

Project Document
China



Project Title: UNDP SDG Innovation Pilot Project on Climate and Disaster Resilience (Tongji University)

Project Number: 01003090

Implementation Partner: China International Centre for Economic and Technical Exchanges (CICETE)

Start Date: June 2025

End Date: June 2028

LPAC Meeting Date: April 2025

Brief Description

Cities worldwide are responsible for over 70 percent greenhouse gas emissions, and by 2050, it is projected that 68 percent of the global population will reside in urban areas. As urbanization accelerates, the impact of climate change will intensify, presenting large and medium-scale cities with increasingly complex challenges. These include more frequent natural and man-made disasters, and escalating pollution and waste. Nevertheless, cities are at the forefront of exploring new innovative approaches to build greener and more inclusive pathways for the future cities.

For China, building resilient cities is a cornerstone of the 14th Five-Year Plan, which outlines the country's development goals and strategies from 2021 to 2025. The plan emphasizes sustainable and green development, focusing on environmental conservation, resource efficiency, and addressing climate challenges. Resilient cities are designed to withstand and adapt to various shocks and stresses, including those related to climate change, natural disasters, and other unforeseen events, ensuring their long-term sustainability and vitality.

In this context, Shanghai, China's mega-city and financial capital, faces emerging challenges and opportunities. In its 2035 Masterplan, the city outlines its commitment to becoming a more adaptable and resilient eco-city as well as a benchmark for international megacities in terms of green, low-carbon and sustainable development by developing pilot spaces and infrastructures, including ramping up the city's resilience to natural disasters and establishing an urban disaster prevention and mitigation system to safeguard urban security.

Tongji University is one of Shanghai's top academic institutions, and its College of Civil Engineering is globally recognized, with a history of over a century. In 2023, it went through a restructuring and consequently the State Key Laboratory of Disaster Reduction in Civil Engineering has been approved. It plays a leading role in supporting national strategic research and building a top international research center in the field of disaster reduction in civil engineering.

The laboratory aims to address and provide innovative solutions to major challenges such as lifecycle-based disaster prevention, multi-hazard mitigation, smart disaster mitigation, and resilience-oriented disaster prevention in mega-city infrastructure system. Additionally, it is designed to explore solutions and policy tools for building resilient cities in Shanghai, across China, and globally.

Building on the foundation of the State Key Laboratory of Disaster Reduction in Civil Engineering, this project aims to support the establishment and long-term development of the UNDP SDG Innovation Lab on Climate and Disaster Resilience (Tongji University)

(Hereinafter referred to as the “UNDP China - Tongji Lab”. Specialized conferences, discussions training programs, and joint research initiatives will be organised to design cutting-edge and scalable technological solutions. Meanwhile, policy innovations will be explored to provide valuable references and support for urban resilience construction. The project also aims to share advanced Chinese urban development concepts with other developing countries most affected by climate change, jointly strengthening global urban resilience and sustainable development. The lab’s sustainable operation will be ensured beyond the project’s duration.

The UNDP China - Tongji Lab will be dedicated to enhancing Tongji University's impact in the fields of urban disaster reduction and resilience capacity building. It will explore new possibilities to strengthen the resilience of large cities, particularly Shanghai, positioning it as a model for other cities in China. This aligns with the objectives of China’s 14th Five-Year Plan, contributing to the country’s deeper integration into the international community. It will also support Tongji University, national and local governments in sharing China's experiences and best practices with other developing countries, reinforcing the country’s commitment to the 2030 Agenda for Sustainable Development and the SDGs.




Contributing Outcome (CPD):
 Outcome 3: People in China and the region benefit from a healthier and more resilient environment.

Indicative Output(s) with Gender Marker:
 Output: Women are vital in disaster risk management and resilience-building but are often excluded from shaping policies. Despite being among the first responders and leaders in post-disaster recovery, they face greater vulnerability due to more limited access to information and resources. Fully utilizing and enhancing women’s capacities, knowledge, and skills, and increasing their involvement in decision-making is essential for building secure and resilient urban communities.

Gender Marker: GEN2

Total Resources Required:		CNY 12,000,000 (Equivalent 1,600,000 USD)
Total Resources Allocated:	University - College of Civil Engineering - Tongji University:	CNY 9,000,000 (Equivalent 1,200,000 USD)
	In-kind:	N/A
Unfunded:		CNY 3,000,000 (Equivalent 400,000 USD)

Signatory (Signature):

China International Center for Economic and Technical Exchanges	United Nations Development Programme	Tongji University
 LI Shuyin Deputy Director General of CICETE	Signed by:  13DCF1F2482C44B... James George UNDP Deputy Resident Representative in China	签署人:  9E900DE4B2AB401... ZHOU Ying Dean, College of Civil Engineering at Tongji University
Date: 2025/06/09	Date: 02-Jun-2025	Date: 02-6-2025

I . DEVELOPMENT CHALLENGE

1.1 Context

Urbanization is one of the defining trends of the 21st century, with more than half of the world's population (55%) living in urban areas, a figure projected to rise to 68% by 2050. While urbanization brings economic transformation and development it also exposes, especially in developing regions, to significant vulnerabilities under climate change and disasters such as extreme heat, floods, droughts, rising sea levels, air pollution, earthquakes etc. Over the past 30 years, 90% of disasters have been linked to extreme weather events, highlighting the growing impact of climate change.

China stands at the forefront of this urban transformation, having undergone one of the fastest urbanization shifts in history. According to the World Bank, the country's urban population rose from 18% to over 64% in 2023. The growth drove economic expansion but also introduced challenges, including environmental degradation, resource-intensive development, and growing urban-rural disparities. Recognizing these changes, China has implemented policies focused on sustainable urbanization, smart city development, climate resilience and ecological restoration. This is reflected in the country's National Agenda and The Shanghai 2035 Masterplan, positioning Shanghai, a coastal city vulnerable to the impacts of climate change, as a "global city of excellence," attempting to balancing urban growth with climate adaptation through flood resistant urban design, smart city governance, and sustainable transportation.

Despite the progress made, challenges remain, particularly in governance effectiveness and ensuring equitable access to resilient infrastructure in cities like Shanghai. Moreover, factors such as insufficient international partnerships and limited participation in international policy innovation networks, China's best practices are not being effectively disseminated, limiting its international contribution. Expanding participation in international urban governance building through UNDP's network, combined with the capacity building efforts of leading Chinese academic institutions like Tongji University and its laboratories, can help address these challenges. Through collaboration with more developing countries facing similar issues, China's sustainable urban development can be accelerated, allowing its experiences and practices to be shared more quickly and broadly with other countries. This, in turn, will foster exchanges, mutual learning, and build capacity to tackle global urbanization challenges.

In light of these efforts, it is important to recognize the unique challenges faced by Least Developed Countries (LDCs), Landlocked Developing Countries (LLDCs), and Small Island Developing States (SIDS) in the context of global urbanization and resilience building. These regions provide valuable deduction models and research for building resilient cities while contributing significantly to policy innovation and research on urban disaster prevention and mitigation – LDCs, for instance, hold only 13% of the world's population but bear a disproportionately high burden of climate-related disasters. Over the past 50 years, more than two-thirds (69%) of climate-related disaster fatalities occurred in all 46 LDCs.

Similarly, 54% of the land of LLDCs is classified as dryland, with 60% of the population living in these areas. Between 2013 and 2022, the number of disaster-affected individuals in LLDCs was 3,120 people per 100,000 people, much higher than the global average of 2,034. On yearly accounts from 2015 to 2022, an average of 36,532 critical infrastructure units and facilities were destroyed or damaged by disasters.

SIDS regions are particularly vulnerable to nature-related disasters such as rising sea levels, increased coastal flooding, saltwater intrusion, and shoreline retreat. Research has shown that a single disaster in a small island state can result in a 14% loss of GDP and directly affect 11% of the population. Yet only 10% of the support has been allocated to prevention and preparedness, leaving them inadequately supported.

Urbanization has intensified existing inequalities for women and marginalized groups, who face disproportionate risks due to limited access to resilient housing, public services, and economic opportunities. In addition, to being more vulnerable to gender-based violence, displacement, and inadequate infrastructure, their underrepresentation in decision-making processes related to climate adaptation and disaster risk reduction further restricts inclusive, resilience building efforts.

These countries have provided a wealth of valuable samples and data for building urban disaster prevention and mitigation. However, they face challenges such as inadequate infrastructure, limited technical expertise, insufficient funding, and outdated regulatory frameworks. As a result, their participation in international efforts remains limited. Through collaboration with these regions, China can enhance its own urban resilience capabilities by leveraging the wealth of research cases. Additionally, such partnerships would allow China to further expand its global communication network, establish a leading role in international development, and offer impactful development models and policy suggestions to these regions and other countries. As a result, overall enhances its international reputation and influence.

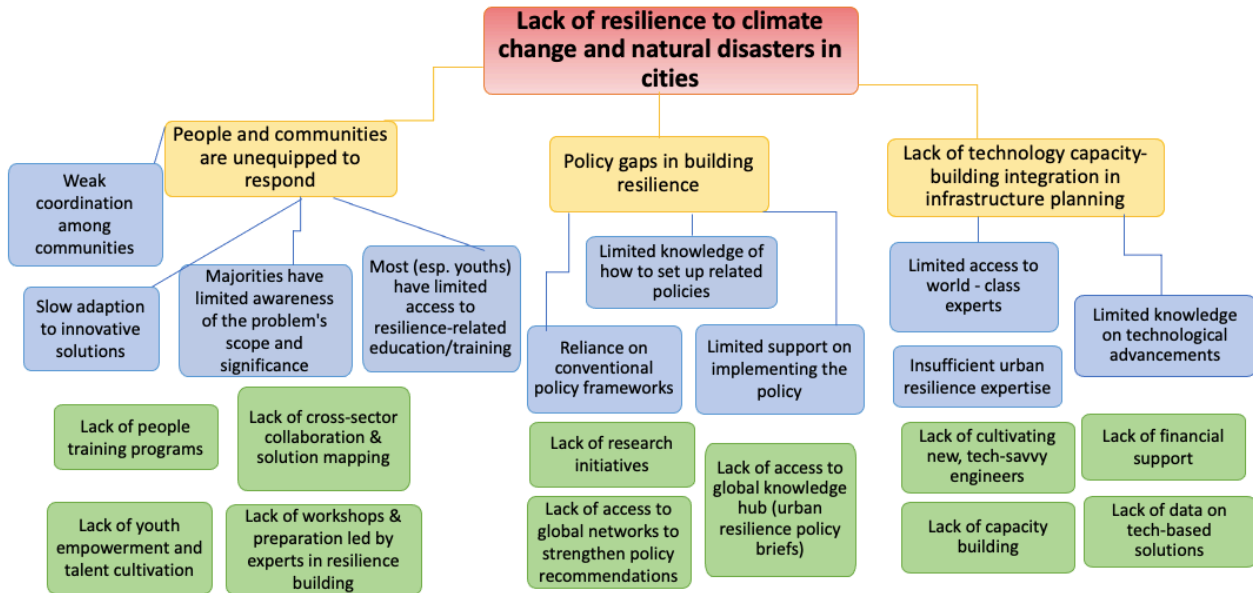
Building on these initiatives, the United Nations also places a great emphasis on building resilient cities, The United Nations 2030 Agenda for Sustainable Development advocates for “inclusive, safe, resilient, and sustainable” cities and has spurred action globally. Organizations like the ICLEI-Local Government for Sustainability and the UN Office for Disaster Risk Reduction (UNDRR) emphasized international cooperation's importance in achieving these goals. “The window of opportunity to achieve climate-resilient development is rapidly shrinking,” warns the Intergovernmental Panel on Climate Change (IPCC), calling for action that combines adaptation and mitigation measures to improve resilience, well-being, and alignment with the Sustainable Development Goals (SDGs).

Strengthening academic institutions and research centers in sustainable urban planning and management is essential to ensuring that resilience building strategies are both innovative and effective. Universities serve as critical knowledge hubs that can drive research, policy development, and initiatives that have the potential to inform urban resilience strategies both locally and globally.

Over the past two decades, Tongji University has collaborated with multiple UN agencies, including the United Nations Environment Programme (UNEP), the World Heritage Institute of Training and Research for the Asia and the Pacific Region under the United Nations Educational, Scientific and Cultural Organization (UNESCO), the World Intellectual Property Organization (WIPO), and the United Nations Institute for Training and Research (UNITAR) to advance sustainable development, demonstrating valuable experience and expertise especially in the fields of climate-related research and education. Through these partnerships, Tongji has demonstrated strong expertise and practical experience. This track record underscores the university's capacity to promote mutual learning and knowledge exchange among developing countries in collaboration with UN bodies.

II. STRATEGY

2.1 Challenges



Immediate Causes

Building resilience in cities is challenging due to several factors, with key focus areas being people and communities, policies, and infrastructure. The first challenge is that people and communities are often unequipped to respond effectively. The second challenge lies in persistent policy gaps that hinder resilience-building efforts. Lastly, outdated infrastructure planning and a lack of integrated technology capacity-building further complicated the situation. These factors contribute to the difficulty in achieving a resilient and sustainable future. Without addressing these gaps, efforts to promote sustainable development and build resilience will remain hindered.

Community development, policymaking and infrastructure form the three main pillars of a resilient city. In the face of disasters, a well-functioning community system serves as the frontline for early warning, community resilience and support. A sound policy framework provides institutional support for resource allocation and coordinated governance. Modern infrastructure, meanwhile, constitutes the physical backbone for rapid emergency response and post-disaster recovery. Only through the coordinated efforts of these three pillars can cities establish a strong and effective response against risks.

People and communities, Policies, and Infrastructure are the key pillars of resilience because they actively address the fundamental aspects of preparedness, response, and recovery in the event of disasters or challenges.

Underlying Causes

For people and communities, key challenges to the unequipped groups include weak coordination and communication during disasters, substantial unawareness of disaster risks,

slow adoption of innovative solutions, and limited access to resilience-related resources. These issues affect all levels of the ecosystem from insufficient knowledge about potential risks to a lack of preparedness and response strategies when disasters occur. People and communities are central to the success of the three pillars.

Policy systems, meanwhile, provide the top-level design for urban resilience. No matter how empowered communities become, without supportive policies, their efforts may go to waste. The continued reliance on conventional policy frameworks, limited knowledge of how to establish supportive and relevant policies, and a lack of understanding of sustainable development frameworks significantly impact the effectiveness of policymaking. Without the right policies and regulations in place, these issues will persist, undermining future progress.

Infrastructure, too, plays a vital role as it serves as the foundation for safety. Without the effective integration of technology in infrastructure planning, people and communities risk living in vulnerable structures, unequipped for climate disasters. Key challenges include having limited access to necessary information, a shortage of urban resilience expertise, and insufficient knowledge on how to establish technological advancements. These issues prevent the development of resilient infrastructure and implementation of technological innovations.

Root Causes

Underlying these challenges lie deeper root problems that are intertwined with existing structures and pervasive, longstanding development constraints. These include environmental limitations, rooted attitudes and behaviors, and a lack of access to knowledge and resources within communities.

Behind unequipped people and communities lie challenges such as limited access to training programs, inadequate opportunities for cross-sector collaboration and knowledge sharing, and a lack of expert-led workshops and preparation in resilience building. Additionally, the younger generation remains under-empowered and unaware of urban resilience, while few talent cultivation programs are available. These factors impede their learning process and affect their ability to acquire the necessary knowledge needed for growth.

Similarly, the establishment of relevant and supportive policies is limited by a lack of research initiatives, insufficient global networks for guidance on strengthening policy, and limited access to global knowledge hubs. Policymakers in the targeted regions need to access urban resilience policy briefs, case studies, and insights from successful policies and regulations.

Addressing these gaps is essential for creating effective, disaster-proof, and resilient policies.

Finally, the development of resilient infrastructure requires strengthening technical skills and capabilities to effectively integrate technology into planning. Current infrastructure weaknesses stem from issues such as the lack of investment in cultivating tech-savvy engineers, insufficient financial support, limited capacity-building opportunities, and inadequate access to technical expertise and relevant information. Addressing these challenges will not only contribute to creating sustainable infrastructure development but also ensuring long-term resilience.

2.2 Project Strategy



Based on the problem tree for the Theory of Change, the project aims to address key challenges in urban resilience development, such as youth empowerment, talent cultivation, and the need for robust training programs. In particular, it will focus on the following:

1. Strengthening Preparedness for Disaster and Climate-related Challenge

The project will focus on providing leadership training based on real-world case studies and successful resilience-building strategies. Through this training, participants will actively engage in needs identification, planning, implementation management, and promoting sustainable practices. The programme will help to ensure inclusive access to education and information on disaster resilience, fostering greater preparedness and adaptive capacity among urban populations.

2. Promoting Knowledge Sharing and Lessons Learnt for Urban Resilience and Disaster Prevention and Reduction

The project will facilitate the exchange of knowledge and expertise among government bodies, professional associations, volunteers, and other key stakeholders. Supported by the Crisis Bureau of UNDP, the project will leverage UNDP’s global network and South-South Cooperation (SSC) to facilitate mutual knowledge and experience sharing between China and partner countries on best practices and lessons learnt.

3. Engaging Youth in Building a Resilient Future

The project will empower young people with the knowledge, skills, and opportunities necessary to foster resilience. In so doing, the project will cultivate future leaders for economic growth, sustainability, and social development, while helping to reduce vulnerabilities and create employment opportunities.

4. Facilitating Transfer of Technology and Innovative Solutions to Improve Urban Infrastructure

With cities as key hubs for the exploration of frontier technologies and cutting-edge innovations, the project will look at various ways to leverage tech-based solutions for urban

development challenges and resilience building. In particular, the project will establish a solution bank that helps to connect the necessary tools, technologies, and expertise with practical applications, turning innovative ideas into real-world impact.

5. Developing Enhanced Capacity for the Integration of Technology-focused Practices

In addition to leveraging technologies themselves, this project will also focus on capacity building to effectively integrate these new technologies into engineering practices, including Disaster Risk Reduction (DRR) systems and Early Warning Systems for improved resilience and risk management. The Lab will adopt comprehensive, solution-oriented approaches, ensuring participants engage in real-world, collaborative problem-solving that emphasizes how resilience-building is connected to a broad range of SDGs.

Under this project, the UNDP China - Tongji Lab will be established to serve as a platform to realise this vision. It will serve as the center for promoting knowledge dissemination, conducting capacity-building projects, providing guidance, and fostering collaborative opportunities. The lab will also provide a dynamic platform for experts, leaders, policymakers, young entrepreneurs, and global researchers to exchange ideas, develop innovative solutions to contemporary challenges, and contribute to the advancement of sustainable development.

Expanding on this groundwork, Tongji University, a global leader in civil engineering education and research, will play a pivotal role in advancing urban resilience. With its State Key Laboratory of Disaster Reduction in Civil Engineering, the university has been at the forefront of urban development, infrastructure design, and technological innovation. Its expertise is crucial in developing cutting-edge, scalable strategies to enhance resilience in cities. The project can leverage Tongji University's extensive resources and the State Lab to provide more advanced and comprehensive policy solutions for cities like Shanghai in China, as well as for developing countries worldwide, that are also facing challenges of urban sustainable development.

Meanwhile, as the UN system's lead development agency, UNDP leverages its vast network spanning 170 countries and decades of experience in sustainable development. This global reach facilitates the exchange of knowledge and insights, with a particular focus on vulnerable regions such as LDCs (Least Developed Countries), LLDCs (Landlocked Developing Countries), and SIDS (Small Island Developing States).

The project will also collaborate with the UNDP Crisis Bureau and leverage its Crisis Portal that serves as a One-Stop-Shop with key resources to support Country Offices and also leverage the Crisis Academy to upscale crisis capabilities across multiple competencies. The project will also leverage global insights from the UNDP Urban Risk Management and Resilience Strategy. The strategy brings together work on disaster and climate risk management with its climate change (mitigation and adaptation) and development agenda. It specifically focuses on particularly acute problems in small and medium-sized cities resulting from rapid, unplanned, uneven and inequitable development coupled with an increasingly complex mix of hazards, shocks and crises.

By combining UNDP's extensive global network—including its Crisis Bureau, Accelerator Lab Network, and policy hubs—with the expertise of Tongji University's College of Civil Engineering, this project creates a unique platform for international collaboration, fostering exchanges in climate-resilient cities through South-South Cooperation, and also positions Tongji University as a key player in UNDP's global innovation ecosystem.

III. RESULTS AND PARTNERSHIPS

Expected Results

The project's initial phase will focus on building the UNDP China -Tongji Lab and enhancing its capacity to ensure its sustainability beyond the project cycle, enabling it to evolve into a leading knowledge hub dedicated to strengthening the resilience of infrastructure in large cities against climate-induced disasters.

Tongji University brings experience through its longstanding collaborations with various UN agencies. These partnerships have strengthened their expertise in climate related research and education, positioning them as a key player in advancing sustainable urban development.

This phase will also enable Tongji University, together with local governments, to share experience, knowledge, and best practices on building climate-resilient, sustainable cities.

In addition, the South-South Cooperation to facilitate technical exchanges will be undertaken in collaboration with UNDP's Crisis Bureau based in Geneva. In particular, the project will deliver five key outputs: leadership training; solution mapping and technology transfer; advancing global thought leadership; research and policy development; and youth engagement.

Output 1: Support the Establishment of the UNDP China -Tongji Lab: The UNDP China -Tongji Lab will be established under Tongji University to enhance its capacity and ensure its continuous operation beyond the project cycle.

Indicative Activity 1.1: Organise an inception workshop to officially launch the partnership and establish the UNDP China -Tongji Lab. The workshop will bring together key stakeholders to jointly clarify objectives, discuss the challenges faced in urban resilience building, and explore cooperation opportunities. This workshop will serve as the foundation for the subsequent capacity-building efforts and promote the establishment of a strong network for knowledge exchange and cooperation.

Indicative Activity 1.2: Establish a Project Advisory Board (PAB) composed of advisors from government departments, think tanks, universities, and relevant UN agencies, etc., to provide continuous support for the policies, academic and partnership-building of the project and the UNDP China -Tongji Lab.

Indicative Activity 1.3: Conduct capacity-building activities for the UNDP China -Tongji Lab's staff including SDGs awareness, recruitment and training programs, and experiences exchange with other UNDP China SDG Innovation Labs.

Output 2: Enhancing Government Innovation Capacity for Disaster Resilience: Enhance the ability of city-level government, city planners and policymakers on climate and disaster resilience by conducting activities such as technical exchanges, training workshops, and case analyses.

Indicative Activity 2.1: The project will invite city-level officials, policy makers and technical experts to participate in training sessions related to disaster prevention, mitigation, and climate adaptation. During the training, participants will formulate strategies that are in line

with the actual challenges their cities face, exchange best practices, and apply advanced tools such as risk mapping and simulation exercises to deal with climate-related disasters.

Indicative Activity 2.2: Offer hands-on technical training workshops for technical professionals and researchers on advanced methodologies and tools for climate and disaster resilience. Practical exercises will equip participants with the expertise to integrate climate adaptation strategies into urban planning.

Output 3: Build a Mutual Learning Network under South-South Cooperation: Invite South-South countries including LDCs, LLDCs and SIDS to participate in training workshops for knowledge exchange and mutual learning.

Indicative Activity 3.1: Organise training and solution-focused workshops on disaster prevention and climate resilience, targeting city-level government officials, policy makers and urban planners from developing countries that are severely affected by climate change under South-South Cooperation framework. Carry out joint training programs to jointly research and design cutting-edge, scalable technological solutions, jointly explore policy innovations, and equipping participants with the necessary knowledge and tools to formulate and implement disaster prevention and climate resilience policies. The training will also include field visits, case studies, scenario-based drills, and group discussions aimed at encouraging participants to present real-life challenges they are facing and explore practical and context-specific solutions.

Indicative Activity 3.2: Establish a solution bank based on the real-world issues and challenges presented from various developing countries during the aforementioned capacity-building events. This will house training materials, knowledge maps, research papers, case studies aimed to help policymakers, researchers, and practitioners in adapting these solutions to their local contexts.

Output 4: Establish an International Platform for Exchange to Share China's Experience: Facilitate global dialogue and thought leadership, promote China's practical experience and advanced technical strategies in resilient city development, enhancing international influence.

Indicative Activity 4.1: Organise international events to share best practices in sustainable urban development and explore innovative approaches to resilient cities. This event will draw on Tongji University's global network and the urban-centered networks of UN/UNDP at the global level, bringing together leading experts and thought-leaders, think tanks, universities, UN agencies, international organizations, and other key stakeholders from both developing and developed countries globally.

Output 5: Youth Engagement and Talent Incubation and Pooling: Cultivate a new generation of leaders in disaster prevention and urban resilience across the world through targeted youth engagement global initiatives, encouraging youth to adopt a problem-solving approach, encouraging young change makers.

Indicative Activity 5.1: Organise youth bootcamps for urban resilience innovation. This initiative will form multi-disciplinary teams of college-level youth, engaging them in interactive problem-solving activities to develop actionable solutions. Participants will gain a deeper understanding of urban disaster resilience, enabling them to develop practical, tech-driven solutions using tools such as AI, IoT, scenario simulation and remote sensing. This will be

achieved through targeted youth-focused events such as networking events, bootcamps, prize challenges, and other activities.

Resources Required to Achieve the Expected Results

Budget

- The project spans a period of three years, with an initial funding of a total of 9,000,000 CNY provided by Tongji University to jump start and 3 million CNY to be mobilised. In Q4 2026, a comprehensive project review will be undertaken to decide on the funding needs for the remaining 1 year. Subsequent funding will be adjusted based on the accomplishments and next stage expectations of the project.
- UNDP and CICETE provide direct support for project management and operations. The related costs will be considered as part of the project input. These costs will be reviewed and approved annually during the confirmation meeting of the annual work plan convened by the Project Steering Committee, where specific work content, cost calculation standards, and payment limits will be discussed.
- The College of Civil Engineering at Tongji University will allocate 9,000,000 CNY for the project, with the specific utilization to be arranged within the annual work plan jointly approved by the Project Steering Committee (PSC).

Timeline for Financial Contribution			
Item	Date	Amount (CNY)	Ratio
First contribution	Q2 2025	3,000,000	1/3
Second contribution	Q1 2026	3,000,000	1/3
Third contribution	Q1 2027	3,000,000	1/3

Resource Mobilisation Plan:

- Supported by UNDP, Tongji University aims to leverage its academic reputation, extensive networks, and influential alumni base to mobilize resources effectively. The university provides potential funding partners with opportunities for technological innovation, and global impact. Supporting the lab is an investment in sustainability, innovation, and urban resilience, offering a platform for donors to demonstrate leadership, showcase social responsibility, and strengthen their global standing. Partnerships with UNDP and Tongji enhance donor credibility and visibility.
- Tongji’s alumni and strategic partnerships are key to securing the remaining funds, ensuring the project’s success and long-term impact.

Partnerships

This project is aimed to establish a joint platform involving various stakeholders, including government bodies, international organizations, and academia, to foster cross-sector collaboration and active participation of Chinese social organizations in international development cooperation. In addition to the primary initiating partners, the project will also look to engage with a range of partners across UN entities, international organizations, and global networks to draw on global expertise and maize knowledge and experience exchange. These include:

UNDP offices and hubs:

- **The UNDP Crisis Bureau** provides support to countries to prepare, respond and recover from crises while building resilience to future shocks, as well as providing expertise in disaster risk reduction, conflict prevention and recovery planning to ensure sustainable development in challenging contexts.
- **The UNDP Global Centre Singapore** is a hub for knowledge and policy relating to sustainable development, with the emphasis on connecting top policymakers, practitioners, think tanks, business and other relevant stakeholders for learning and sharing of best practices on the themes of technology, innovation smart cities, and partnerships for SDG impact.
- **UNDP Country Offices** based in Least Developed Countries (LDCs), Landlocked Developing Countries (LDCs), and Small Island Developing States (SIDS).

Other UN Agencies:

- **UNDRR:** The UN Office for Disaster Risk Reduction (UNDRR) coordinates global efforts through working with governments, organizations, and communities to reduce disaster risk and build resilient communities, while addressing underlying causes of disasters, promote risk-related development and enhance preparedness for future crises.
- **UNHABITAT:** The United Nations Human Settlements Programme (UN-Habitat) ensures adequate shelter for all through researching and sharing practices, and knowledge, designing and implementing initiatives, and supporting technical assistance to develop sustainable urbanization.

Global networks focused on helping cities build resilience in infrastructure and adapt to climate change, urbanization, and other challenges:

- **ICLEI – Local Governments for Sustainability** is a global network working with more than 2500 local and regional governments committed to sustainable urban development. Active in 125+ countries, it influences sustainability policy and drives local action for low emission, nature-based, equitable, resilient and circular development.
- **C40** – a global network comprised of 100 mayors of the world’s leading cities that unite to combat climate change and build resilient communities.
- **Resilient Cities Network (RCN)** – a successor to 100RC, brings together global knowledge, practice, partnerships, while focusing on collaborative city leadership to develop and implement urban resilience strategies.

Risks Analysis and Assumption

The project has a 3-year span, covers a wide range of activities, and involves numerous stakeholders. Therefore, the successful implementation of the project largely depends on the following key factors: the project adequately funded, stable project management personnel, smooth cooperation among the various parties in the project, fully met expectations of the project’s results, etc.

According to UNDP’s project risk management policy, risks are classified based on their "likelihood" and "severity" into high, substantial, moderate, and low risks. UNDP’s project risk policy requires each project to proactively develop measures to address various potential risks. Throughout each project cycle, all project parties should maintain close communication and, at least once a year, review and discuss the response measures for each risk in order to mitigate the losses and impacts caused by these risks to the project.

This project involves a wide range of stakeholders, and the effectiveness of their coordination is crucial to the achievement of the project's goals. Therefore, it is important to anticipate potential risks that may hinder the project's implementation and the potential losses that may be incurred by the stakeholders.

The following are the main potential risks in this project, as well as the corresponding early warning mechanisms:

No.	Potential Risks	Risk Level	Mitigation Mechanism
1	The execution of the project may fail to motivate local communities or the public in recipient countries, who may as well hold low awareness and acceptance to the outcomes of the projects.	Low	Develop a project communications strategy and action plan to ensure public awareness and participation
2	The project deviates from its intended course or its output fails to meet expected outcomes.	Low	The Project Steering Committee conducts an annual review of the progress of the project for lessons learnt and adjust direction if needed. Additionally, UNDP will provide support for results monitoring and evaluation within the project.
3	Inadequate funding could cause delays for project delivery or limit the scope of research and development.	Medium	Develop a resource mobilisation strategy to raise funding from multiple sources, including international donors, private sector and Tongji's alumni network. Develop a detailed and realistic budget with contingency plans for unforeseen expenses. Provide regular financial reports to stakeholders to maintain transparency and build confidence in the project's financial management.
4	The collection and use of data related to urban resilience may raise privacy and data protection issues.	Low	Adhere to relevant data protection regulations and best practices to ensure the secure handling of data. Obtain informed consent from individuals and organizations before collecting data. Clearly communicate data usage policies and procedures to stakeholders to build trust and ensure compliance.
5	The project design is not in line with the actual needs and demands of the recipient countries	low	The training participants will be requested to bring actual challenges facing their cities and communities to make the training programme underpinned by actual needs of practical solutions in recipient countries.

Stakeholder Engagement

Targeted groups:

- **National Institutions:** International Research Institute of Big Data for SDGs, Ministry of Housing and Urban-Rural Development, Ministry of Emergency Management, Ministry of Transport, Ministry of Education, China Earthquake Administration, China International Development Cooperation Agency (CIDCA)
- **Shanghai Municipal Government:** Foreign Affairs Office of Shanghai Municipal People's Government
- **Tongji University's Alumni Network**
- **Government officials (national level)** from China and other developing countries Central government policymakers responsible for national strategy on urban resilience.
- **Urban planners and administrators (subnational/city level)** from above countries: Mayors and policy makers responsible for urban planning, city management, and administration.
- **College students** and students specialized in civil engineering.
- **Youth** especially primary and middle school students.
- **Climate resilience experts:** Professionals specializing in environmental science, climate change, and sustainability, interested in integrating resilience measures into urban development.
- **Disaster readiness experts:** Practitioners in disaster risk reduction, emergency response, and recovery, looking to enhance their knowledge and capabilities in resilient city planning for developing countries, especially highly impacted areas.
- **Infrastructure practitioners:** Organizations and private sector entities responsible for infrastructure development, public works, and large-scale projects, seeking exchange and showcasing of experience and best practices to enhance resilience development for developing countries.
- **Potentially Beneficial Groups:**
 - Higher education ecosystem - universities and colleges based in Shanghai
 - NGO and community leaders: Representatives from non-governmental organizations (NGOs) and community leaders actively engage in local development and resilience initiatives.

South-South and Triangular Cooperation (SSC/TrC)

This project serves as a working platform developed within the framework of South-South cooperation, aimed at exploring how China can better integrate with the international community and collaborate to advance the SDGs of the 2030 Agenda. All efforts will be conducted within the framework of South-South cooperation in terms of setting project objectives, selecting collaborative partnerships, designing project content, and choosing project locations, etc. The focus will be on facilitating exchanges and cooperation among social forces in developing countries, disseminating, and sharing knowledge or experiences and conducting activities including talent exchanges, development project collaborations, industry development communications, and project implementation in key development areas.

Additionally, both the overall and stage-specific targets of this project will organically integrate the SDGs of the 2030 Agenda and the overall development goals of South-South cooperation. The primary objective is to promote the realization of the SDGs of the 2030 Agenda within the framework of South-South cooperation.

Knowledge

From the beginning of the project, a framework for knowledge outcomes will be established, and a systematic and modular approach will be taken to build the following knowledge repositories. These repositories will be enriched and refined during different stages of the project. The primary knowledge outputs of the project include, but are not limited to:

- Solution bank.
- Research papers and policy briefings.
- Contact directories policy makers networks for urban Climate and Disaster Resilience.
- Capacity-building training materials.
- Materials of international exchange, contact directories for relevant organizations and personnel, as well as demand and resource data.
- Other project communications outputs such as live-streaming, media interviews, promotional videos, website, project booklets, etc.

The ownership of related intellectual property generated by the project will be governed following the latest version of the *UNDP-CICETE Project Implementation in China Handbook (Handbook)*.

Sustainability and Scaling Up

UNDP China -Tongji SDG Innovation Lab on Climate and Disaster Resilience, supported by both national and local stakeholders, aims to create a lasting impact on urban resilience and sustainability in Shanghai and beyond.

By integrating advanced technologies and innovative strategies into urban planning, the lab will significantly contribute to Shanghai's efforts in advancing sustainable urban development and resilience. It will serve as a model for other cities across China, offering valuable insights and practices that can be adapted and implemented in different regions.

Furthermore, the lab will focus on fostering international collaboration and establishing a global network for urban resilience. Its activities will provide insights for the global community, providing a platform for sharing best practices and solutions. The experiences and research outcomes generated by the lab will be applicable to cities and regions outside China, supporting the global exchange of knowledge and the scaling up of effective urban resilience strategies. This approach ensures that the lab's impact extends well beyond its immediate geographic area, contributing to the broader agenda of sustainable urban development worldwide.

Looking ahead, the Lab presents significant opportunities for long-term value. On the one hand, there is the potential to extend the project into a Phase II if UNDP's expertise is needed, particularly in bringing new global insights into the SDGs post-2030, thus further amplifying its global impact. On the other hand, Tongji University can continue to operate the Lab independently, building on its established networks and expertise to sustain its contributions to urban resilience and ensure long-term success.

IV. PROJECT MANAGEMENT

Cost Efficiency and Effectiveness

The project will establish a sound project governance and oversight mechanism, including the formation of a Project Steering Committee (PSC), to ensure that resources are utilized efficiently, and funds are allocated effectively without waste. Through the annual review mechanism, this governance framework is critical for maintaining transparency, addressing any emerging issues promptly, and steering the project towards its intended outcomes. It also facilitates regular assessment and realignment of project goals with actual progress, ensuring that the project remains on track and continues to deliver maximum results.

Project Management

The project, executed in China, is in line with the Standard Basic Assistance Agreement (SBBA) between the United Nations Development Programme (UNDP) and the Chinese Government. CICETE will serve as the Implementation Partner. The project and its fund management model will follow the *UNDP-CICETE Project Implementation Handbook in China (Implementation Handbook)*. If UNDP supports the implementation of activities, it should be in accordance with the *Handbook* established by UNDP and CICETE under the principle of the National Implementation Modality. The Project Implementation Partner (IP) is accountable to the Project Steering Committee for the achievement of the objectives and outputs of the project.

The primary initiating partners are as follows:

- ***China International Economic and Technical Exchange Centre (CICETE)***

The China International Economic and Technical Exchange centre (CICETE) is a non-profit institution directly under the Ministry of Commerce of the People's Republic of China, established with the approval of the State Council on March 12, 1983. CICETE is dedicated to promoting economic and technological exchanges between China and other countries and regions worldwide. As a professional organization for international development cooperation, CICETE is entrusted by the government to coordinate and manage collaborative projects with the United Nations Development Programme, the United Nations Industrial Development Organization, and the United Nations Volunteers.
- ***United Nations Development Programme (UNDP)***

The United Nations Development Programme (UNDP) is a global network within the United Nations dedicated to development, operating in over 170 countries and regions. It provides knowledge, expertise, and resources to assist nations in addressing both global and domestic development challenges. Established in 1979, the UNDP China Office collaborates with the people and government of China, as well as other partners, to pursue equitable and sustainable human development domestically and internationally. To date, UNDP has initiated over 900 projects in China. Furthermore, within the framework of "South-South cooperation," UNDP engages in extensive international collaboration, aiming to China's experiences and propel other developing countries towards sustainable growth on a global scale.
- ***College of Civil Engineering at Tongji University***

College of Civil Engineering at Tongji University has been active in developing education and research collaborations with global partners involving its five departments, namely, the Department of Structural Engineering; Department of Geotechnical Engineering; Department of Bridge Engineering; Department of Disaster Mitigation for Structures, and Department of Hydraulic Engineering.

V. RESULTS FRAMEWORK¹

<p>Intended Outcome as stated in the UNDAF/Country [or Global/Regional] Programme Results and Resource Framework: UNSDCF Outcome 3: People in China and the region benefit from a healthier and more resilient environment.</p>
<p>Outcome indicators as stated in the Country Programme [or Global/Regional] Results and Resources Framework, including baseline and targets: CPD Output 2.1: Adaptive policies developed at target level (subnational), financed and applied for nature-based systems to align with multilateral agreements and transboundary platforms.</p>
<p>Applicable Output(s) from the UNDP Strategic Plan: SP Output 2.1 Open, agile, accountable and future-ready governance systems in place to co-create and deliver solutions to accelerate SDG achievement.</p>
<p>Project title and Quantum Project Number: UNDP China -Tongji SDG Innovation Pilot Project on Climate and Disaster Resilience Project Number: 01003090</p>

¹ UNDP publishes its project information (indicators, baselines, targets, and results) to meet the International Aid Transparency Initiative (IATI) standards.

EXPECTED OUTPUTS	OUTPUT INDICATORS ²	DATA SOURCE	BASELINE		TARGETS (by frequency of data collection)				DATA COLLECTION METHODS & RISKS
			Value	Year	Year 1	Year 2	Year 3	FINAL	
Output 1: Support for the Establishment of the UNDP China - Tongji Lab: The UNDP China -Tongji Lab will be established under Tongji University. The project will continuously enhance the UNDP China -Tongji Lab's capacity building to ensure its continuous operation and output after the project closure.	1.1.1 Number of inception workshop organised (offline)	Activity Records	0	2024	1	0	0		
	1.1.2 Number of inception workshop's participants (30% of female)	Activity Records Event Sign-in Records	0	2024	10(3)	0	0		
	1.2.1 Number of experts of the Project Advisory Board (30% of female)	Contracts/ Letters of Appointment for Experts	0	2024	6 (2)	6 (2)	6 (2)		
Output 2: Enhancing Government Innovation Capacity for Disaster Resilience: Enhance the ability of city-level government, city planners and policymakers on climate and disaster resilience by conducting activities such as technical exchanges, training seminars, and case analyses.	2.1.1 Number of trainings organised (offline)	Activity Records	0	2024	1	1	1		
	2.1.2 Number of trainings' participants (30% of female)	Activity Records Event Sign-in Records	0	2024	10(3)	10(3)	10(3)		
Output 3: Build a Mutual Learning Network under South-South Cooperation: Invite South-South countries including LDCs, LLDCs and SIDS to participate in training workshops for knowledge exchange and mutual learning.	3.1.1 Number of solution bank created (1 gender solution)	Project Progress Reports	0	2024	0	1	1		
Output 4: Establish an International Platform for Exchange to Share	4.1.1 Number of events organised (offline)	Activity Records	0	2024	1	1	0		

² It is recommended that projects use output indicators from the Strategic Plan IRRF, as relevant, in addition to project-specific results indicators. Indicators should be disaggregated by sex or for other targeted groups where relevant.

<p>China's Experience: Facilitate global dialogue and thought leadership, promote China's practical experience and advanced technical strategies in resilient city development, and enhance international influence.</p>	<p>4.1.2 Number of events' participants (30% of female)</p>	<p>Participants Name List</p>	<p>0</p>	<p>2024</p>	<p>100(30)</p>	<p>100(30)</p>	<p>0</p>		
<p>Output 5: Youth Engagement and Talent Incubation and Pooling: Cultivate a new generation of leaders in disaster prevention and urban resilience across the world through targeted youth engagement global initiatives, encouraging youth to adopt a problem-solving approach, and become change makers.</p>	<p>5.1.1 Number of bootcamp organised</p>	<p>Activity Records</p>	<p>0</p>	<p>2024</p>	<p>0</p>	<p>1</p>	<p>1</p>		
	<p>5.1.2 Number of youth participants (30% of female)</p>	<p>Event Sign-in Records</p>	<p>0</p>	<p>2024</p>	<p>0</p>	<p>10(3)</p>	<p>10(3)</p>		

VI. MONITORING AND EVALUATION

In accordance with UNDP’s programming policies and procedures, the project will be monitored through the following monitoring and evaluation plans:

Monitoring Plan

Monitoring Activity	Purpose	Frequency	Expected Action	Partners (if joint)	Cost (if any)
Track results progress	Progress data against the results indicators in the Result and Resource Framework will be collected and analysed to assess the progress of the project in achieving the agreed outputs.	Annually	Slower than expected progress will be addressed by project management.		
Monitor and Manage Risk	Identify specific risks that may threaten achievement of intended results. Identify and monitor risk management actions using a risk log. This includes monitoring measures and plans that may have been required as per UNDP’s Social and Environmental Standards. Audits will be conducted in accordance with UNDP’s audit policy to manage financial risk.	Annually	Risks are identified by project management and actions are taken to manage risk. The risk log is actively maintained to keep track of identified risks and actions taken.		
Learn	Knowledge, good practices, and lessons will be captured regularly, as well as actively sourced from other projects and partners and integrated back into the project.	Annually	Relevant lessons are captured by the project team and used to inform management decisions.		
Annual Project Quality Assurance	The quality of the project will be assessed against UNDP’s quality standards to identify project strengths and weaknesses and to inform management decision making to improve the project.	Biennially	Areas of strength and weakness will be reviewed by project management and used to inform decisions to improve project performance.		

Monitoring Activity	Purpose	Frequency	Expected Action	Partners (if joint)	Cost (if any)
Review and Make Course Corrections	Internal review of data and evidence from all monitoring actions to inform decision making.	At least annually, or as often as required for each indicator	Performance data, risks, lessons, and quality will be discussed by the project board and used to make course corrections.		
Project Report	A progress report will be presented to the Project Steering Committee and key stakeholders, consisting of progress data showing the results achieved against pre-defined annual targets at the output level, the annual project quality rating summary, an updated risk long with mitigation measures, and any evaluation or review reports prepared over the period.	Annually			
Project Review (Project Board)	The project’s governance mechanism (Project Steering Committee) will hold regular project reviews to assess the performance of the project and review the Multi-Year Work Plan to ensure realistic budgeting over the life of the project. In the project’s final year, the Project Board shall hold an end-of project review to capture lessons learned and discuss opportunities for scaling up and to socialize project results and lessons learned with relevant audiences.	At least annually	Any quality concerns or slower than expected progress should be discussed by the project board and management actions agreed to address the issues identified.		

Evaluation Plan

Evaluation Title	Partners (if joint)	Related Strategic Plan Output	UNDAF/CPD Outcome	Planned Completion Date	Key Evaluation Stakeholders	Cost and Source of Funding
Final Evaluation	N/A	SP Output 1.1.1	CPD Outcome 3 and 6	Q1 2027	UNDP, CICETE, College of Civil Engineering at Tongji University	Project Funding

VII. Multi-Year Work Plan³⁴

EXPECTED OUTPUTS	PLANNED ACTIVITIES	Planned Budget by Year			RESPONSIBLE PARTY	PLANNED BUDGET		
		Y1	Y2	Y3		Funding Source	Budget Description	Amount (CNY)
<p>Output 1: Support for the Establishment of the UNDP China - Tongji Lab: The UNDP China -Tongji Lab will be established under Tongji University. The project will continuously enhance the UNDP China-Tongji Lab's capacity building to ensure its continuous operation and output after the project closure.</p>	<p>Activity 1.1: Organise an inception workshop in May 2025 to officially kick off the partnership and the construction of the UNDP China -Tongji Lab. The workshop will bring together key stakeholders to jointly clarify the goals, discuss the challenges faced in urban resilience building, and explore cooperation opportunities. This workshop will lay the foundation for the subsequent capacity-building efforts and promote the establishment of a solid network for continuous knowledge exchange and action cooperation.</p>	260,000	-	-	UNDP CICETE PMO	Cost Sharing (part of funding source TBD)	Agenda design, event organization, guest invitation and travel, media and communications, etc.	260,000

³ Cost definitions and classifications for programme and development effectiveness costs to be charged to the project are defined in the Executive Board decision DP/2010/32

⁴ Changes to a project budget affecting the scope (outputs), completion date, or total estimated project costs require a formal budget revision that must be signed by the project board.

EXPECTED OUTPUTS	PLANNED ACTIVITIES	Planned Budget by Year			RESPONSIBLE PARTY	PLANNED BUDGET		
		Y1	Y2	Y3		Funding Source	Budget Description	Amount (CNY)
	Activity 1.2: Form a Project Advisory Board (PAB) composed of advisors from national ministries and commissions, local government departments, think tanks, universities, and relevant UN agencies, etc. to provide continuous support for the policies, academic and partnership building of the project and the UNDP China -Tongji Lab.	50,000	10,000	10,000	UNDP CICETE PMO	Cost Sharing (part of funding source TBD)	National and international experts' fees, engagement ceremony	70,000
Sub-Total for Output 1								330,000
Output 2: Enhancing Government Innovation Capacity for Disaster Resilience: Enhance the ability of city-level government, city planners and policymakers on climate and disaster resilience by conducting activities such as technical exchanges, training seminars, and case analyses.	Activity 2.1: The project will invite city-level officials, policy makers and technical experts to participate in training related to disaster prevention and mitigation as well as climate adaptation. During the training, participants will formulate strategies that are in line with the actual conditions of their cities, exchange best practices, and apply advanced tools such as risk mapping and simulation exercises to deal with climate-related disasters.	1,800,000	1,700,000	1,800,000	UNDP CICETE PMO	Cost Sharing (part of funding source TBD)	Training theme and agenda design, event organization, guest invitation and travel, etc.	5,300,000
Sub-Total for Output 2								5,300,000

EXPECTED OUTPUTS	PLANNED ACTIVITIES	Planned Budget by Year			RESPON SIBLE PARTY	PLANNED BUDGET		
		Y1	Y2	Y3		Funding Source	Budget Description	Amount (CNY)
Output 3: Build a Mutual Learning Network under South-South Cooperation: Invite South-South countries including LDCs, LLDCs and SIDS to participate in training workshops for knowledge exchange and mutual learning.	Activity 3.1: Based on the real-world issues and challenges presented during the aforementioned capacity-building events from various developing countries, set up a solution bank which serves as a repository of training materials, knowledge maps, research papers, and case studies aimed to help policymakers, researchers, and practitioners in adapting these solutions to their local contexts.	-	200,000	200,000	UNDP CICETE PMO	Cost Sharing (part of funding source TBD)	Data collection, website building, materials printing, etc.	400,000
	Sub-Total for Output 3							400,000
Output 4: Establish an International Platform for Exchange to Share China's Experience: Facilitate global dialogue and thought leadership, promote China's practical experience and advanced technical strategies in resilient city development, and enhance international influence.	Activity 4.1: Organise international events to share best practices in sustainable urban development and explore innovative approaches to resilient cities. This event will draw on Tongji University's global network and the urban-centred networks of UN/UNDP at the global level, bringing together leading experts and thought-leaders, think tanks, universities, UN agencies and international organizations, and other key stakeholders from both developing and developed countries globally.	150,000	150,000	-	UNDP CICETE PMO	Cost Sharing (part of funding source TBD)	Activity design and coordination, guest invitation and travel, etc.	300,000
	Sub-Total for Output 4							300,000

EXPECTED OUTPUTS	PLANNED ACTIVITIES	Planned Budget by Year			RESPONSIBLE PARTY	PLANNED BUDGET		
		Y1	Y2	Y3		Funding Source	Budget Description	Amount (CNY)
Output 5: Youth Engagement and Talent Incubation and Pooling: Cultivate a new generation of leaders in disaster prevention and urban resilience across the world through targeted youth engagement global initiatives, encouraging youth to adopt a problem-solving approach, and become change makers.	Activity 5.1: Organise youth bootcamps for urban resilience innovation. This initiative will form multi-disciplinary teams of college-level youth, engaging them in interactive problem-solving activities and actionable solutions. Participants will gain a deeper understanding of urban disaster resilience, enabling them to develop practical, tech-driven solutions using tools such as AI, IoT, scenario simulation and remote sensing. This will be achieved through targeted youth-focused events such as networking events, bootcamps, prize challenges, and other activities.	-	100,000	100,000	UNDP CICETE PMO	Cost Sharing (part of funding source TBD)	Activity design and agenda design, event organization, guest invitation and travel, media and communications, etc.	200,000
	Sub-Total for Output 5							200,000
Project Management Cost	Monitoring and Evaluation, Overall Management Cost and Travel	200,000	250,000	300,000	UNDP CICETE PMO	Cost Sharing (part of funding source TBD)	Project monitoring and evaluation, audits and travel of project staff.	750,000
	Communications (4%)	120,000	120,000	120,000	UNDP	Cost Sharing (part of funding source TBD)	Design of the overall communications plan, media/social media campaign, etc.	360,000

EXPECTED OUTPUTS	PLANNED ACTIVITIES	Planned Budget by Year			RESPONSIBLE PARTY	PLANNED BUDGET		
		Y1	Y2	Y3		Funding Source	Budget Description	Amount (CNY)
	Project staff salaries and training	150,000	200,000	200,000	PMO CICETE	Cost Sharing (part of funding source TBD)	Recruitment and training of project personnel; UNV as full-time employee by PMO.	550,000
Sub-Total for Project Management Cost								1,660,000
General Management Support	Integrated project management fee: UNDP (3%) CICETE (3%) CICETE DPC (3%)	270,000	270,000	270,000	UNDP CICETE	Cost Sharing (part of funding source TBD)		810,000
Sub-Total for General Management Support								810,000
TOTAL								9,000,000

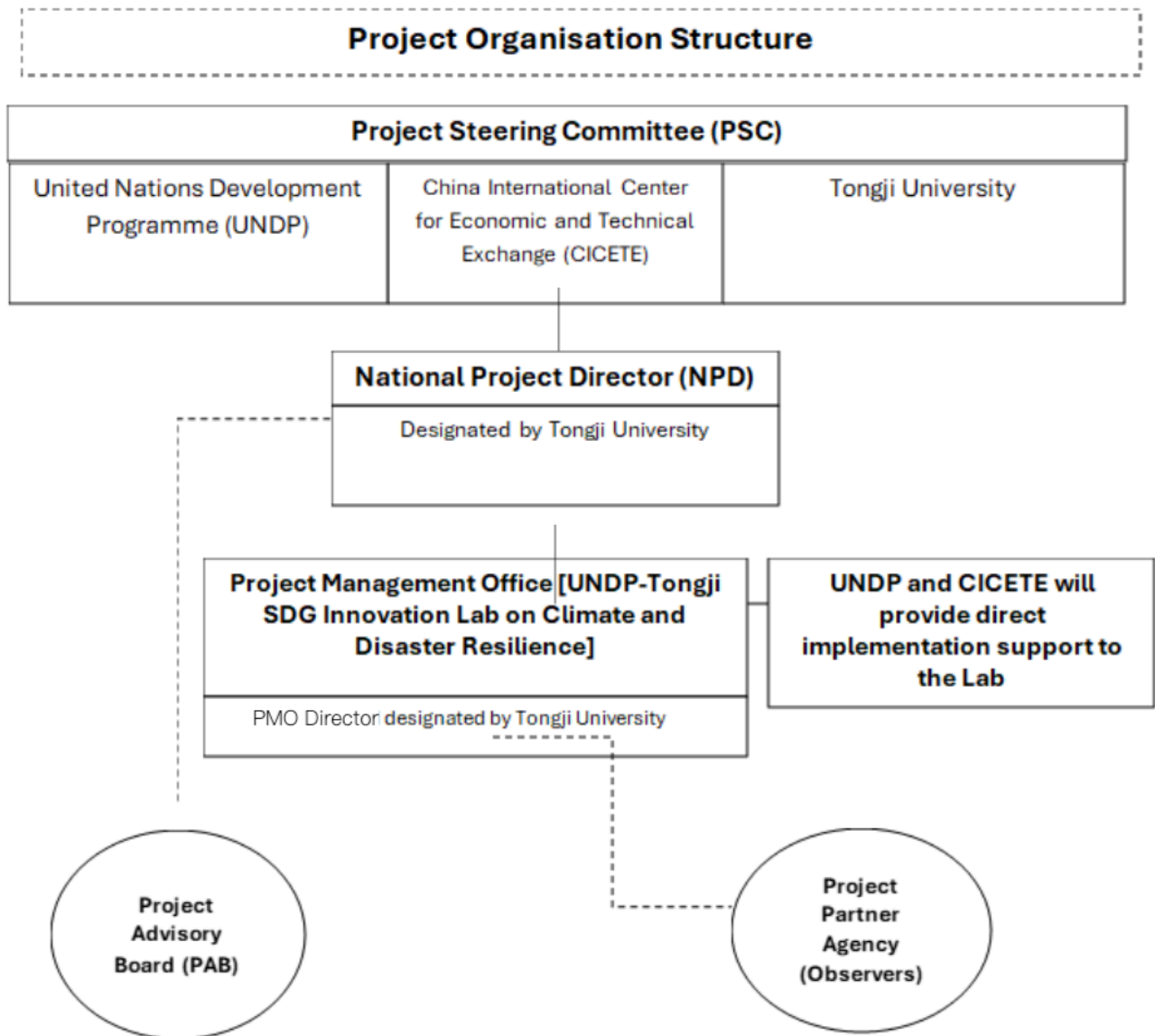
VIII. GOVERNANCE AND MANAGEMENT ARRANGEMENTS

7.1 Project Organization Structure

To ensure effective implementation, the project has established the following organizational structure for management, oversight, and coordination:

- 1) Project Steering Committee (PSC) – responsible for strategic decision-making.
- 2) Project Management Office (PMO) – responsible for the day-to-day implementation of project activities.

The project organizational structure is as follows:



7.2. Responsibilities of Key Stakeholders:

7.2.1 The Project Steering Committee (PSC)

In line with overall project objectives, a Programme Steering Committee (PSC) will be established. The PSC will be joined by representatives from UNDP, CICETE, Tongji University and CICETE.

The primary responsibilities of the PSC include high-level oversight and approval of key decisions related to project execution. Specifically, the Committee is responsible for:

- 1) Providing guidance and direction to ensure alignment between the project, national policies, and strategic priorities, and making decisions on all matters of strategic significance.
- 2) Reviewing project performance based on monitoring, evaluation, and reporting, including quality assurance reviews, progress reports, risk logs, spot checks/audit reports, and consolidated delivery reports.
- 3) Addressing high-level issues raised by the Project Manager or Project Assurance entities.
- 4) Offering guidance on emerging and/or urgent project risks and reaching consensus on mitigation and management strategies.
- 5) Agreeing on or determining the scope of authority of the National Project Director within the limits set by the UNDP China Office (as per the Implementation Handbook) and the donor. The PSC will also provide directions and decisions if the project implementation requirement exceeds these authorised limits.
- 6) Advising on major and/or minor project revisions to ensure they remain within the parameters set by the UNDP China Office and the donor.
- 7) Deciding, when necessary, whether to suspend or terminate the project.
- 8) Provide high-level guidance and recommendations to the Project Management Office (PMO) to ensure the satisfactory and timely delivery of agreed outputs in accordance with the project plan.
- 9) Receive and address project-level grievances, including oversight of specific compliance and stakeholder response (or grievance) mechanisms related to the project's social and environmental performance. This is to ensure that individuals and communities potentially affected by the project have access to effective channels and procedures for raising concerns.

7.2.2 United Nations Development Programme (UNDP) China Office

As a member of the Project Steering Committee, UNDP is mainly responsible for:

- 1) Participating as a member of the Project Steering Committee in reviewing and approving the annual budget and multi-year work plans, assessing project achievements, and evaluating other aspects of project management, including progress reports.
- 2) Leveraging the UN's international network to provide access to international experts, facilitate global experience-sharing, and organise project study visits.
- 3) Where direct support is needed, providing implementation support services for related activities in accordance with the work plan and the Letter of Agreement (LOA) signed with CICETE.
- 4) Supporting the documentation, sharing, promotion, monitoring, and evaluation of project experiences, while ensuring the mainstreaming of gender equality throughout the project's implementation.
- 5) Promoting transparency and accountability to ensure the use of project funds aligns with UNDP China's financial, operational, and environmental safeguards.

- 6) Monitoring and reviewing the project's implementation progress and financial management to ensure compliance with all relevant rules and procedures, and to guarantee effective and proper use of resources.
- 7) Organising financial audits of the implementing agency by third-party audit institutions and carrying out project risk monitoring and management.
- 8) Coordinating audit activities for project components and jointly taking necessary corrective actions with CICETE based on the audit findings.
- 9) Implementing the UNDP China Enterprise Risk Management (ERM) and Risk Management Framework to identify, assess, and mitigate potential project risks.
- 10) Assume an independent quality assurance role within the project, undertaking objective and impartial supervision and monitoring. The quality assurance function will be undertaken independently from the UNDP team responsible for implementation.

7.2.3 Tongji University

As a member of the Project Steering Committee, Tongji University is mainly responsible for:

- 1) Participating as a member of the Project Steering Committee in reviewing and approving the annual budget and multi-year work plans, assessing project achievements, and evaluating other aspects of project management, including progress reports.
- 2) Providing guidance and support in terms of policy, organization, and coordination for the implementation of the project.
- 3) Offering financial support for the project, as well as providing office space, personnel, and necessary office equipment and other related resources required for implementation.
- 4) Supporting the documentation, sharing, promotion, monitoring, and evaluation of project experiences.

7.2.4 China International Center for Economic and Technical Exchanges (CICETE)

As authorized and entrusted by the Ministry of Commerce, CICETE is the implementation partner of this project. It is mainly responsible for:

- 1) Participating as a member of the Project Steering Committee in reviewing and approving the annual budget and multi-year work plans, assessing project achievements, and evaluating other aspects of project management, including progress reports.
- 2) Guiding and coordinating the relevant foreign affairs approval procedures relevant to UNDP project in China.
- 3) Support the Implementing Agency in the efficient implementation and management of the project in accordance with the work plan, and facilitating the achievement of goals and outcomes set out in the project document.
- 4) Support the Implementing Agency in the effective use of project funds and ensure project activities are carried out as planned and outputs are delivered.
- 5) Ensuring the use of funds in strict accordance with project financial management regulations, and upholding standards of timeliness, efficiency, integrity, and due diligence
- 6) Conducting necessary monitoring, review, and evaluation of the cooperative project together with the UNDP China Office and providing services and support to other partners and implementing agencies.

7.2.5 Implementing Agency/The Project Management Office (PMO)

The Implementing Agency, namely the Project Management Office (PMO), is based at Tongji University. Under the guidance of the Project Steering Committee, the PMO is responsible for the day-to-day implementation and management of the project in collaboration with UNDP and CICETE. It is jointly led by the National Project Director (NPD), appointed by Tongji University, and the PMO Director, who is designated by the NPD. The Project Advisory Board operates under the coordination of the PMO. The responsibilities of the Project Management Office include:

- 1) Reporting to the Project Steering Committee and ensuring the smooth implementation of the project.
- 2) Ensuring that allocated project resources from the donor and co-financing partners are delivered on time and in full.
- 3) Preparing and updating the project's multi-year work plans and budgets as required, submitting them to the Project Steering Committee for approval, and implementing project activities in accordance with the approved plan to ensure timely and high-quality delivery of outputs.
- 4) Executing activities approved by the PSC to ensure that project outcomes are achieved on time and to a high standard and submitting annual progress reports promptly and accurately.
- 5) Effectively using and properly managing fixed assets and equipment procured under the project.
- 6) Ensuring the security, effective use, and accuracy of project funds.

7.2.6 The Project Advisory Board (PAB)

The PAB comprises of renowned experts from both domestic and international areas. This committee will enhance engagement with global innovation networks and resources as well, serve as an "external brain" for the project, provide forward-looking international experience and insights, and offer analysis and assessments of macro trends and significant challenges. It will offer strategic guidance for the project's future development direction.

7.2.7 Project Partner Agency (Observers)

The project will invite more representative institutions or enterprises that are committed to promoting innovation and cooperation in sustainable development as observers, so as to build a more influential and dynamic partner network, and share resources and information within the project network, leading to more win-win opportunities.

IX. LEGAL CONTEXT

Standard Basic Assistance Agreement (SBAA)

This project document shall be the instrument referred to as such in Article 1 of the Standard Basic Assistance Agreement between the Government of China and UNDP, signed in 1979. All references in the SBAA to “Executing Agency” shall be deemed to refer to “Implementation Partner.”

This project will be implemented by the CICETE (“Implementation Partner”) in accordance with its financial regulations, rules, practices, and procedures only to the extent that they do not contravene the principles of the Financial Regulations and Rules of UNDP. Where the financial governance of an Implementation Partner does not provide the required guidance to ensure the best value for money, fairness, integrity, transparency, and effective international competition, the financial governance of UNDP shall apply.

X. RISK MANAGEMENT

A. Government Entity (NIM)

1. Consistent with the Article III of the SBAA [*or the Supplemental Provisions to the Project Document*], the responsibility for the safety and security of the Implementation Partner and its personnel and property, and of UNDP's property in the Implementation Partner's custody, rests with the Implementation Partner. To this end, the Implementation Partner shall:
 - a) put in place an appropriate security plan and maintain the security plan, considering the security situation in the country where the project is being carried out.
 - b) assume all risks and liabilities related to the Implementation Partner's security, and the full implementation of the security plan.
2. UNDP reserves the right to verify whether such a plan is in place, and to suggest modifications to the plan when necessary. Failure to maintain and implement an appropriate security plan as required hereunder shall be deemed a breach of the Implementation Partner's obligations under this Project Document.
3. The Implementation Partner agrees to undertake all reasonable efforts to ensure that no UNDP funds received pursuant to the Project Document are used to provide support to individuals or entities associated with terrorism and that the recipients of any amounts provided by UNDP hereunder do not appear on the list maintained by the United Nations Security Council Consolidated Sanctions List, and that no UNDP funds received pursuant to the Project Document are used for money laundering activities. The United Nations Security Council Consolidated Sanctions List can be accessed via <https://www.un.org/securitycouncil/content/un-sc-consolidated-list>.
4. The Implementation Partner acknowledges and agrees that UNDP will not tolerate sexual harassment and sexual exploitation and abuse of anyone by the Implementation Partner, and each of its responsible parties, their respective sub-recipients and other entities involved in Project implementation, either as contractors or subcontractors and their personnel, and any individuals performing services for them under the Project Document.
 - (a) In the implementation of the activities under this Project Document, the Implementation Partner, and each of its sub-parties referred to above, shall comply with the standards of conduct set forth in the Secretary General's Bulletin ST/SGB/2003/13 of 9 October 2003, concerning "Special measures for protection from sexual exploitation and sexual abuse" ("SEA").
 - (b) Moreover, and without limitation to the application of other regulations, rules, policies and procedures bearing upon the performance of the activities under this Project Document, in the implementation of activities, the Implementation Partner, and each of its sub-parties referred to above, shall not engage in any form of sexual harassment ("SH"). SH is defined as any unwelcome conduct of a sexual nature that might reasonably be expected or be perceived to cause offense or humiliation, when such conduct interferes with work, is made a condition of employment, or creates an intimidating, hostile or offensive work environment. SH may occur in the workplace or in connection with work. While typically involving a pattern of conduct, SH may take the form of a single incident. In assessing the reasonableness of expectations or perceptions, the perspective of the person who is the target of the conduct shall be considered.
5. a) In the performance of the activities under this Project Document, the Implementation Partner shall (with respect to its own activities), and shall require from its sub-parties

referred to in paragraph 4 (with respect to their activities) that they, have minimum standards and procedures in place, or a plan to develop and/or improve such standards and procedures in order to be able to take effective preventive and investigative action. These should include policies on sexual harassment and sexual exploitation and abuse; policies on whistleblowing/protection against retaliation; and complaints, disciplinary and investigative mechanisms. In line with this, the Implementation Partner will and will require that such sub-parties will take all appropriate measures to:

- i. Prevent its employees, agents or any other persons engaged to perform any services under this Project Document, from engaging in SH or SEA.
- ii. Offer employees and associated personnel training on prevention and response to SH and SEA, where the Implementation Partner and its sub-parties referred to in paragraph 4 have not put in place its own training regarding the prevention of SH and SEA, the Implementation Partner and its sub-parties may use the training material available at UNDP.
- iii. Report and monitor allegations of SH and SEA of which the Implementation Partner and its sub-parties referred to in paragraph 4 have been informed or have otherwise become aware, and status thereof.
- iv. Refer victims/survivors of SH and SEA to safe and confidential victim assistance; and
- v. Promptly and confidentially record and investigate any allegations credible enough to warrant an investigation of SH or SEA. The Implementation Partner shall advise UNDP of any such allegations received and investigations being conducted by itself or any of its sub-parties referred to in paragraph 4 with respect to their activities under the Project Document, and shall keep UNDP informed during the investigation by it or any of such sub-parties, to the extent that such notification (i) does not jeopardize the conduct of the investigation, including but not limited to the safety or security of persons, and/or (ii) is not in contravention of any laws applicable to it. Following the investigation, the Implementation Partner shall advise UNDP of any actions taken by it or any of the other entities further to the investigation.

b) The Implementation Partner shall establish that it has complied with the foregoing, to the satisfaction of UNDP, when requested by UNDP or any party acting on its behalf to provide such confirmation. Failure of the Implementation Partner, and each of its sub-parties referred to in paragraph 4, to comply with the foregoing, as determined by UNDP, shall be considered grounds for suspension or termination of the Project.

6. Social and environmental sustainability will be enhanced through application of the UNDP Social and Environmental Standards (<http://www.undp.org/ses>) and related Accountability Mechanism (<http://www.undp.org/secu-srm>).
7. The Implementation Partner shall: (a) conduct project and programme-related activities in a manner consistent with the UNDP Social and Environmental Standards, (b) implement any management or mitigation plan prepared for the project or programme to comply with such standards, and (c) engage in a constructive and timely manner to address any concerns and complaints raised through the Accountability Mechanism. UNDP will seek to ensure that communities and other project stakeholders are informed of and have access to the Accountability Mechanism.
8. All signatories to the Project Document shall cooperate in good faith with any exercise to evaluate any programme or project-related commitments or compliance with the UNDP

Social and Environmental Standards. This includes providing access to project sites, relevant personnel, information, and documentation.

9. The Implementation Partner will take appropriate steps to prevent misuse of funds, fraud or corruption by its officials, consultants, responsible parties, subcontractors, and sub-recipients in implementing the project or using UNDP funds.
10. In the implementation of the activities under this Project Document, UNDP places reasonable reliance upon the Implementation Partner for it to apply its laws, regulations and processes, and applicable international laws regarding anti money laundering and countering the financing of terrorism, to ensure consistency with the principles of then in force the UNDP Anti-Money Laundering and Countering the Financing of Terrorism Policy.
11. The Implementation Partner will ensure that its financial management, anti-corruption, anti-fraud and anti-money laundering and countering the financing of terrorism policies are in place and enforced for all funding received from or through UNDP.
12. The requirements of the following documents, then in force at the time of signature of the Project Document, apply to the Implementation Partner: (a) UNDP Policy on Fraud and other Corrupt Practices and (b) UNDP Office of Audit and Investigations Investigation Guidelines. The Implementation Partner agrees to the requirements of the above documents, which are an integral part of this Project Document and are available online at www.undp.org.
13. In the event that an investigation is required, UNDP has the obligation to conduct investigations relating to any aspect of UNDP projects and programmes in accordance with UNDP's regulations, rules, policies, and procedures. The Implementation Partner shall provide its full cooperation, including making available personnel, relevant documentation, and granting access to the Implementation Partner's (and its consultants', responsible parties', subcontractors', and sub-recipients') premises, for such purposes at reasonable times and on reasonable conditions as may be required for the purpose of an investigation. Should there be a limitation in meeting this obligation, UNDP shall consult with the Implementation Partner to find a solution.
14. The signatories to this Project Document will promptly inform one another in case of any incidence of inappropriate use of funds, or credible allegation of fraud or corruption with due confidentiality.

Where the Implementation Partner becomes aware that a UNDP project or activity, in whole or in part, is the focus of investigation for alleged fraud/corruption, the Implementation Partner will inform the UNDP Resident Representative/Head of Office, who will promptly inform UNDP's Office of Audit and Investigations (OAI). The Implementation Partner shall provide regular updates to the head of UNDP in the country and OAI of the status of, and actions relating to, such investigation.

15. UNDP shall be entitled to a refund from the Implementation Partner for any misused funds, including those resulting from fraud, corruption, embezzlement, other financial irregularities, or payments made in a manner inconsistent with the terms and conditions of the Project Document. Such an amount may be deducted by UNDP from any payment due to the Implementation Partner under this or any other agreement. The recovery of such

funds by UNDP shall in no way reduce or limit the Implementation Partner's obligations under this Project Document.

Where such funds have not been refunded to UNDP, the Implementation Partner agrees that donors to UNDP (including the Government) whose funding is the source, in whole or in part, of the funds for the activities under this Project Document, may seek recourse to the Implementation Partner for the recovery of any funds determined by UNDP to have been used inappropriately, including through fraud or corruption, other financial irregularities, or otherwise paid other than in accordance with the terms and conditions of the Project Document.

Note: The term "Project Document" as used in this clause shall be deemed to include any relevant subsidiary agreement further to the Project Document, including those with responsible parties, subcontractors and sub-recipients.

16. Each contract issued by the Implementation Partner in connection with this Project Document shall include a provision representing that no fees, gratuities, rebates, gifts, commissions or other payments, other than those shown in the proposal, have been given, received, or promised in connection with the selection process or in contract execution, and that the recipient of funds from the Implementation Partner shall cooperate with any and all investigations and post-payment audits.
17. Should UNDP refer to the relevant national authorities for appropriate legal action any alleged wrongdoing relating to the project, the Government will ensure that the relevant national authorities shall actively investigate the same and take appropriate legal action against all individuals found to have participated in the wrongdoing, recover and return any recovered funds to UNDP.
18. The Implementation Partner shall ensure that all of its obligations set forth under this section entitled "Risk Management" are passed on to each responsible party, subcontractor and sub-recipient and that all the clauses under this section entitled "Risk Management Standard Clauses" are included, *mutatis mutandis*, in all sub-contracts or sub-agreements entered into further to this Project Document.

Special Clauses. In case of government cost-sharing through the project, the following clauses should be included:

1. The schedule of payments and UNDP bank account details.
2. The value of the payment, if made in a currency other than United States dollars, shall be determined by applying the United Nations operational rate of exchange in effect on the date of payment. Should there be a change in the United Nations operational rate of exchange prior to the full utilization by the UNDP of the payment, the value of the balance of funds still held at that time will be adjusted accordingly. If, in such a case, a loss in the value of the balance of funds is recorded, UNDP shall inform the Government with a view to determining whether any further financing could be provided by the Government. Should such further financing not be available, the assistance to be provided to the project may be reduced, suspended, or terminated by UNDP.
3. The above schedule of payments considers the requirement that the payments shall be made in advance of the implementation of planned activities. It may be amended to be consistent with the progress of project delivery.
4. UNDP shall receive and administer the payment in accordance with the regulations, rules, and directives of UNDP.
5. All financial accounts and statements shall be expressed in United States dollars.
6. If unforeseen increases in expenditures or commitments are expected or realized (whether owing to inflationary factors, fluctuation in exchange rates or unforeseen contingencies), UNDP shall submit to the government on a timely basis a supplementary estimate showing the further financing that will be necessary. The Government shall use its best endeavors to obtain the additional funds required.
7. If the payments referred above are not received in accordance with the payment schedule, or if the additional financing required in accordance with above is not forthcoming from the Government or other sources, the assistance to be provided to the project under this Agreement may be reduced, suspended, or terminated by UNDP.
8. Any interest income attributable to the contribution shall be credited to the UNDP Account and shall be utilized in accordance with established UNDP procedures. In accordance with the decisions and directives of UNDP's Executive Board:
The contribution shall be charged:
 - (a) [3%] cost recovery for the provision of general management support (GMS) by UNDP headquarters and country offices
 - (b) Direct cost for implementation support services (ISS) provided by UNDP and/or an executing entity/Implementation Partner.
9. Ownership of equipment, supplies and other properties financed from the contribution shall vest in UNDP. Matters relating to the transfer of ownership by UNDP shall be determined in accordance with the relevant policies and procedures of UNDP.
10. The contribution shall be subject exclusively to the internal and external auditing procedures provided for in the financial regulations, rules, and directives of UNDP."

XI. ANNEXES

- 1. Project Quality Assurance Report**
- 2. Social and Environmental Screening**
- 3. Risk Analysis**
- 4. Project Advisory Board Terms of Reference**
- 5. 2025 Annual Work Plan (AWP)**