANK ENVIRONMENTAL AND SOCIAL DUE DILIGENCE**

**A. Is a common approach being considered?** No

**Financing Partners**

Grant from Global Environmental Facility (GEF) will be the main financier of the project along with appropriate counterpart financing, as required by the GEF.

**B. Proposed Measures, Actions and Timing (Borrower’s commitments)**

**Actions to be completed prior to Bank Board Approval:**

- Prepare and disclose the Environmental and Social Framework (ESMF)
- 2. Prepare and disclose Stakeholder Engagement Plan (SEP)
- 3. Prepare and disclose Labor Management Procedures (LMP)
- 4. Prepare and disclose the Environmental and Social Commitment Plan ( ESCP)

**Possible issues to be addressed in the Borrower Environmental and Social Commitment Plan (ESCP):**

- 1. Preparation and Implementation of the sub-project project specific ESIA/ESMPs in a timely manner and integration of the recommended ESMP in the bidding documents.
- 2. Ensuring the implementation of the SEP and LMP and their updating as needed.
- 3. Preparation and implementation of the SEA/SH Prevention and Response Plan, to the specific sites (if needed)
- 4. Preparation and implementation of Emergency Management Plan as part of the ESIA/ESMPs.
- 5. Ensuring that each contractor prepares and implements site specific/ design specific ESMPs for OPs and PCBs

Public Disclosure



6. Dedicated full-time E&S specialist at the PMU/ MoE to ensure implementation of ESF requirements, preparation of E&S instruments, implementation of ESIA/ ESMP measures, overall monitoring of ESS implementation and identification and implementation of corrective measures where needed

**C. Timing**

**Tentative target date for preparing the Appraisal Stage ESRS**

03-Apr-2023

**IV. CONTACT POINTS**

**World Bank**

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**Borrower/Client/Recipient**

Borrower: Ministry of Finance

**Implementing Agency(ies)**

Implementing Agency: Ministry of Environment

**V. FOR MORE INFORMATION CONTACT**

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**VI. APPROVAL**

Task Team Leader(s):	Harinath Sesha Appalarajugari
Practice Manager (ENR/Social)	Chaogang Wang Recommended on 29-Jul-2022 at 09:25:27 GMT-04:00
Safeguards Advisor ESSA	Aki Tsuda (SAESSA) Cleared on 29-Jul-2022 at 12:49:25 GMT-04:00

Public Disclosure