



# Safeguard Risk Identification Form (SRIF)

## Section 1: Project Overview

<b>Identification</b>	<i>Insert Project ID# from Programme Framework Table</i> AF-2021000143 CTCN- 2021000028
<b>Project Title</b>	<i>Insert title (adding words 'project preparation proposal for' before title)</i> Development of a Multi-Hazard Platform for forecasting Local level climate extremes and physical hazards for Iskandar Malaysia
<b>Managing Division</b>	UNEP –Industry and Economic Division – CTCN
<b>Type/Location</b>	<i>[Global/Normative; Regional; National]</i> Sub-national (Iskandar province)
<b>Region</b>	<i>(Africa/ Europe/ North America/ Asia Pacific/ Latin America Caribbean/ West Asia)</i> Asia Pacific
<b>List Countries</b>	<i>Enter country name(s)</i> Malaysia
<b>Project Description</b>	<p>Malaysia’s geographic location and low poverty rates mean both its risk and vulnerability to natural hazards, including climate change, are lower than some of its Southeast Asian neighbours. Nonetheless, Malaysia suffers high average annual losses. In 2014 UNISDR estimated these at around \$1.3 billion. While Malaysia can experience drought, landslides, earthquakes, and storm surges, most of its losses are attributable to flooding. Flood risk in urban areas is rising. Growing urban populations are particularly exposed to flash floods driven by high intensity rainfall. In addition, coastal vulnerability has been increasing because of sea-level rise. Storm surge, coastal erosion, and saline intrusion present increasing threats to the development of Malaysia’s coastal zones, including fast growing coastal areas which are critical to the country’s economic development. Iskandar Malaysia (IM) is one such fastest growing economic zone in the southern tip of peninsular Malaysia which is vulnerable to the disasters due to rapid urbanization and increasing population and exposure to the coastal hazards. Iskandar Regional Development Authority (IRDA) through the National Designated Entity of Malaysia has requested CTCN Technical Assistance (TA) for the Development of a Multi-Hazard Platform (MHP) for forecasting Local level climate extremes and physical hazards for Iskandar Malaysia. While the project will be building upon the experiences from an operational MHP that is established for Kuala Lumpur, the scope of this TA will bring in a new component, focusing on coastal hazards. The TA will aim to localize the weather forecasting through MHP and build local capacity of IM to develop technical and financial specifications to deploy an MHP. The TA will deliver a prototype decision support tool which will demonstrate how MHP for five zones of IM can help address growing climate change risks of this important coastal economic zone. The TA demonstrates strong linkages with NDC and national priorities.</p>
<b>Relevant Subprogrammes</b>	/
<b>Estimated duration of project</b>	<i>Provide the estimate in months from project kickoff to completion. Do not include time spent on concept or design.</i> 18 months
<b>Estimated cost of the project</b>	<i>Provide the estimated cost for entire project in USD.</i> USD 237,850.



<b>Name of the UNEP project manager responsible</b>	Clara Landeiro
<b>Funding Source(s)</b>	AFCIA
<b>Executing/Implementing partner(s)</b>	CTCN
<b>SRIF submission version</b>	<i>If it is not the first time, mark the time of your previous submission</i> <i>Concept Review [ ] During Project development [ ] PRC [ ]</i> <i>Other _____</i> Version 1
<b>Safeguard-related reports prepared so far</b>  <i>(Please attach the documents or provide the hyperlinks)</i>	<ul style="list-style-type: none"> <li>• <i>Feasibility report [ ]</i></li> <li>• <i>Gender Action Plan [ ]</i></li> <li>• <i>Stakeholder Engagement Plan [ ]</i></li> <li>• <i>Safeguard risk assessment or impact assessment [ ]</i></li> <li>• <i>ES Management Plan or Framework [ ]</i></li> <li>• <i>Indigenous Peoples Plan [ ]</i></li> <li>• <i>Cultural Heritage Plan [ ]</i></li> <li>• <i>Others _____</i></li> </ul>

## Section 2: Safeguards Risk Summary

### A. Summary of the Safeguards Risk Triggered

Safeguard Standards Triggered by the Project	Impact of Risk <sup>1</sup> (1-5)	Probability of Risk (1-5)	Significance of Risk (L, M, H)  <i>Please refer to the matrix below</i>
SS 1: Biodiversity, Ecosystems and Sustainable Natural Resource Management	1	1	L
SS 2: Climate Change and Disaster Risks	2	2	L
SS 3: Pollution Prevention and Resource Efficiency	1	1	L
SS 4: Community Health, Safety and Security	1	1	L
SS 5: Cultural Heritage	1	1	L
SS 6: Displacement and Involuntary Resettlement	1	1	L
SS 7: Indigenous Peoples	1	1	L
SS 8: Labor and working conditions	1	1	L

### B. ESS Risk Level<sup>2</sup> -

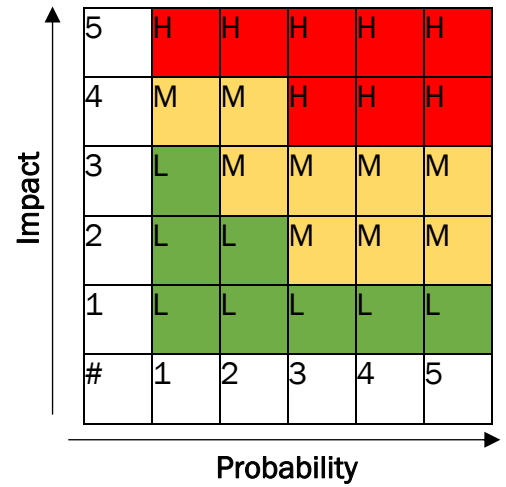
<sup>1</sup> Refer to UNEP Environmental and Social Sustainability Framework (ESSF): Implementation Guidance Note to assign values to the Impact of Risk and the Probability of Risk to determine the overall significance of Risk (Low, Moderate or High).

<sup>2</sup> **Low risk:** Negative impacts minimal or negligible: no further study or impact management required.  
**Moderate risk:** Potential negative impacts, but limited in scale, not unprecedented or irreversible and generally limited to programme/project area; impacts amenable to management using standard mitigation measures;



Refer to the UNEP ESSF (Chapter IV) and the UNEP’s ESSF Guidelines.

- Low risk
- Moderate risk
- High risk
- Additional information required



### C. Development of SRIF and Screening Decision

#### Prepared by

Name: Clara Landeiro Date: 17 October 2023

#### Screening review by

Name: Polycarp Odiedo Date: 30/10/2023

Cleared<sup>3</sup>

### D. Safeguard Review Summary (by the safeguard team)

This is a low-risk project. However, UNEP ESSF guiding principles - resilience and sustainability; human rights, gender equality and women empowerment, accountability and leave no one behind – as outlined in section 3 are still applicable for low-risk projects.

### A. Safeguard Recommendations (by the safeguard team)

- No specific safeguard action required
- Take Good Practice approach<sup>4</sup>

limited environmental or social analysis may be required to develop an Environmental and Social Management Plan (ESMP). Straightforward application of good practice may be sufficient without additional study.

**High risk:** Potential for significant negative impacts (e.g., irreversible, unprecedented, cumulative, significant stakeholder concerns); Environmental and Social Impact Assessment (ESIA) (or Strategic Environmental and Social Assessment (SESA)) including a full impact assessment may be required, followed by an effective comprehensive safeguard management plan.

<sup>3</sup> This is signed only for the full projects latest by the PRC time.

<sup>4</sup> Good practice approach: For most low-moderate risk projects, good practice approach may be sufficient. In that case, no separate management plan is necessary. Instead, the project document demonstrates safeguard



- Carry out further assessments (e.g., site visits, experts' inputs, consult affected communities, etc.)
- Carry out impact assessments (by relevant experts) in the risk areas and develop management framework/plan
- Consult Safeguards Advisor early during the full project development phase
- Other \_\_\_\_\_

### Section 3: Safeguard Risk Checklist

Screening checklist	Y/N/ Maybe	Justification for the response (please provide answers to each question)
<b>Guiding Principles</b> (these questions should be considered during the project development phase)		
GP1 Has the project analyzed and stated those who are interested and may be affected positively or negatively around the project activities, approaches or results?	Y	The project, in consultation the Ministry of Environment and Water (NDE) and Iskandar Regional Development Authority - IRDA (Proponent), has analyzed and identified stakeholders who are interested and may be positively or negatively impacted by the project implementation. Their input is incorporated in the implementation plan of this project. This analysis and stakeholder engagement will be further complemented at the start of implementation. The participation of women and youth will be proactively ensured throughout the implementation as per UN/CTCN rules.
GP2 Has the project identified and engaged vulnerable, marginalized people, including disabled people, through the informed, inclusive, transparent and equal manner on potential positive or negative implication of the proposed approach and their roles in the project implementation?	Y	The project has identified key stakeholders at the design stage, which will be complemented as project implementation starts and which will guide consultations throughout the implementation of the project. The project also includes a strong component of development of local capacities, including a capacity gap assessment which will consider vulnerable groups to be included in the gender-sensitive capacity building plan.

management approach in the project activities, budget, risks management, stakeholder engagement or/and monitoring segments of the project document to avoid or minimize the identified potential risks without preparing a separate safeguard management plan.





<p>GP3 Have local communities or individuals raised human rights or gender equality concerns regarding the project (e.g., during the stakeholder engagement process, grievance processes, public statements)?</p>	<p>N</p>	<p>No concerns have been raised on human rights or gender equality during the development of the proposed project. These communities have expressed their anticipation for the implementation of this project that would assess financing needed to develop a fully operational multi hazard platform integrated with impact-based forecasting and develop local capacity and awareness.</p>
<p>GP4 Does the proposed project consider gender-balanced representation in the design and implementation?</p>	<p>Y</p>	<p>Gender balanced representation has been considered in the design of the project. This is part of the CTCN gender policy and action plan that was approved by the AB. The gender policy adopted addresses the fact that women are underserved when it comes to technologies and capacity development, so historical imbalances need to be corrected, and equal/equitable opportunity must be given to men and women. All CTCN Technical Assistancess are in line with the adopted gender policy and are implemented i with the engagement of at least one gender expert and with a minimum percentage of the project costs allocated towards gender and youth as mandatory requirements.</p>
<p>GP5 Did the proposed project analyze relevant gender issues and develop a gender responsive project approach?</p>	<p>Y</p>	<p>Gender has been considered in the design of the activities of the project proposal. The project team consists of one gender expert out of a team of 6 experts, who will ensure gender mainstreaming in all activities of the project, including through consultations and in the development of the gender-sensitive capacity building plan.</p>
<p>GP6 Does the project include a project-specific grievance redress mechanism? If yes, state the specific location of such information.</p>	<p>Y</p>	<p>A specific grievance redress mechanism will be put in place through UNEP<sup>5</sup>. The project will also respect the Adaptation Fund’s 15 safeguard principles.</p>
<p>GP7 Will or did the project disclose project information, including the safeguard documents? If yes, please list all the webpages where the information is (or will be) disclosed.</p>	<p>Y</p>	<p>Safeguards documents will be uploaded after approval onto the <a href="#">CTC-N webpage</a> and <a href="#">www.open.unep.org</a></p>
<p>GP8 Were the stakeholders (including affected communities) informed of the projects and grievance redress mechanism? If yes, describe how they were informed.</p>	<p>N</p>	<p>Not yet, but this will be done as soon as the grievance redress mechanism has been established, at the start of project implementation. The grievance redress mechanism will follow UNEP rules and procedures and will also be aligned with Adaptation Fund requirements.</p>



<p>GP9 Does the project consider potential negative impacts from short-term net gain to the local communities or countries at the risk of generating long-term social or economic burden?<sup>6</sup></p>	<p>N</p>	<p>Though the project considers all potential impacts, no short- or long-term negative social or economic impacts are foreseen from the implementation of this project. On the contrary, the implementation of this project is expected to lead to the positive impacts (both short- and long-term) due to the development of a Multi-Hazard Platform for forecasting Local level climate extremes and physical hazards which will lead to better planning and reduced impact of hazardous events.</p>
<p>GP10 Does the project consider potential partial economic benefits while excluding marginalized or vulnerable groups, including women in poverty?</p>	<p>N</p>	<p>The project presents potential economic benefits with the development of the Multi Hazard Platform (MHP) which will be useful for forecasting local level climate extremes and physical hazards that can help minimize hazard induced losses on property and people. The response plan includes marginalized and vulnerable groups, including women in poverty specifically through output 4 which focuses on building gender-sensitive institutional and technical capacities to implement the MHP with impact-based forecasting. A gender sensitive capacity building plan will be developed for targeted groups as the part of this output.</p>
<p><b>Safeguard Standard 1: Biodiversity, Ecosystems and Sustainable Natural Resource Management</b></p>		
<p><i>Would the project potentially involve or lead to:</i></p>		
<p>1.1 conversion or degradation of habitats (including modified habitat, natural habitat and critical natural habitat), or losses and threats to biodiversity and/or ecosystems and ecosystem services?</p>	<p>N</p>	<p>No conversion or degradation of habitats and ecosystems are foreseen. On the contrary, the project aims to enhance resilience to natural hazards, including floods and droughts, through the development of a Multi-hazard Platform for five zones of Iskandar Malaysia.</p>
<p>1.2 adverse impacts specifically to habitats that are legally protected, officially proposed for protection, or recognized as protected by traditional local communities and/or authoritative sources (e.g., National Park, Nature Conservancy, Indigenous Community Conserved Area, (ICCA); etc.)?</p>	<p>N</p>	<p>The project will have no negative impact to habitats, legally protected or otherwise, as it aims to deliver a prototype decision support tool which will demonstrate how Multi hazard Platform for five zones of Iskandar Malaysia can help address growing climate change risks of this important coastal economic zone, including any of the existing habitats.</p>
<p>1.3 conversion or degradation of habitats that are identified by authoritative sources for their high conservation and biodiversity value?</p>	<p>N</p>	<p>None.</p>
<p>1.4 activities that are not legally permitted or are inconsistent with any officially recognized management plans for the area?</p>	<p>N</p>	<p>None.</p>

<sup>6</sup>For example, a project may consider investing in a commercial shrimp farm by clearing the nearby mangrove forest to improve the livelihood of the coastal community. However, long term economic benefit from the shrimp farm may be significantly lower than the mangroves if we consider full costs factoring safety from storms, soil protection, water quality, biodiversity and so on.



1.5	risks to endangered species (e.g., reduction, encroachment on habitat)?	N	The project does not pose risk to endangered species. Instead, the prototype decision support tool to be developed in the project will demonstrate how Multi hazard Platform for five zones of Iskandar Malaysia can help address growing climate change risks of this important coastal economic zone.
1.6	activities that may result in soil erosion, deterioration and/or land degradation?	N	None. The project will deliver a prototype decision support tool which will demonstrate how Multi hazard Platform for five zones of Iskandar Malaysia can help address growing climate change risks of this important coastal economic zone
1.7	reduced quality or quantity of ground water or water in rivers, ponds, lakes, other wetlands?	N	The project will have no impact on the quality and quantity of ground water. In the long term, the improved information system will more informed decisions with respect to water resources management in Iskandar Malaysia.
1.8	reforestation, plantation development and/or forest harvesting?	N	None. The project does not involve any on the ground implementation activities, including reforestation, plantation development and/or forest harvesting.
1.9	support for agricultural production, animal/fish production and harvesting	Y	The project is expected to increase access to information on multiple hazards and provide a prototype decision support tool which will demonstrate how a Multi-Hazard Platform for five zones of Iskandar Malaysia can help address growing climate change risks of this important coastal economic zone.
1.10	introduction or utilization of any invasive alien species of flora and fauna, whether accidental or intentional?	N	No.
1.11	handling or utilization of genetically modified organisms?	N	No.
1.12	collection and utilization of genetic resources?	N	No.
<b>Safeguard Standard 2: Climate Change and Disaster Risks</b>			
<i>Would the project potentially involve or lead to:</i>			
2.1	improving resilience against potential climate change impact beyond the project intervention period?	Y	The project will lead to increased resilience of communities in Iskandar Malaysia against potential climate change impacts beyond the project intervention period. Iskandar Malaysia (IM) is one the fastest growing economic zones in the southern tip of peninsular Malaysia which is vulnerable to the disasters due to rapid urbanization and increasing population and exposure to the coastal hazards. The proposed technology will help to provide techniques to adapt to climate change and provide practical knowledge and skills to undertake effective forecasting of local level climate extremes and physical hazards which will lead to better planning and reduced impact of hazardous events.





2.2	areas that are now or are projected to be subject to natural hazards such as extreme temperatures, earthquakes, extreme precipitation and flooding, landslides, droughts, severe winds, sea level rise, storm surges, tsunami or volcanic eruptions in the next 30 years?	Y	The project involves Iskandar Malaysia (IM) region, one the fastest growing economic zone in the southern tip of peninsular Malaysia, which is increasingly vulnerable to climate hazards, a situation that is aggravated due to rapid urbanization and growing population and exposure to the coastal hazards.
2.3	outputs and outcomes sensitive or vulnerable to potential impacts of climate change (e.g., changes in precipitation, temperature, salinity, extreme events)?	N	No.
2.4	local communities vulnerable to the impacts of climate change and disaster risks (e.g., considering level of exposure and adaptive capacity)?	Y	The project will involve local communities in the region of Iskandar Malaysia which are impacted by climate and other natural hazards. In this region, flooding accounts for the most frequent and significant damage and is responsible for a significant number of human lives lost, disease epidemics, property and crop damage, and other losses in Malaysia. The coastal communities of Iskandar Malaysia (IM) economic region in the State of Johor are also at risk of flooding due to sea-level rise. The development of the MHP will positively impact the local communities through improved preparedness.
2.5	increases of greenhouse gas emissions, black carbon emissions or other drivers of climate change?	N	This is an adaptation project and will have no impact on emissions.
2.6	Carbon sequestration and reduction of greenhouse emissions, resource-efficient and low carbon development, other measures for mitigating climate change	N	This is an adaptation project and will have no impact on emissions.

**Safeguard Standard 3: Pollution Prevention and Resource Efficiency**

<i>Would the project potentially involve or lead to:</i>			
3.1	the release of pollutants to the environment due to routine or non-routine circumstances with the potential for adverse local, regional, and/or transboundary impacts?	N	Not applicable.
3.2	the generation of waste (both hazardous and non-hazardous)?	N	Not applicable.
3.3	the manufacture, trade, release, and/or use of hazardous materials and/or chemicals?	N	Not applicable.
3.4	the use of chemicals or materials subject to international bans or phase-outs? (e.g. DDT, PCBs and other chemicals listed in international conventions such as the <a href="#">Montreal Protocol</a> , <a href="#">Minamata Convention</a> , <a href="#">Basel Convention</a> , <a href="#">Rotterdam Convention</a> , <a href="#">Stockholm Convention</a> )	N	Not applicable.
3.5	the application of pesticides or fertilizers that may have a negative effect on the environment (including non-target species) or human health?	N	Not applicable.
3.6	significant consumption of energy, water, or other material inputs?	N	Not applicable.

**Safeguard Standard 4: Community Health, Safety and Security**





<i>Would the project potentially involve or lead to:</i>		
4.1	the design, construction, operation and/or decommissioning of structural elements such as new buildings or structures (including those accessed by the public)?	N None.
4.2	air pollution, noise, vibration, traffic, physical hazards, water runoff?	N None.
4.3	exposure to water-borne or other vector-borne diseases (e.g., temporary breeding habitats), communicable or noncommunicable diseases?	N None.
4.4	adverse impacts on natural resources and/or ecosystem services relevant to the communities' health and safety (e.g., food, surface water purification, natural buffers from flooding)?	N None. On the contrary, positive impacts are foreseen in terms of increased resilience of local communities in Iskandar Malaysia.
4.5	transport, storage use and/or disposal of hazardous or dangerous materials (e.g., fuel, explosives, other chemicals that may cause an emergency event)?	N Not applicable.
4.6	engagement of security personnel to support project activities (e.g., protection of property or personnel, patrolling of protected areas)?	N No.
4.7	an influx of workers to the project area or security personnel (e.g., police, military, other)?	N No.
<b>Safeguard Standard 5: Cultural Heritage</b>		
<i>Would the project potentially involve or lead to:</i>		
5.1	activities adjacent to or within a Cultural Heritage site?	N Not applicable. The project involves working with information systems and key stakeholders; no activities will be implemented on the ground which could pose a risk to cultural heritage.
5.2	adverse impacts to sites, structures, or objects with historical, cultural, artistic, traditional, or religious values or to intangible forms of cultural heritage (e.g., knowledge, innovations, practices)?	N Not applicable.
5.3	utilization of Cultural Heritage for commercial or other purposes (e.g., use of objects, practices, traditional knowledge, tourism)?	N Not applicable.
5.4	alterations to landscapes and natural features with cultural significance?	N Not applicable.
5.5	significant land clearing, demolitions, excavations, flooding?	N Not applicable.
5.6	identification and protection of cultural heritage sites or intangible forms of cultural heritage?	N Not applicable.
<b>Safeguard Standard 6: Displacement and Involuntary Resettlement</b>		
<i>Would the project potentially involve or lead to:</i>		
6.1	full or partial physical displacement or relocation of people (whether temporary or permanent)?	N Not applicable. The project supports the development of a Multi-Hazard Platform and Decision Support Systems to improve resilience of local communities. It will not involve or lead to displacement or relocation of people (with the possible exception of those who decide themselves to move/relocate in response to e.g. new



		information on high level of exposure to climate hazards).
6.2 economic displacement (e.g., loss of assets or access to assets affecting for example crops, businesses, income generation sources)?	N	Not applicable.
6.2 involuntary restrictions on land/water use that deny a community the use of resources to which they have traditional or recognizable use rights?	N	Not applicable.
6.3 risk of forced evictions?	N	Not applicable.
6.4 changes in land tenure arrangements, including communal and/or customary/traditional land tenure patterns (including temporary/permanent loss of land)?	N	Not applicable.
<b>Safeguard Standard 7: Indigenous Peoples</b>		
<i>Would the project potentially involve or lead to:</i>		
7.1 areas where indigenous peoples are present, or uncontacted or isolated indigenous peoples inhabit or where it is believed these peoples may inhabit?	N	Not applicable. As mentioned, the project will develop a software/online platform which will not have negative impact on the population.
7.2 activities located on lands and territories claimed by indigenous peoples?	N	Not applicable.
7.3 impacts to the human rights of indigenous peoples or to the lands, territories and resources claimed by them?	N	Not applicable.
7.4 the utilization and/or commercial development of natural resources on lands and territories claimed by indigenous peoples?	N	Not applicable.
7.5 adverse effects on the development priorities, decision making mechanisms, and forms of self-government of indigenous peoples as defined by them?	N	Not expected. On the contrary, in the future, beyond the completion of the project, it is expected that new Multi-Hazard platform would be accessible to all in Iskandar Malaysia, with a positive effect in terms of their ability to cope with climate change and other natural hazards.
7.6 risks to the traditional livelihoods, physical and cultural survival of indigenous peoples?	N	Not applicable.
7.7 impacts on the Cultural Heritage of indigenous peoples, including through the commercialization or use of their traditional knowledge and practices?	N	Not applicable.
<b>Safeguard Standard 8: Labor and working conditions</b>		
8.1 Will the proposed project involve hiring or contracting project staff ?	Y	Yes. The implementer will be a network member selected through the bidding process under UNGM and will be mandated to respect the UN code of conduct rules and will meet all the requisites.
<i>If the answer to 8.1 is yes, would the project potentially involve or lead to:</i>		
8.2 working conditions that do not meet national labor laws or international commitments (e.g. ILO conventions)?	N	No.
8.3 the use of forced labor and child labor?	N	No.
8.4 occupational health and safety risks (including violence and harassment)?	N	No.
8.5 the increase of local or regional unemployment?	N	No.



8.6 suppliers of goods and services who may have high risk of significant safety issues related to their own workers?	N	No.
8.7 unequal working opportunities and conditions for women and men	N	No.