



# Climate Change Capacity Development and Collaborative Action Plan for the EPA, Ghana

In Support of Implementation of  
The Private Sector Engagement Strategy 2021

January 2021

Prepared Under the Private Investment for Enhanced Resilience (PIER) Project



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Date: January 2021

## PROJECT:

Private Investment for Enhanced Resilience (PIER)

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# Executive Summary

With Ghana's Environmental Protection Agency's (EPA) commitments to increase and improve staff capacity in engaging with private sector actors in resilience towards the achievement of the country's National Adaptation Plans and other commitments made to the UNFCCC, Winrock International has supported the preparation of this Capacity Development Strategy and Collaborative Framework Implementation Plan.

This capacity Building Strategy and Collaborative Framework Implementation Plan is tethered to the National Adaptation Plan's Private Sector Engagement Strategy launched in 2020 by the Ghana EPA and the International Institute for Sustainable Development. The NAP PSES was developed to enhance private sector engagement in climate change action in Ghana in both NAP planning/development and in its implementation. The PSES therefore identifies several key private sector actors, and how best to engage them in the implementation of the NAP. It prioritizes the federations and associations as the first point of call for engaging the private sector in resilient development. The PSES further considers how strategic alliances can be developed, including through public-private partnerships (PPPs).

To successfully institute public-private partnerships and implement the modalities contained in the PSES on government engagement with private sector, the capacity of EPA staff to undertake these actions is critical. This is the gap that this Capacity Building Strategy and Collaborative Framework Implementation Plan seeks to plug at area, regional and national head office. This Plan therefore via in-country consultations, documentary review and EPA staff interviews, highlights capacity gaps and identifies actions to improve institutional capacity of the EPA to engage private sector actors.

By implementing key activities identified under specific strategic approaches outlined in this plan, there are strategic objectives that will be met and therefore contribute to achieving stronger engagement between EPA and private sector actors in adaptation financing and implementation to increase resilience in Ghana. As part of the plan, 6 capacity development principles including transparency, purposefulness, responsiveness to priority areas, etc, have been identified as core values essential for the process of staff capacity development and for collaborative action with other actors.

Activities in this plan are set over a 24-month timeline after which a monitoring and evaluation will be carried out to ascertain if the action plan is meeting the required needs, identify any capacity gaps that may still exist, and inform on opportunities to be included in a continuing phase of further capacity development and collaborative efforts. For this first phase, key objectives of the plan are:

- Define staff capacities required for effective private sector engagement and identify capacity gaps/needs
- Optimize knowledge management
- Increase learning and research opportunities
- Integrate resilience requirements into core environmental application protocols
- Continuously align private sector engagement approaches, and reinforce resource mobilization, and utilization for private sector engagement

This capacity development plan and collaborative framework implementation plan will build staff awareness of and capacity in the country's NAP, and facilitate engagement with the various private sector actors.

# 1. Background

Ghana, with a population of 30 million<sup>1</sup> people has in recent years witnessed a burgeoning economy that is still very much dependent on its natural resources like forestry, agriculture, and hydropower energy. The country's developmental efforts, and its ambition to achieve the Sustainable Development Goals remain at risk from climate change. In 2018, Ghana ranked 112 out of 181 countries measured for climate vulnerability and was therefore the 69th most vulnerable country and the 73rd least ready country<sup>2</sup>. The major impacts of Climate change and variability in Ghana have been identified as increasing temperature, change in rainfall, and sea level rise. The mean annual temperature is projected to increase by 1.0-3.0°C by the 2060's, and 1.5-5.2°C by the 2090's, with the projected rate of warming being most rapid in the northern inland regions of Ghana. For precipitation, total annual rainfall is projected to decline by 1.1%, and 20.5% in 2020 and 2080, respectively<sup>3</sup>. Climate change is projected to impact water resources, energy supplies, crop production, food security and infrastructure.

Since Ghana became a signatory to the United Nations Framework Convention on Climate Change (UNFCCC), the country has exhibited a strong regard in working to reduce the threats and impacts that a changing climate presents. Ghana continues to take steps to integrate climate actions into development activities at national and sub-national levels. The Ministry of Environment, Science, Technology and Innovation (MESTI) on behalf of the Government of Ghana developed the National Climate Change Adaptation Strategy (2012); enacted the 2013 National Climate Change Policy; committed and developed its Nationally Determined Contributions (2015); and developed a National Climate Change Master Plan Action Programmes for Implementation over 2015 -2020 period. The National Climate Change Policy prioritizes five main policy areas as agriculture and food security, natural resource management, disaster preparedness and response, equitable social development and energy, and industrial and infrastructural development. The latest action in the series of climate smart actions being the development of the National Adaptation Plan framework which proposes sectoral-based approach to climate change adaptation planning in Ghana. The framework assesses Ghana's governance systems and structures and highlights certain approaches that should underpin a successful NAP process in Ghana. The governance approach requires both a vertical integration (i.e. mainstreaming adaptation across sub-national structures) and horizontal integration (i.e. integrating adaptation across ministries, departments and agencies) to ensure that climate change is well integrated in the different governance levels and economic sectors of development planning. Another major approach is the principle for inclusive stakeholder engagement in NAP planning and implementation especially the private sector which has minimal recorded engagement in adaptation and resilience building in Ghana.

<sup>1</sup><https://data.worldbank.org/indicator/SP.POP.TOTL?locations=GH> (accessed 21/01/21)

<sup>2</sup><https://gain-new.crc.nd.edu/ranking> (accessed 23/02/21)

<sup>3</sup><https://climateknowledgeportal.worldbank.org/country/ghana/climate-data-projections> (accessed 3/12/20)

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Private sector engagement in adaptation and resilience building has become a key topic of discussion in many countries mainly due to the realization that donor funding is not positioned to sustainably support adaptation actions in the longer term. Private sector can therefore play several critical roles in building resilience. However, private sector is not homogenous but highly diverse and therefore engaging them requires a strategy that targets all the different types of private sector actors. Earlier studies commissioned by the EPA indicated that based on the types of private sector in Ghana, the two broad ways within which private sector can engage in adaptation is in minimizing climate impacts to business delivery and markets, and creating markets in technologies and services that are beneficial to adaptation.

Therefore, to foster private sector engagement in the NAP process, the Environmental Protection Agency (EPA) of Ghana with support from the U.S. In-country Support Program managed by the Institute of Sustainable Development (IISD) have developed a Private Sector Engagement Strategy (PSES). The PSES lays out the opportunities and entry points that exist for engaging with the different stakeholder federations and associations for climate action.

## 1.1 Report objectives

To take the PSES further and support the process of enhancing private sector engagement in the NAP process to build resilience, the EPA with support from the PIER project of Winrock International has produced this Capacity Development Action Plan. The Private Investment for Enhanced Resilience (PIER) project was designed to help bridge the finance gap between public funds and on-the-ground needs to adapt to climate change. Private sector investment is a crucial component in achieving resilience to climate change, yet aside from social-impact investors and a few large corporations that have made a commitment to sustainability, the private sector is not fully considering risks-to-profit due to climate change.

PIER advocates private capital and the business sector as keys to promote global growth and reduce investment risk through enhancing resilience. PIER promotes activities that aim to mobilize private investment for resilience in multiple countries. To this end, PIER supported Ghana's Environmental Protection Agency efforts to build capacity and engage the private sector in implementing adaptation opportunities within Ghana's Private Sector Engagement Strategy<sup>4</sup>.

This **Climate Change Capacity Development and Collaborative Action Plan** highlights capacity gaps and identifies actions to improve institutional capacity of the EPA to engage private sector actors. The plan sets out a Capacity Development vision and mission and lays out strategic actions and approaches to be implemented by the EPA to improve its capacity in implementing the NAP Private Sector Engagement Strategy.

<sup>4</sup>In parallel to PIER's collaboration with the EPA, the project partnered with ECOM Agroindustrial Corp. Ltd (ECOM) in Ghana to develop a sustainable service delivery model for cocoa farm rehabilitation. The results of the collaboration with ECOM are detailed in a separate report.

## 2. Situational analysis

A desk study situational analysis and primary data collection was carried out from October 2019 to May 2020 to understand the existing policy and institutional environment regarding private sector engagement in building resilience in Ghana. The methodologies employed included:

- In-country stakeholder consultation with private sector actors, non-governmental organizations and government officials on perceived institutional capacity gaps hindering EPA's engagement with the different actors within the private sector.
- Capacity assessments through questionnaires administered amongst EPA staff to gauge individual and organizational capacities in climate change knowledge, skills and use; strategy development; private sector engagement and collaboration.
- Desk review of Ghana's 2020 Private Sector Engagement Strategy

### 2.1 In-country consultations

A cross-section of stakeholders were identified, and bilateral consultations were held with these actors including representatives from the Ghana National Association of Poultry Farmers, the Federation Association of Ghanaian Exporters, UNDP Ghana, Biogas Technologies Africa, EPA, the Association of Oil Marketing Companies, and the Association of Small-Scale Industries. The consultations helped identify preliminary interests, opportunities and constraints of the role(s) that private sector actors can play in adaptation in Ghana, and existing gaps in engaging with the EPA. The full report of the in-country consultations is available as Appendix 1 and augments the consultations with private sector actors that informs the Ghana PSES.

The private sector actors consulted under the study belonged to key development sectors such as agriculture, telecommunications, and the oil and gas sector. The consultations indicated several constraints to private sector engagement in climate resilience in Ghana and corresponding factors to enable engagement. Specific roles mentioned for EPA in enabling PS engagement include:

- Raising awareness, training and building capacity on CC adaptation and resilience for private sector actors
- MESTI/EPA improving collaboration and coordination amongst stakeholders to enrich policy decisions and strategies with experiential information and insights
- Linking resilience efforts to broader sustainability and development frameworks
- Using existing committees, working groups and platforms
- Integrating CC into Environmental impact assessment and environmental reporting
- Developing and adopting green standards and certification
- Building and showcasing profitable green business cases by EPA through partnerships

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## 2.2 Capacity assessments

Capacity assessments were conducted for a cross-section of EPA staff to identify existing capacity strengths, capacity needs, and capacity development opportunities and avenues to promote engagement of private sector actors in resilience. The assessment, conducted via questionnaires, required respondents to provide feedback to several capacity questions using a quantitative 4-point Likert scale, but also providing qualitative responses to others. In using the 4-point scale, respondents had to indicate 0 (don't know); 1 (strongly disagree); 2 (disagree); 3 (agree); 4 (strongly agree). Using this approach provided a flexible and practical approach to benchmarking the existing capacity of EPA staff in engaging in resilience actions with the private sector. The assessment investigated individual knowledge, skills and use; collective organizational climate knowledge, skills and use; organizational capacity in PS engagement, collaboration and cooperation; strategy development; and of existing policies, initiatives and strategies.

**1. Staff climate change knowledge, skills and use capacity:** Existing key capacities for individual staff were assessed to ascertain staff engagement with climate change and resilience in the organization (see Annex 1). From assessments of staff capacity on climate change knowledge, skills and use, findings indicate that there is strong need for capacity on how to engage the private sector in resilience activities. With different private sector actors having different needs in engaging in resilience, staff knowledge on the PSES is required as part of building the capacity on how PS is engaged. High capacity in climate change knowledge, skills and use includes being able to follow up on and be up to date on knowledge and news on climate change adaptation and resilience.

- Fifty (50) percent of the interviewed staff are currently able to engage the private sector in adaptation actions within their various work mandates.
- Majority of the staff felt they were well updated on climate change news and could explain adaptation and resilience to peers and stakeholders.
- About 3 out of 4 staff indicated attendance of climate change workshops and trainings (2.9/4) while 2 out of 4 staff had received trainings tailored towards adaptation. However, most of the staff strongly agree that staff need more training on adaptation and adaptation planning to improve their capacity to build resilience into their work (3.5/4).
- A little more than half of the assessed staff were aware of the NAP and its framework (2.7/4), and also similar number of staff have familiarity with climate finance sources and mobilisation of these resources for resilience (2.6/4).
- The least rated questions in this session were questions that assessed the formal degree training that staff had in climate change (2.1/4) and recognised formal education in adaptation and resilience (1.8/4).



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**2. Organizational climate change knowledge, skills and use capacity:** As part of the assessment, capacity with respect to knowledge, skills and use was conducted at the organizational level (see Annex 2). Staff were asked to rate capacity of the EPA as an organization unlike the initial assessment which was a ranking of their individual capacities. High capacity of the organisation in climate change knowledge and skills includes the ability for EPA to often develop and share climate change news, reports and updates to all staff. As part of the ideal capacity, EPA prepares, synchronizes and packages climate data for use by staff and other stakeholders who demand such data.

- Staff feedback indicates that the EPA CC Unit prepares and synthesizes climate data and information for use by PS (2.2/4) and other stakeholders (2.3/4) to some extent. There is however opportunity to improve this service capacity.
- EPA Staff have received several trainings on climate change adaptation and resilience (2.7/4), giving staff the knowledge and capacity to prepare and deliver presentations and trainings.
- More than half of the staff (2.7/4) indicated that they have good understanding of existing climate change finance sources and some capacity to mobilise these resources.
- The data showed that the capacity of EPA in organizing adaptation workshops for its staff (2.7/4) is similar to capacity to demand data from other stakeholders to aid decisions making.
- The assessments in this section also asked staff to rank their perspective on staff's capacity on climate change finance, sources and mobilization. The average rating was in the same region as the average tabulated from individual's ranking of their knowledge of climate finance. This lends some validation to the fact that more capacity of staff needs to be built in climate finance and its mobilization.
- The EPA is not able to support PS to understand the link between their roles and climate change policies/activities as much as is needed (1.3/4).
- Just as the foregoing, the rating is less than average for EPA staff knowledge on climate change strategies, priorities, and policies and how these relate to their roles and functions as staff of EPA. For instance, the Manufacturing Industry Department has various aspects of engagement with the Private sector (industries) with respect to issuance of Environmental Permits. This is done during field verifications and compliance exercises taking into consideration permits issued to the industry in relation to resource use at the manufacturing site.

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**3. Organizational capacity in engaging, collaborating and coordinating with private sector:** High capacity in engagement, collaboration and coordination is being able to have adequate financial and human capital to mobilise private sector actors, and partner private sector actors in programmes, projects and initiatives (see Annex 3).

- The rating by staff of EPA's dedication of resources for collaboration with the private sector was scored below average of the full ratings (1.8/4).
- Staff were of a relatively higher regard that there is a mutually supportive and productive collaboration among EPA and other government agencies that deal with the private sector (2.8/4).
- The ability of EPA to support private sector actors with technical assistance and capacity building, plus having a recognised and accessible platform for engagement, feedback and decision-making is also ideal for engaging private sector actors. Findings indicate that there is no well-known and easy access to climate change platforms that foster private sector engagement. There is the National Climate Change Steering Committee that has a private sector representative, but this is not enough for engaging private sector in resilience actions and strategies beyond mainly policy discussions and strategy formulation.
- Under this form of capacity, EPA should be able to collate and synthesize different interests and views of several stakeholders engaged in decision-making to be considered as highly capable. The assessment also considered the EPA's capacity in effectively engaging with, collaborating and coordinating partnerships with the private sector. Average number of respondents agreed that EPA engages the private sector in resilience actions, holds trainings on adaptation for these private sector actors despite the low staff numbers of the climate change unit which impacts engagement with private sector (2/4). For example, private sector is engaged in national adaptation planning processes through Peer Learning. There was also an education and tree planting programme at Begoro in the Eastern Region with Ghana Telecom company.
- EPA does support green business development in several ways (2/4) but knowledge in co-production with PS is minimal (1.9/4) and needs to be deepened.

**4. Organizational capacity in strategy development:** Capacity assessment of the EPA with regards to strategy development emerged that there is commendable capacity to monitor and evaluate strategic contributions to policy outcomes and localize international policies like those from UNFCCC (2.8/4) (see Annex 4). The EPA engages multiple stakeholders in strategy development but as part of its strategy development, the organisation needs improvement in its systems to collect, analyse and synthesize data for action plans. A typical example is engaging the Private sector in the Ghana NAP Process to develop the private sector engagement strategy.



### 5. Enabling environment (policies, laws and initiatives) capacity for private sector engagement:

High capacity in policies, laws and initiatives includes: Enabling directives that promote the registration and existence of businesses (see Annex 5).

- Staff viewed cumbersome business start-up process as one of the disabling factors for private sector engagement in resilience (2.1/4) but relatively did not consider as much that bureaucracy deters private sector engagement (1.7/4). A case in point is that there are lower processing fees for clean energy (solar, wind and biomass energy plants), and sorting and segregation of waste.
- An enabling environment fostering high capacity includes strong financial sector supporting all forms of businesses including green businesses. The staff of EPA indicated that government incentives for green business and financial support for business in resilience was low (1.1/4).
- Existing analysis of enabling environment and recommendations on improvements is key to promote the engagement with private sector. However, the lowest score across all the capacity ratings was on the existence of an assessment of the enabling environment for PS engagement in resilience (0.8/4).
- There are very minimal processes where EPA requires PS to be green and foster resilience (1.7/4).
- The capacity assessment also looked at the existing enabling environment with regards to policies, laws and initiatives for private sector engagement in resilience and enabling directives that foster engagement of private sector in resilience. About average number of respondents agree that there are existing policies that foster private sector engagement in resilience (2.1/4). For example, the National Climate Change Policy, EPA Act 490, Ghana National Communication Strategy. The Ghana Investment Promotion Centre (GIPC) has a special incentive package in place for strategic investors where investors (Private sector) are given tax waiver if their investments are not less than \$50m. As part of granting the waiver, the use of green technology is taken into consideration.

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## 2.3 Private Sector Engagement Strategy for the NAP Process

The NAP PSES<sup>5</sup> was developed to enhance private sector engagement in climate change action in Ghana. The document considers the role of the private sector in both in NAP planning/development and in its implementation. Ghana's NAP process seeks to identify priority climate adaptation actions; facilitate institutional coordination around climate change adaptation; and accelerate mobilization of funds for climate change adaptation. The Government of Ghana, through the Ghana EPA released the National Adaptation Plan Framework which guides the development of Ghana's national adaptation plan, the coordination process of developing the plan, and the implementation of the plan. Overall, the framework serves as a guide, outlines the country's vision, objectives and principles for the NAP process, and contributes to addressing the country's adaptation needs in a coherent and coordinated manner.

The PSES recognizes that there are efforts underway in Ghana to engage the private sector in relation to climate change and more broadly in public policy. There are several strategies, policies, and initiatives that identify the important role of private sector and serve as potential avenues for private sector engagement in resilient development. These include the National Climate Change Adaptation Strategy, the PPP Policy, the National Climate Change Policy, the Viability Gap Scheme and the Project Development Facility, amongst others. Other efforts profiled by the PSES of private sector engagement in climate action is the established Nationally Appropriate Mitigation Action private sector platform, and the Nationally Determined Contributions private sector engagement. These platforms are crucial in providing lessons learnt and best practices for the NAP process to build on and solidify private sector investment (funds, time, activities) in resilience.

The PSES identifies several key private sector actors, and how best to engage them in the implementation of the NAP. It prioritizes the federations and associations as the first point of call for engaging the private sector in resilient development. The federations and associations vary in characteristics with some being sector focused and other representing general business community interests. A key example of the federation considered to be fundamental to private sector engagement is the Private Enterprise Foundation. The PSES further considers how strategic alliances can be developed, including through public-private partnerships (PPPs). The identified potential roles for private sector organizations in NAP development and implementation include:

- Information sharing, awareness raising, communications
- Capacity Building

<sup>5</sup>Available at <https://napglobalnetwork.org/wp-content/uploads/2020/05/nagn-en-2020-ghana-private-sector-engagement-strategy-for-nap.pdf>

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- Establishment of context, background and challenge identification
  - Identification of measures to overcome vulnerability
  - Sharing results and best practices
  - Financing climate resilience

Within NAP planning and implementation, most private sector actors that were included in the development of the PSES, indicated as their potential role the ability to contribute to capacity building and to review/identify measures. On the other hand, most of the private sector actors did not consider having the ability to provide adaptation services, to implement projects with funding, and to finance measures whether internally funded or externally sourced. In the interim, the PSES seeks to implement two key activities that though independent, can complement the NAP process. These are:

- Providing tailored, industry-specific awareness-raising and/or capacity building on climate change impacts and adaptation to actors whose understanding and knowledge is limited.
- For actors who are aware of the current and potential effects of climate change, organize industry-specific training on methodologies, approaches, and tools to conduct a vulnerability assessment and identify adaptation options.

The PSES identified modalities for the government to engage the private sector in the NAP process, and national adaptation and resilience efforts through:

- Incorporation of private sector actors within the cross-sectoral policy groups to be established under the NAP process
- Engagement through existing forums with public and private membership
- Awareness-raising through industry events
- Purpose-driven training workshops



### 3. Institutional capacity development and collaborative framework for Private Sector climate action

Ghana's economic development including its rise to middle income status, is highly reliant on its natural resource capital such as forests, minerals, oil, and water resources. The growth of the national economy has been shown to be inversely related to environmental integrity. The economy is burgeoning on the back of forest destruction, land degradation, pollution (air, soil, water), water bodies destruction, among other adverse environmental impacts. According to the 2020 World Bank Ghana Country Environmental Analysis, environmental degradation costs the West African nation a sum of \$6.3 billion annually<sup>6</sup>. A degraded environment is not sustainable as it puts agriculture, livelihoods and non-renewable natural resources at risk. It also increases vulnerability of sectors and population within the country to impacts of climate risks.

Government of Ghana is prioritizing environmental issues as core in development planning and implementation by working to mainstream climate change at the national and sub-national levels where the local government assemblies are steering local development. With the increasingly important role that private sector is playing in growing Ghana's economy, it is imperative that such stakeholders are engaged in planning, implementation, and monitoring of resilience and environmental integrity to ensure that the environment is not treated as an externality. Therefore, in line with international discussions, the private sector has been identified by the Government of Ghana, as a critical actor to engage in the National Adaptation Plan, for which a Private Sector Engagement Strategy (PSES) has been instituted.

To institute and implement the NAP PSES, the capacity of the EPA to drive the process is a key enabling factor that needs to be strengthened. Based on the identified capacity needs and opportunities, and the engagement modalities in the PSES, capacity development of the EPA as the lead Government institution in charge of the NAP is required to improve performance at several levels. It is crucial that this institutional capacity development and collaborative framework is tethered to the PSES to secure its sustainability in the long term.

The capacity development collaborative framework includes various approaches, strategies and methodologies that target human resource development, organizational development, and institutional and legal framework development. The strategic objectives and strategic approaches together with associated implementation plans are laid out in this section.

<sup>6</sup><http://documents1.worldbank.org/curated/en/419871588578973802/pdf/Ghana-Country-Environmental-Analysis.pdf>



## 3.1 Strategy Vision and Mission

### Capacity Development Vision:

- Stronger engagement between EPA and private sector actors in adaptation financing and implementation to increase resilience in Ghana and meet international commitments including those from the UNFCCC.

### Capacity Development Mission:

- To facilitate a holistic and integrated approach to sustainable capacity development of EPA head office departments as well as regional and area offices through education and training, information sharing, exchange programmes, partnerships, resource mobilization and utilization, and research

## 3.2 Strategic Objectives and Strategic Approaches

To meet the vision and mission of the capacity building development and collaborative framework, requires strategic objectives and strategic approaches as indicated in figure 1 below. These strategic objectives and approaches serve as the operational framework within which the Climate Change Unit of EPA Ghana will work to build capacity of its staff at head office, regional and area offices. The strategic approaches inform the key activities in section 3.4 which contains the capacity development and collaborative framework. The key activities, strategic approaches and objectives will be monitored based on indicators that have been developed in the capacity development and collaborative framework.

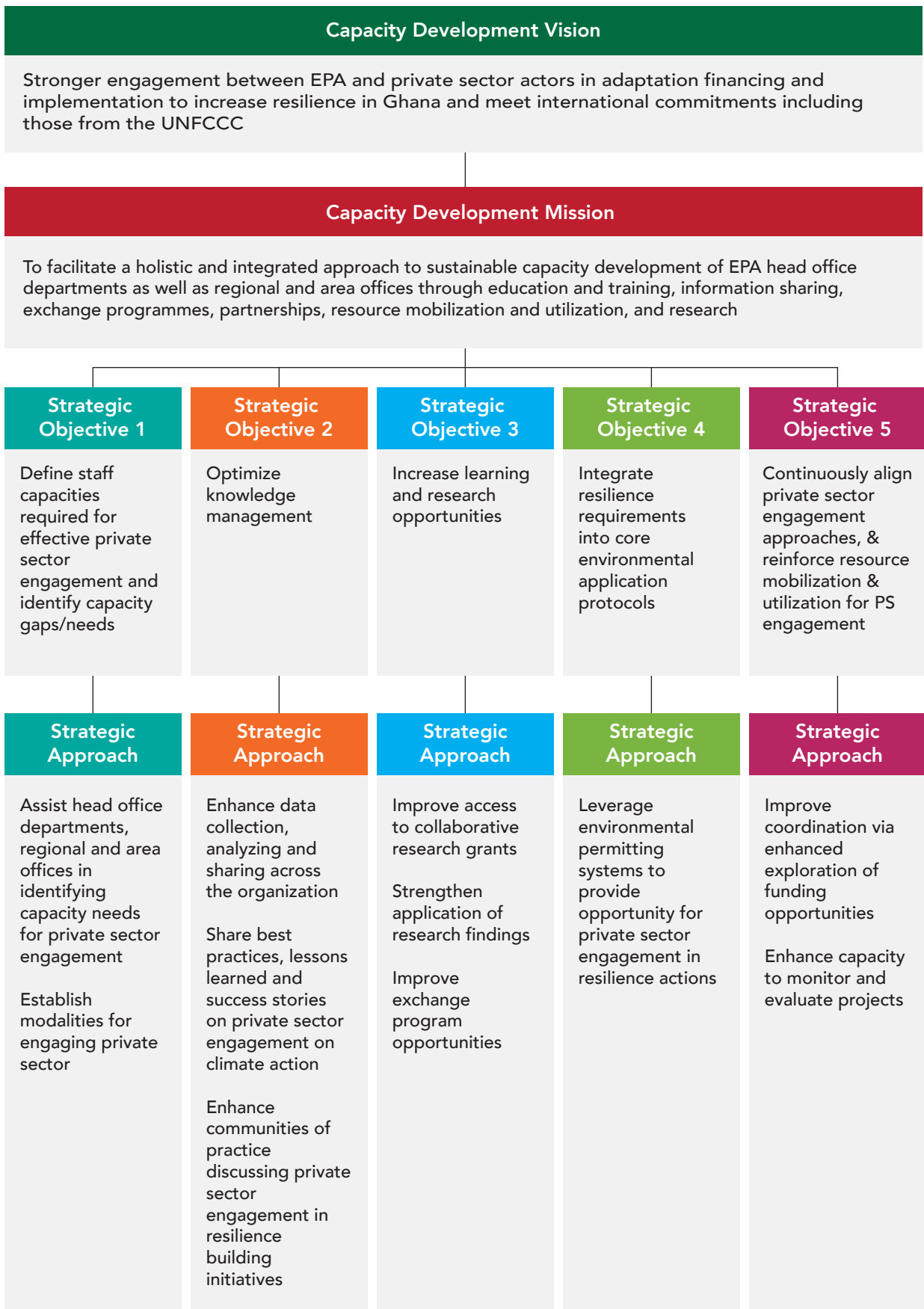


FIGURE 1. CAPACITY DEVELOPMENT VISION, MISSION, OBJECTIVES, AND APPROACHES



## 3.3 Principles of Capacity Development

The approaches to achieve the desired capacity change in EPA Ghana to improve private sector engagement in resilience is informed by a set of key principles. These principles serve as core considerations for all engaged parties in the capacity development and collaboration process to achieve its outcomes and ensure continued success. It is important that these guiding principles of capacity development, as shown in Figure 2 and described further here, are followed in executing all the key activities identified in section 3.4.

### Capacity Development Principles

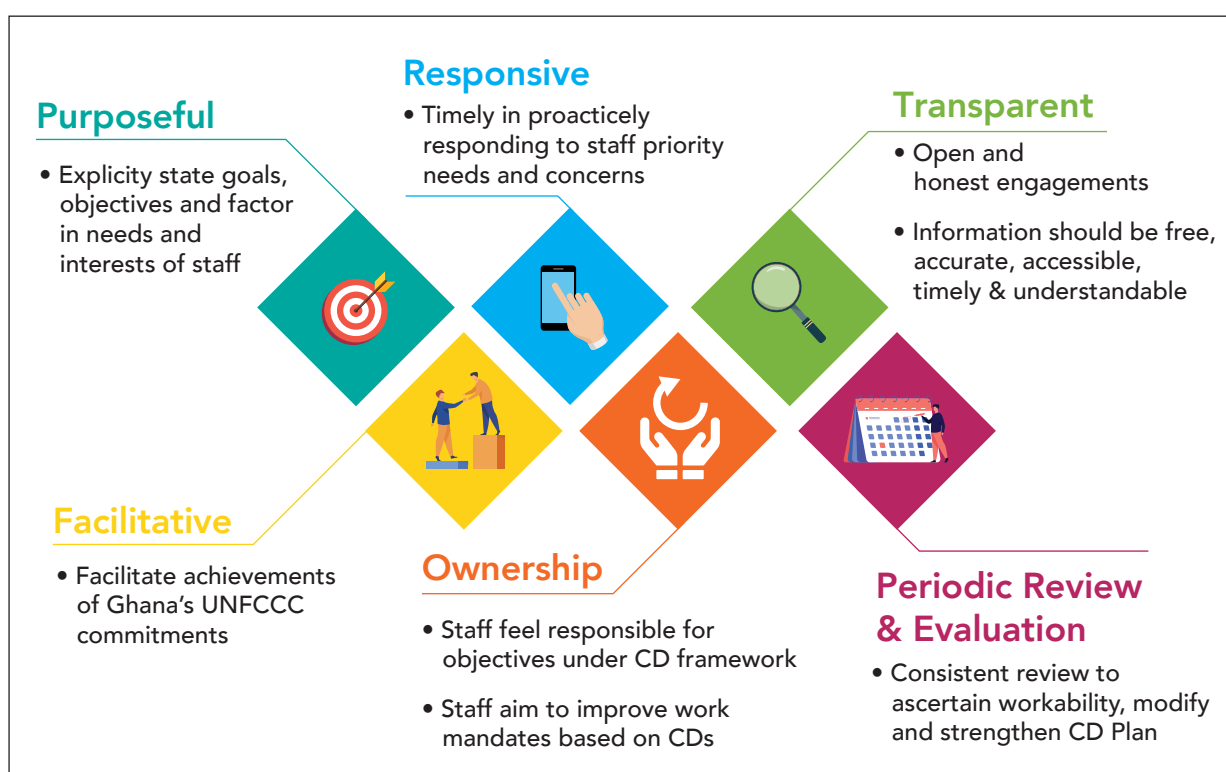


FIGURE 2. PRINCIPLES OF CAPACITY DEVELOPMENT

- Purposeful – Capacity development approaches should be purposeful and communicated clearly to keep staff interested. Any capacity development activity should explicitly state goals, objectives and factor in participants' needs and interests of the several EPA departments and offices. Purposeful approaches allow capacity development to be meaningful, focused and monitored against the goals and objectives. Capacity development should relate to a specific development outcome
- Facilitative – This capacity development should facilitate the achievement of Ghana's national commitments to the UNFCCC for adaptation and resilience especially the National Adaptation Plan, and the Nationally Determined Contributions, and development actions should promote the achievement of the National Climate Change Adaptation Policy and National Climate Change Adaptation Strategy.

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- **Transparent** – Engagement in capacity development should be open and honest. All actors should be aware of what is expected, and the objectives to be met under capacity development. Any monitoring and evaluation results should be open and available to the organization. Information should be free, accurate, accessible, timely, and in a manner that is understandable. There should also be well known feedback platform in addition to having transparency across capacity development process and content.
  - **Responsive** – The capacity development approaches should be timely in pro-actively responding to needs and concerns. The capacity development needs should be met according to the priority of the need and therefore have short, medium, and long-term approaches.
  - **Ownership** – Staff should feel responsible for achieving the objectives under the capacity development framework and own the outcomes. Staff should aim to improve work mandates based on capacity developments.
  - **Periodic review and evaluation** – Consistent periodic review and evaluation will help ascertain if capacity development approaches are working, what needs to be strengthened, and whether changes are needed. Review and evaluation increase the ability to learn and improve through modifications. To effectively review and evaluate, the state of capacities needs to be assessed at the start of the capacity development process.



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## 3.4 EPA Private Sector Capacity Development Strategy and Collaborative Framework Implementation Plan for Climate Action<sup>7</sup>



The Capacity Development Strategy and Collaborative Framework Implementation Plan as below is developed to facilitate climate action via EPA engagement with private sector actors (businesses, associations, federations, financiers, etc.). The plan contains indicators that will be used to measure and monitor the desired outcomes of the key activities. The key activities with assigned responsibilities to appropriate authority figures and/or offices, have been developed with specific timelines under strategic approaches that will lead to achievement of the different strategic objectives. The EPA Climate Change Unit is primarily responsible for this plan and will therefore produce the final report of the capacity building process and outcomes. Audience of the final report will include EPA staff, and the various donors and financiers of the different activities undertaken. As part of reporting on NAPs, NDCs, and progress of the country's climate action in National Communication Reports to the UNFCCC, the final report prepared under this capacity development process will serve as a significant feature. The status of staff capacity post implementation of this capacity development framework compared to pre capacity development will facilitate assist understanding of the desired change achieved, and the gaps and opportunities that could be further explored for both extended and new funding.

<sup>7</sup>The development of this action plan is informed by the content of the EPA Strategic Plan

## Strategic Objective 1: Define staff capacities required for effective private sector engagement on climate resilience and identify capacity gaps/needs

Strategic Approaches	Key Activities	Indicators	Responsibility	Timeline	Description
1.1 Assist head office departments, regional and area offices in identifying detailed capacity needs for PS engagement	1.1.1 Develop capacity needs assessment surveys based on Annex 6 below	1 capacity needs assessment survey questions developed	Climate Change Unit; heads of department, regional and area offices	Months 1-2	For the NAP/PSES Capacity Development Strategy, a capacity needs survey was developed and completed by a sample of employees. It is critical to identify specific departmental, area, and regional office needs by conducting detailed capacity needs using a tailored version of the original needs survey in Annex 1.
	1.1.2 Disseminate surveys in each department across national, regional and area offices, and analyze results on detailed capacity needs	80% or more of departments and offices have conducted surveys and produced capacity needs	Departmental, regional and area office heads	Month 2	The survey should be shared amongst staff in the specific offices to understand the needs and strengths that exist in each department, area or regional office.
	1.1.3 Develop department and regional/area office specific capacity building priorities, based on outcomes from 1.1.2.	Capacity building priorities identified for 17 national office departments, 17 regional offices and 15 area offices	Departmental, regional and area office heads	Months 3 – 5	Results per department, regional, or area office should inform a tailored capacity building strategy or approach that aligns with and prioritizes actions from this wider capacity development action plan.
1.2 Develop materials and modalities for engaging PS at national and sub-regional level	1.2.1 Prepare tailored information on climate change impacts and resilience specific to department/sector to improve staff capacity and as material for staff engagement with private sector	Tailor-made briefs developed for all 17 departments in the headquarters	Climate Change Unit; Heads of departments and offices	Months 1 – 5	Materials specific to sectors and department work areas will serve as reference points for staff engagement with private sector actors in their field. The materials can also serve as part of training toolkits to provide information for new employees that join the department.
	1.2.2 Adopt the best engagement modality for each department/office as per the PSES	Each department has a documented engagement modality for staff	Climate Change Unit; Heads of departments and offices	Months 5 – 6	As per the engagement modalities listed in the NAP PSES, each department, vis-à-vis the work mandates and private sector engaged, should prioritize the best engagement modalities to yield the best results.

## Strategic Objective 2: Optimize knowledge management

Strategic Approaches	Key Activities	Indicators	Responsibility	Timeline	Description
2.1 Enhance staff capacity and knowledge on climate change to improve participation of other EPA offices/ departments in resilience building.	2.1.1 Organize training workshop on Ghana's NAP Private Sector Engagement Strategy, using Annex 7 to flesh out agenda	<p>1 capacity needs assessment survey questions developed</p> <p>80% or more of technical staff (segregated by sex) trained on NAP PSES and engagement modalities</p> <p>50% of training participants understand PSES engagement modalities and have made use of the knowledge</p> <p>25% or more offices/ departments have engaged a private sector in resilient development</p>	Climate Change Unit	Months 1-7	Enhancing staff capacity to engage with the private sector requires knowledge on Ghana's National Adaptation Plan, the Plan Framework and the Private Sector Engagement Strategy. This knowledge needs to be built via series of training workshops that are organized for national staff and staff in the regions and area offices.
	2.1.2 Organize training workshop on climate change governance in Ghana including short, medium- and long-term actions on adaptation and resilience, using Annex 8 to flesh out agenda	<p>6 residential training workshops held</p> <p>At least 90% of staff (segregated by sex) engaged in training</p> <p>80% or more participants are aware and understand Ghana's adaptation and resilience actions</p> <p>50% or more departments/ offices have included adaptation and resilience actions in reports</p>	<p>Climate Change Unit</p> <p>Heads of departments, regional and area offices</p>	Months 9-21	With several actions described in the climate change adaptation strategy, the climate change masterplan, and other initiatives intended to adapt and build resilience in Ghana's development, staff must be knowledgeable on these several short, medium and long-term strategies so that they can link into these actions with their work mandates, plans and activities.
	2.1.3 Capacity building trainings on role of private finance in resilience, climate finance opportunities and resource mobilization using Annex 9 to flesh out agenda	3 capacity building trainings on climate finance, resilience and resource mobilization organized	<p>Climate Change Unit</p> <p>All heads of departments and offices participated</p>	Months 9-15	Long term climate financing cannot rely on donor funding as this is not the intent of donor funding and it is not sustainable. Awareness of the role that private sector finance has in resilience must be deepened so staff can be innovative in seeking funds for public private partnerships in adaptation actions.

## Strategic Objective 2: Optimize knowledge management

Strategic Approaches	Key Activities	Indicators	Responsibility	Timeline	Description
	2.1.4 Organize working sessions to design adaptation actions, develop project concepts and proposals for sector-specific resilience finance	4 or more proposals and concepts developed for sector-specific resilience finance  2 concept notes submitted	Climate Change Unit	Months 1-7	Working sessions will comprise a select number of staff from the key sectors identified in the PSES who will meet periodically to identify gaps, needs and opportunities for concept development and proposal development that can be used for attracting private sector finance
	2.1.5 Training of sectoral adaptation practice trainers	3 training-of-trainers sessions held for department representatives	Climate Change Unit	Months 1-10	Training of trainers in the key NAP PSES identified sectors who will serve as key trainers in their various sectors together with the climate change unit of the EPA.
	2.1.6 Foster opportunities and organize exchange programs and study trips focused on public-private engagement in resilience	4 exchange programs and study trips on public-private engagement in resilience facilitated	EPA Management  Climate Change Unit	Months 11-22	Management makes it a priority to develop new stakeholder relationships with private sector actors and deepen existing relationships in order to organize exchange programs and trips focused on showcasing lessons learnt, successes and challenges that similar public private cooperation in resilience building have experienced.
2.2 Enhance data collection, analyzing and sharing across the organization	2.2.1 Build dedicated space on PS engagement in existing digital platform (CC knowledge hub) for continuous update on funds and projects on climate resilience implemented jointly by public and private sector	1 staff accessible online platform created and dedicated to PS resilience work and collaboration	EPA Management; Climate Change Unit; IT Department; Internal Communications	Months 1-24	EPA has existing platforms like the Climate Change Knowledge Hub; setting up a dedicated space on resources from private sector to the EPA and also Public Privat Partnerships in resilience in Ghana will be a key way of optimizing knowledge management where all staff can access information needed on these resources and finance.
	2.2.2 Build awareness of existing initiatives, outputs, outcomes on PSE related to CC via monthly e-mail news broadcast	24 updates shared via e-news and other digital platforms accessible across departments	Climate Change Unit; Internal Communications	Months 1-24	A simplified monthly collection of news will broadcast PSE activities and projects that are related to resilience and CC to all staff to keep them updated. This will allow staff to develop an understanding of the broader resilience work the organization is pursuing as part of Ghana's commitments to the UNFCCC
2.3 Build an active Community of Practice on Private Sector engagement in enhancing resilience	2.3.1 Discuss best practices, lessons learned and success stories on PS engagement and on PS engagement in resilience	1 community of practice established, actively meeting at least once every two months  5 or more community of practice meeting reports	Climate Change Unit	Months 1-24	The Climate Change Unit should lead a community of practice where individual staff members interested in climate change and resilience meet periodically to exchange experiences, ideas, discuss issues and forge solutions and ideas to advance resilience work. This should be an informal in-person meeting group that mainly requires time resource.

### Strategic Objective 3: Increase learning and research opportunities

Strategic Approaches	Key Activities	Indicators	Responsibility	Timeline	Description
3.1 Improve access to collaborative research grants	3.1.1 Identify and share collaborative climate research opportunities with sectoral departments	Quarterly updates on research opportunities shared with department heads	Climate Change Unit; Internal Communications	Months 2 – 24	Research into collaborative opportunities with the private sector on resilience and share these opportunities with the relevant department or sector heads.
	3.1.2 Identify and profile private sector actors with funds for research	1 central database of potential private sector research funds created on internal website and updated quarterly	Climate Change Unit; Internal Communications	Months 1 – 24	Training of trainers in the key NAP PSES identified sectors who will serve as key trainers in their various sectors together with the climate change unit of the EPA.
	3.1.3 Develop proposals/ business case for collaborative resilience research and submit to private sector actors	4 or more proposals submitted to PS actors in the prioritized sectors in the NAP	Climate Change Unit	Months 4 – 16	Pro-actively develop PPP proposals, concepts or ideas and share with the relevant private sector actors in a bid to attract funding to EPA for resilience work and collaborative action
		# of collaborative research on resilience being implemented	Climate Change Unit	Months 4 – 24	
3.2 Institute a mentorship program – peer knowledge development and young professionals' development	3.2.1 Revitalise EPA mentorship programme and establish mentor-mentee pairings to advance resilience knowledge	A comprehensive list of mentor-mentee pairings  # of meetings held between mentors and mentees	Climate Change Unit	Months 1-24	The EPA started a mentor-mentee programme under an earlier project. Resilience professionals should be paired with younger professionals to train and build capacity in a mentorship relationship. General meetings amongst all enlisted staff in the programme should be held bi-annually to share lessons and exchange mentorship ideas on best practices.
3.3 Strengthen application of research findings	3.3.1 Set up a climate finance research unit that coordinates research and proposes concept developments, and project proposal application in climate resilience from findings	1 cross-department research unit set up with a select-staff group tasked with application of research funding in proposals and concepts notes	Climate Change Unit; Resilience research lab	Months 1-24	EPA undertakes research projects from time to time. Thus to ensure continuity of research findings, there is need to institute a cross-departmental group of select staff that meet occasionally to identify ideas and opportunities, concepts and proposal development from research findings.

## Strategic Objective 4: Integrate resilience requirements into environmental application protocols for private sector initiatives

Strategic Approaches	Key Activities	Indicators	Responsibility	Timeline	Description
4.1 Leverage environmental permitting systems to provide opportunity for private sector engagement in resilience actions	4.1.1 Organize working sessions to update Environmental Impact Assessment guidelines and review guidelines to include requirements for integration of climate change and resilience	All Environmental Impact Assessment guidelines updated to include climate change and resilience	Climate Change Unit; Environmental Assessment and Audit	Months 1 – 10	The various Ghana environmental permitting systems have guidance documents for the private sector application processes and requisite guidance for the staff engaged in reviewing those permits. These application forms and guidance should be reviewed to reflect the importance of climate change adaptation and resilience. It requires the Environmental Audit Department taking lead and inviting the relevant sector specific departments to a working session to review and improve the documents.
	4.1.2 Update annual environmental reporting guidelines to require private sector to report on contribution to building resilience of resources relied on and/or areas operated in	Annual Environmental Reporting guidelines updated to include resilience	Climate Change Unit; Environmental Assessment and Audit	Months 1 – 4	Once a company has been established and is in operation, it is required to report annually on its environmental footprint. Therefore, the guidelines for environmental reporting should be reviewed to require actions that companies are taking to build resilience within the area they operate in or of a resource that the company relies on.
	4.2.2 Train EPA staff and PS actors on revised guidelines	# of EPA staff and PS actors trained on revised guidelines  # of PS applications including climate change and resilience considerations	Climate Change Unit; Environmental Assessment and Audit	Months 3 – 6	Once the documents have climate change adaptation and resilience mainstreamed into them, there must be training for EPA staff to build capacity on the new requirements.



## Strategic Objective 5: Continuously align private sector engagement approaches, and reinforce resource mobilization and utilization for private sector engagement

Strategic Approaches	Key Activities	Indicators	Responsibility	Timeline	Description
5.1 Improve coordination via enhanced exploration of funding opportunities	4.2.1 Monitor and evaluate PS engagement approaches, capacity building plan and apply corrective action and optimisation of the CB plan, its components and activities	4 bi-annual monitoring and evaluation reports prepared	Climate Change Unit; Public Affairs Department	Months 4 – 24	The adopted modalities in the PSES and this capacity building plan have to be monitored to identify progress towards the expected outcomes. The process will be iterative as changes can be made where needed and further monitored.
4.2 Strengthen public-private sector partnerships in resilience via forums	4.3.1 Organise annual public-private sector forum to discuss progress chalked and opportunities for the future using Annex 10 to flesh out agenda	2 fora held	Climate Change Unit; Public Affairs Department	Months 9 – 24	This is a networking event that builds stronger working relationships between private and public sector actors as they review work done in the year, lessons learnt, successes and challenges.
5.3 Enhance capacity to monitor and evaluate projects	4.4.1 Train Climate Change Unit staff on monitoring and evaluation of projects to enhance private sector partnerships project reporting using Annex 11 to flesh out agenda	2 workshop trainings on monitoring and evaluation carried out	Climate Change Unit	Months 1 – 5	A good monitoring and evaluation of projects will allow gaps to be identified, strengths to be noted and also serve as a platform to showcase work done and attract further investment. It is therefore essential that capacity is built for EPA staff on project monitoring, evaluation and indicators.

## 4. Conclusion

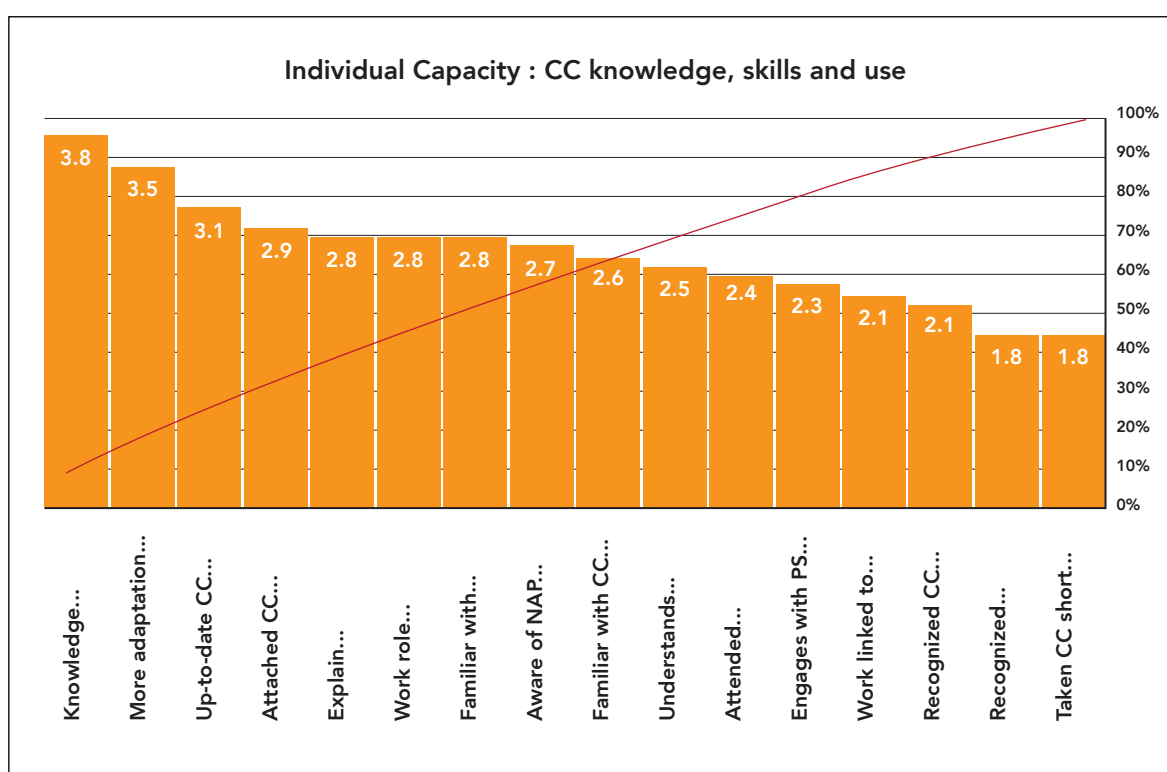
Pursuing private sector engagement in the objective to address climate change and build resilience in Ghana via the planning, development, implementation and monitoring of the country's national adaptation plan, and the newly launched private sector engagement strategy requires a highly capable Ghana EPA. This capacity building strategy and collaborative framework implementation plan sets out to support the EPA in building its staff and organizational capacity to a level that enables proper engagement (coordination, collaboration, facilitation) with the private sector associations, federations and networks as indicated in the Private Sector Engagement Strategy.

In a time when there are initiatives like the race to zero and launch of the SME Climate Hub at the international level, it has become ever so important for private sector in Ghana to be interested and invested in addressing climate change both via adaptation actions and mitigation actions. This action plan recognizes that the initial step is a more localized and comprehensive capacity assessment of the various departments, regional and area offices to tailor what sections of this capacity building strategy will meet specific needs. The capacity needs indicate that EPA should embark on optimizing knowledge management; increase learning and research opportunities; Integrate resilience requirements into environmental application protocols for private sector initiatives; Continuously align private sector engagement approaches, and reinforce resource mobilization and utilization for private sector engagement.

This action plan serves as a framework that EPA Ghana will use to solicit funding from donors. Donors are also encouraged to use this document as a reference for funding considerations. Donors and climate financiers who want to support the EPA in its adaptation efforts, can choose from the identified capacity development enablers that require funding. needs and plug in funding gaps for objectives and activities that fall within their funding portfolios.

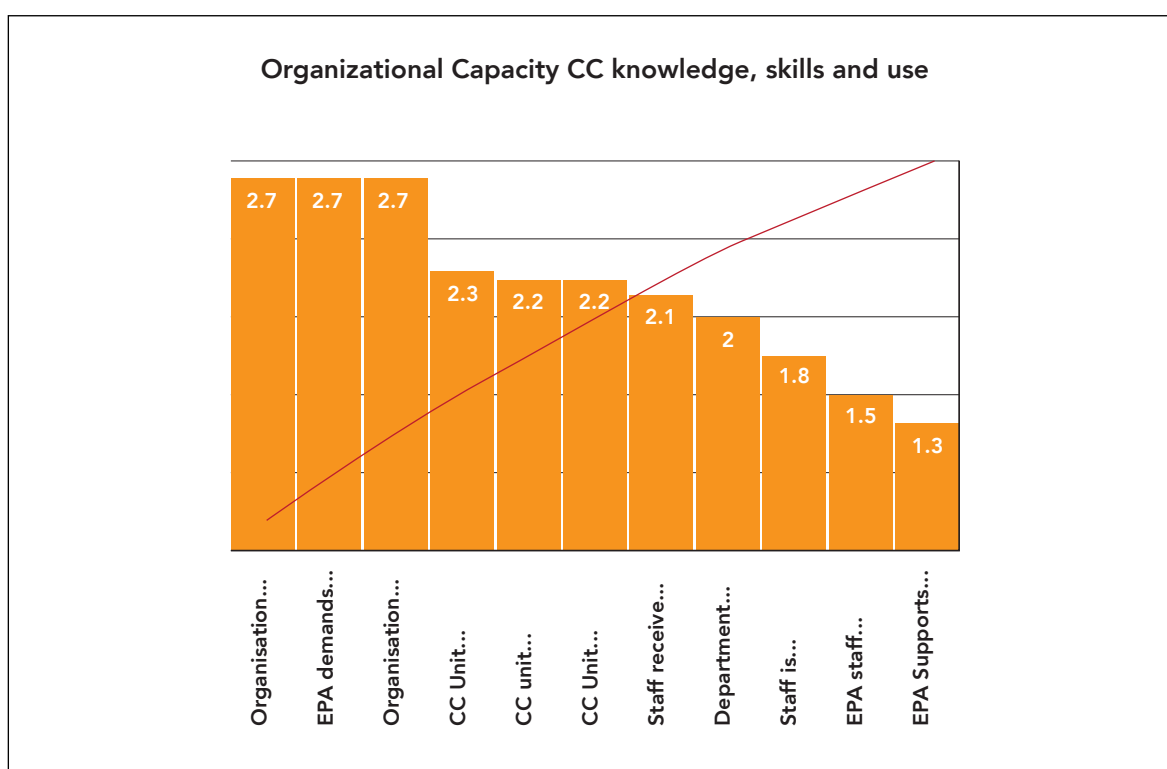
## Appendix 1: Staff Capacity in Climate Change Knowledge and Skills

Individual Capacity CC knowledge, skills and use	Average rating (4)	Percentage
Knowledge needed on Ghana PS engaging in resilience	3.8	95
More adaptation training needed	3.5	87.5
Up-to-date CC news	3.1	77.5
Attended CC workshops and trainings	2.9	72.5
Explain adaptation/resilience to peers/stakeholders	2.8	70
Work role engages EPA CC Unit	2.8	70
Familiar with work/projects of CC Unit	2.8	70
Aware of NAP and NAP framework	2.7	67.5
Familiar with CC finance sources and mobilization	2.6	65
Understands stakeholder roles played in resilience	2.5	62.5
Attended adaptation workshops and trainings	2.4	60
Engages with PS on adaptation/resilience	2.3	57.5
Work linked to resilience/adaptation	2.2	55
Recognized CC degree	2.1	52.5
Recognized adaptation/resilience degree	1.8	45
Taken CC short courses	1.8	45



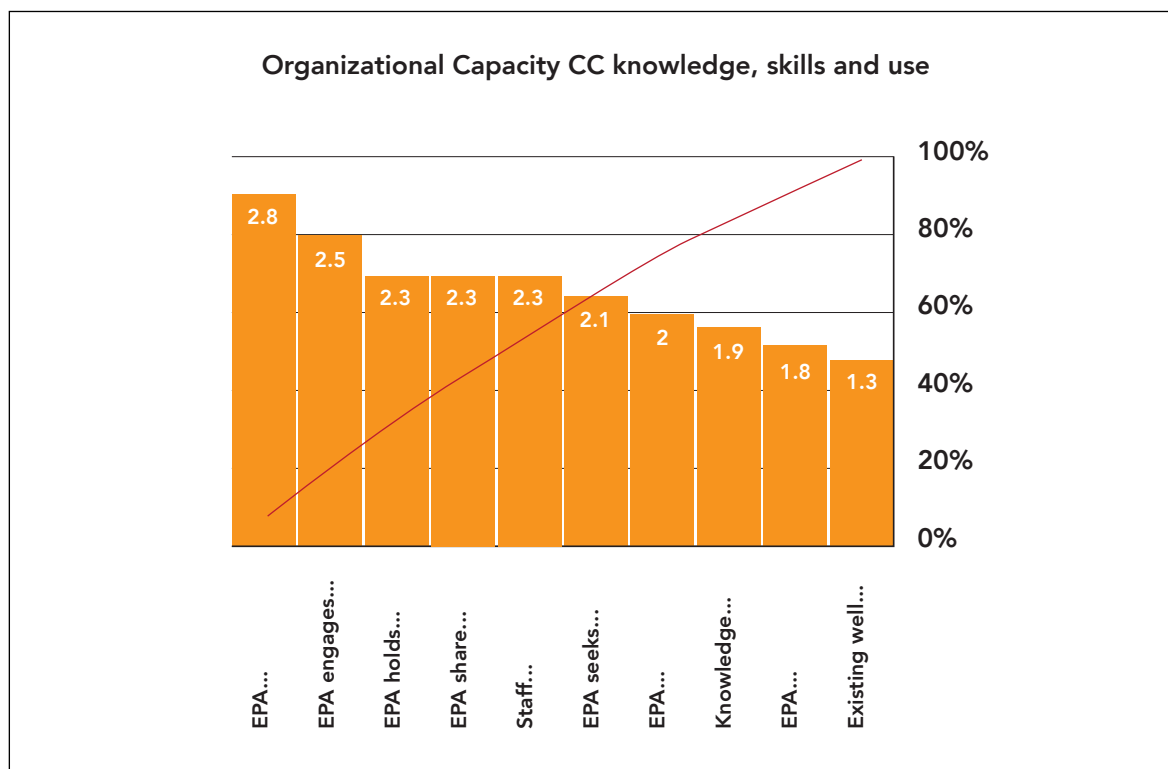
## Appendix 2: Organizational Climate Change Knowledge and Skills

Organizational Capacity CC knowledge, skills and use	Average rating	Percentage
Organization holds staff CC adaptation workshops	2.7	67.5
EPA demands data from other stakeholders to aid decisions	2.7	67.5
Organization staff adequate knowledge on CC finance, sources, mobilization	2.7	67.5
CC Unit synthesizes data for other departments use	2.3	57.5
CC Unit synthesizes data for PS use	2.2	55
CC Unit synthesizes data for other stakeholders' use	2.2	55
Staff receive organizational news on CC activities	2.1	52.5
Department staff adequate knowledge on adaptation	2.0	50
Staff is knowledgeable on adaptation	1.8	45
EPA staff knowledgeable on CC strategies, priorities, policies related to work roles	1.5	37.5
EPA supports PS understand link between role and CC polices/activities	1.3	32.5



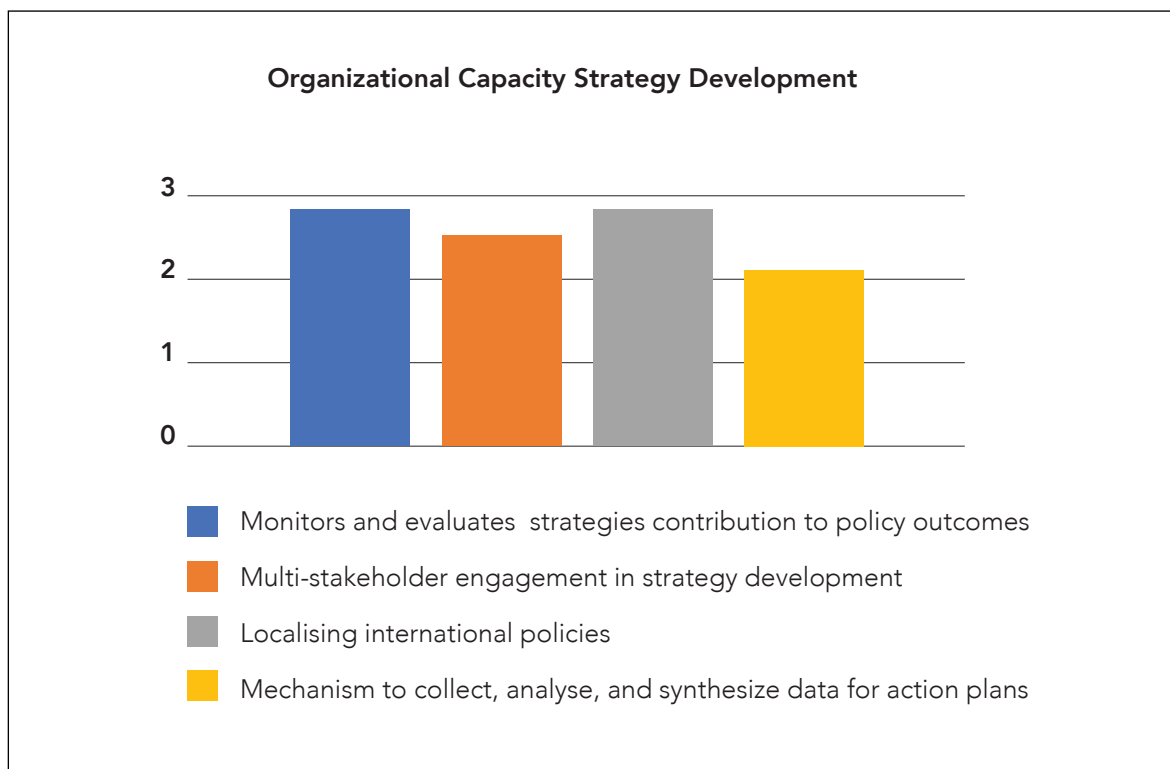
## Appendix 3: Private Sector Engagement, Collaboration and Coordination

Organizational Capacity PS Engagement, Collaboration and Coordination	Average rating	Percentage
EPA mutually supportive and productive collaboration with government entities	2.8	70
EPA engages PS in resilience actions	2.5	62.5
EPA holds trainings on adaptation for PS	2.3	57.5
EPA shares information on CC with PS	2.3	57.5
Staff numbers of CC Unit low for PS engagement	2.3	57.5
EPA seeks out PS partnerships to add value to adaptation work	2.1	52.5
EPA supports development of green business	2	50
Knowledge co-production with PS	1.9	47.5
EPA dedicates resources for PS collaboration	1.8	45
Existing well known, easy to access cc platforms for PS engagement	1.3	32.5



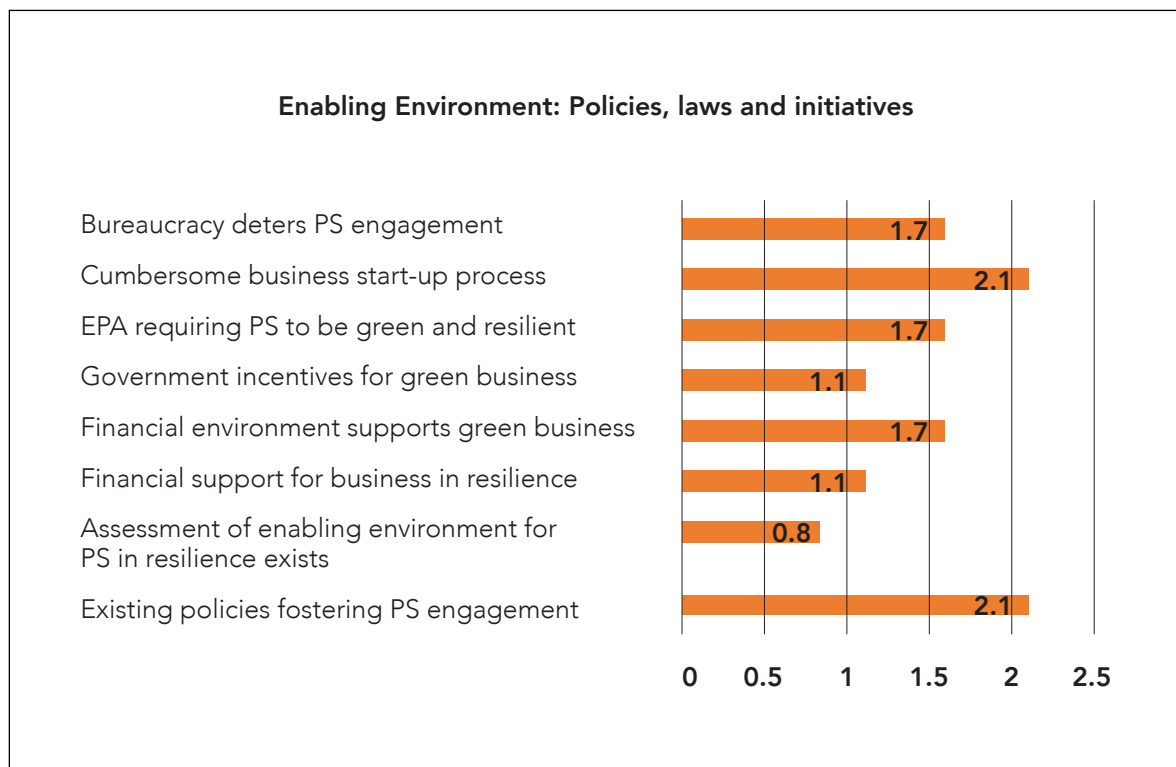
## Appendix 4: Strategy development

Organizational Capacity Strategy Development	Average rating	Percentage
Monitors and evaluates strategies contribution to policy outcomes	2.8	70
Localizing international policies	2.8	70
Multi-stakeholder engagement in strategy development	2.6	65
Mechanism to collect, analyze, and synthesize data for action plans	2.1	52.5



## Appendix 5: Enabling environment

Enabling Environment Assessment Policies, Laws and initiatives	Average rating	Percentage
Existing policies fostering PS engagement	2.1	52.5
Cumbersome business start-up process	2.1	52.5
EPA requiring PS to be green and resilient	1.7	42.5
Financial environment supports green business	1.7	42.5
Bureaucracy deters PS engagement	1.7	42.5
Financial support for business in resilience	1.1	27.5
Government incentives for green business	1.1	27.5
Assessment of enabling environment for PS in resilience exists	0.8	20



## Appendix 6: Capacity Assessment Questionnaire



### ORGANIZATIONAL CAPACITY ASSESSMENT

This capacity assessment is part of a Winrock-funded Private Investment in Enhanced Resilience Project supporting the Environmental Protection Agency (EPA), Ghana in developing a Private Sector Engagement Plan. The results of this assessment will be used by the EPA and Winrock International in concert with earlier findings from a stakeholder consultation to inform an action plan for increasing the engagement of private sector in Ghana's efforts towards climate adaptation and resilience.

The assessment is divided into three sections of individual, organizational, and enabling environment assessments. The estimated time it takes to complete the assessment is 25-30 minutes.

Your participation in completing this questionnaire would be greatly appreciated.

**Directions:** Please read each indicator statement below and rate the statement in the column to the right using the 4-point scale. Please circle the appropriate score.

A. Personal Details	
Name (Optional):	
Department:	
Date of assessment:	
Sex:	
Position in EPA (Optional):	
Role of Position:	
Number of years in current position:	

B. Individual Capacity Assessment Climate Change Knowledge, Skills and Use
<p><b>Performance Ideal:</b></p> <p>High capacity in climate change knowledge, skills and use includes being able to:</p> <ul style="list-style-type: none"> <li>• Follow up on and up to date on knowledge and news on climate change adaptation and resilience</li> <li>• Received several trainings on climate change and understand the topic</li> <li>• Can confidently deliver presentation, explain and train others on climate change adaptation and resilience</li> <li>• Ability to understand climate change adaptation and resilience publications and reports</li> <li>• Ability to apply climate change knowledge as a lens in executing work roles (integrating climate change)</li> <li>• Regularly discusses climate change and resilience issues with other colleagues</li> <li>• Ability to demand and use climate change data to support decision-making and strategy development processes</li> <li>• Possess knowledge on some climate change finance sources and mobilisation</li> </ul>



## B. Individual Capacity Assessment Climate Change Knowledge, Skills and Use

Scoring: 0 = don't know; 1 = strongly disagree; 2 = disagree; 3 = agree; 4= strongly agree

Indicator Statements	Score
1. I have a recognised academic degree in climate change	0 1 2 3 4
2. I have a recognised academic degree in climate adaptation/resilience	0 1 2 3 4
3. I have taken climate change adaptation short courses (in-person or online)	0 1 2 3 4
4. I have attended several workshops and trainings on climate change	0 1 2 3 4
5. Have attended several workshops and trainings on climate adaptation/resilience	0 1 2 3 4
6. I can explain the concept of climate adaptation and resilience to other peers and stakeholders confidently	0 1 2 3 4
7. I often follow and I am up to date on climate change news and discussions	0 1 2 3 4
8. My work touches on climate change adaptation and resilience	0 1 2 3 4
9. My work role often involves engaging with the EPA Climate Change Unit*	0 1 2 3 4
10. I am familiar with the work and projects undertaken by the EPA Climate Change Unit*	0 1 2 3 4
11. I am familiar with sources of climate finance and climate finance mobilisation*	0 1 2 3 4
12. I need more training and knowledge on climate change adaptation to improve my work	0 1 2 3 4
13. My work involves engaging with private sector actors on climate change adaptation/resilience*	0 1 2 3 4
14. I would like to know more about how private sector in Ghana engages with climate change/resilience	0 1 2 3 4
15. I understand the roles that various stakeholders play in addressing climate change and building resilience in Ghana	0 1 2 3 4
16. I am aware of the National Adaptation Plan and its framework	0 1 2 3 4

\* means sub-questions below if agree or strongly agree

9a. What does this engagement with the EPA Climate Change Unit entail/look like?

10a. What are some of the activities undertaken by EPA CC Unit?

11a. What are some examples of sources of climate finance?

13a. Please Give examples of CC adaptation/resilience work you have engaged on  
with private sector actor (Please name the actor)?

## C. Organisational Capacity Assessment

### Climate Change Knowledge, Skills and Use

**Performance Ideal:**

High capacity in climate change knowledge and skills includes:

- Organisation often develops and shares climate change news, reports and updates to all staff
- Staff have received several and adequate trainings on climate change adaptation and resilience
- Staff understand climate change and can deliver presentations and trainings
- Organisation prepares, synchronizes and packages climate data for use by staff and other stakeholders who demand such data
- Organisation demands and use climate change data to support decision-making and strategy development processes
- Staff possess knowledge on some climate change finance sources and mobilisation

Scoring: 0 = don't know; 1 = strongly disagree; 2 = disagree; 3 = agree; 4= strongly agree

Indicator Statements	Score
1. The organization holds workshops and trainings on climate change adaptation/resilience for staff	0 1 2 3 4
2. Staff often receive organisational bulletins, reports or updates on climate change news and organisational climate change activities, policies and projects	0 1 2 3 4
3. Staff is knowledgeable on climate change adaptation and resilience	0 1 2 3 4
4. Staff of my department have adequate working knowledge and skill on climate change adaptation and resilience	0 1 2 3 4
5. The EPA Climate Change Unit synthesizes data into understandable and actionable narrative and graphical forms for use by other EPA departments	0 1 2 3 4
6. The EPA Climate Change Unit synthesizes data into understandable and actionable narrative and graphical forms for use by private sector	0 1 2 3 4
7. The EPA Climate Change Unit synthesizes data into understandable and actionable narrative and graphical forms for use by other stakeholders (not mentioned in 16 and 17)	0 1 2 3 4
8. The organisation demands data from other relevant climate authorities and sectors to aid in decision-making	0 1 2 3 4
9. The organisation has staff with adequate knowledge on types and sources of climate finance and needed skills to mobilise such funds	0 1 2 3 4
10. The organization explains/illustrates to private sector the links between the strategies it develops, its activities, policy recommendations and private sector roles	0 1 2 3 4
11. Staff are knowledgeable about national climate change strategies, priorities, and policies related to their various areas of work	0 1 2 3 4

## C. Organisational Capacity Assessment

### Private Sector Engagement, Collaboration and Coordination

#### Performance Ideal:

High capacity in engagement, collaboration and coordination is being able to:

- Have adequate financial and human capital to mobilise private sector actors, and partner private sector actors in programmes, projects and initiatives
- Support private sector actors with technical assistance and capacity building
- Have a recognised and accessible platform for engagement, feedback and decision-making
- Collate and synthesize different interests and views of several stakeholders engaged in decision-making

Scoring: 0 = don't know; 1 = strongly disagree; 2 = disagree; 3 = agree; 4= strongly agree

Indicator Statements	Score
1. The organization holds workshops and trainings on climate change adaptation/resilience for private sector actors	0 1 2 3 4
2. The organisation shares information (bulletins, reports or updates) on climate change with private sector actors	0 1 2 3 4
3. The organization dedicates resources including staff time and funding, to collaborate (partnerships, working groups, platforms) with private sector actors on resilience actions	0 1 2 3 4
4. The organization has mutually supportive and productive relationships with other government entities that have private sector entities within their sectoral mandate	0 1 2 3 4
5. The organization seeks out private sector partnerships with entities that can fill identified gaps, have the technical know-how, or add value to its policy-related work	0 1 2 3 4
6. The organisation supports the development of Green businesses in line with Ghana's priorities and strategies for resilience	0 1 2 3 4
7. Relative to the work load of the Climate Change Unit, the staff numbers are too low to foster engagement with private sector actors	0 1 2 3 4
8. The organisation produces knowledge and data with private sector actors	0 1 2 3 4
9. There are existing well-known and easy-to-access platforms for private sector to engage EPA on climate change and resilience issues	0 1 2 3 4
10. The organisation engages with private sector actors in its resilience and climate change adaptation actions	0 1 2 3 4

## C. Organisational Capacity Assessment Strategy Development

### Performance Ideal:

High capacity in strategy development includes:

- Taking leadership in localising international policies to fit local contexts
- Having leadership to translate national policies and priorities into practice through a collaborative process
- Efficient and effective resource planning and allocation to guide staff and private sector in determining what, how, when, and where of actions and efforts
- Using evidence-based knowledge in developing approaches to address climate change issues and problem solving in an iterative manner

Scoring: 0 = don't know; 1 = strongly disagree; 2 = disagree; 3 = agree; 4= strongly agree

Indicator Statements	Score
1. The organisation systematically monitors and evaluates the effectiveness of implemented strategies to determine contribution to policy outcomes (including those impacting private sector)	0 1 2 3 4
2. Staff can facilitate dialogue and build consensus among diverse key stakeholders (policy makers, technical teams, private financiers, donors, private sector, beneficiaries, etc)	0 1 2 3 4
3. The organisation translates international climate change directives, agreements, and policies into local contexts	0 1 2 3 4
4. The organization has mechanism in place to collect, analyse, and synthesize data to inform the development of action plans and associated resource allocation*	0 1 2 3 4

\*means sub-questions below if agree or strongly agree

4a. Please indicate how the mechanism is set up and works?

## D. Enabling Environment Assessment

### Policies, Laws, and Initiatives

**Performance Ideal:**

High capacity in policies, laws and initiatives includes:

- Enabling directives that promote the registration and existence of businesses
- Enabling directives that foster engagement of private sector in resilience
- Strong financial sector supporting all forms of businesses including green businesses
- Promotion of collaboration, coordination and partnerships
- Existing analysis of enabling environment and recommendations on improvements

Scoring: 0 = don't know; 1 = strongly disagree; 2 = disagree; 3 = agree; 4= strongly agree

Indicator Statements	Score
1. There are existing policies, laws and initiatives that foster the engagement of private sector in climate change adaptation/resilience*	0 1 2 3 4
2. An assessment of the enabling environment for private sector engagement in resilience exists*	0 1 2 3 4
3. There are existing financial supports for businesses to engage in resilience	0 1 2 3 4
4. The financial environment is supportive of green businesses	0 1 2 3 4
5. There are government incentives for establishing green businesses and for private sector to engage in resilience*	0 1 2 3 4
6. There are internal EPA formulated requirements and laws that require private sector to be green and engage in resilience actions*	0 1 2 3 4
7. Cumbersome processes in business registration affects the registration of green businesses that can work with EPA on resilience	0 1 2 3 4
8. Organisational bureaucracy deters engagement with private sector actors to build resilience	0 1 2 3 4

\*means sub-questions below if agree or strongly agree

1a. Please state the policies, laws and initiatives that foster private sector engagement in climate change adaptation/resilience.

2a. Please provide reference of the assessment and source, where possible.

5a. Please indicate such incentives.

6a. Please specify such internal requirements.

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## Appendix 7: Draft Agenda for Capacity Building Workshop

### Capacity Building to Support Implementation of Private Sector Engagement Strategy for NAP

#### EPA STAFF TRAINING WORKSHOP

The objective of the training workshop is:

- Build staff awareness and knowledge of the key strategies identified by the PSES to engage private sector in resilience

Provisional Agenda	
Time	Activity
8h45	Registration of Participants
9h00	Opening Prayer
9h05	Introductions
9h20	Welcome Address Deputy Executive Director (Technical), EPA
9h30	Statement by representative of organization funding workshop
9h40	Objectives of the Training Workshop Deputy Director and NAP Project Coordinator, EPA
9h50	Presentation on Climate Change and International Climate Governance EPA Climate Change Unit
10h30	Group Photograph and Snack Break
10h45	Presentation on Ghana's National Adaptation Plans EPA Climate Change Unit
11h30	Presentation of the Private Sector Engagement Strategy EPA Climate Change Unit
12h00	Group Breakout Session: How can PSES foster departmental engagement in NAP with Private sector/ Private Sector Engagement Strategy vis-à-vis Departmental Mandates
12h30	Lunch
13h30	Group Presentations and Plenary Discussions on Implementing PSES
14h30	Summary of Workshop Outcomes
14h45	Closing Remarks and Next Steps
14h55	Closing Prayer
15h00	Close

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## Appendix 8: Draft Agenda for Climate Change Governance Workshop

### Workshop on Climate Change Governance in Ghana

#### EPA STAFF TRAINING WORKSHOP

The objectives of the training workshop are:

- Improve staff knowledge on Ghana’s climate change commitments and actions
- Improve staff capacity to apply climate change adaptation as a lens in their work roles

Provisional Agenda	
Time	Activity
8h45	Registration of Participants
9h00	Opening Prayer
9h05	Introductions
9h20	Welcome Address Deputy Executive Director (Technical), EPA
9h30	Statement by representative of organization funding workshop
9h40	Objectives of the Training Workshop EPA Climate Change Unit
9h50	Presentation on Climate Change and Climate Impacts in Ghana EPA Climate Change Unit
10h30	Group Photograph and Snack Break
10h45	Presentation on Ghana’s UNFCCC Commitments including NDCs & NAPs EPA Climate Change Unit
11h15	Presentation on Ghana’s Climate Change Policy, Masterplan, and Adaptation Strategy
11h45	Group Working Session Exercises (Topic TBD)
12h30	Lunch
13h30	Group Presentations and Plenary Discussions
14h15	Practical adaptation projects and measures (being) implemented in Ghana
14h45	Summary of workshop outcomes
14h55	Closing Remarks and Next Steps
15h00	Closing Prayer

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## Appendix 9: Draft Agenda for Climate Finance Workshop

### Understanding Climate Finance and Resource Mobilization Workshop

#### EPA STAFF TRAINING WORKSHOP

The objective of the training workshop is:

- Build staff awareness and knowledge on climate change financing and opportunities

DAY 1	
Time	Activity
8h45	Registration of Participants
9h00	Opening Prayer
9h05	Roundtable Introductions
9h20	Welcome Address Deputy Executive Director (Technical), EPA
9h30	Statement by representative of organization funding workshop
9h40	Objectives of the Training Workshop Deputy Director and NAP Project Coordinator, EPA
9h50	Presentation on Ghana's UNFCCC Climate Change Commitments including NAP EPA Climate Change Unit
10h30	Group Photograph and Snack Break
10h45	Presentation on Overview of Climate Projects and Finance attracted by Government to Ghana. Climate Finance Gaps of Ghana. EPA Climate Change Unit
11h15	Presentation on International Climate Finance outlook and architecture of key funds e.g. GCF Ministry of Finance and EPA Climate Change Unit
12h00	Group Working Session (Topic TBD)
12h30	Group Presentations and Plenary Discussions
13h00	Lunch
14h00	Presentation on Possible Climate Finance Sources, and Mobilization to meet Climate Financing Gap in Ghana EPA Climate Change Unit
14h30	Summary of Outcomes
14h40	Closing Remarks and Next Steps
14h45	Closing Prayer



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## Appendix 10: Draft Agenda for Forum on NAP Implementation

### Public-Private Sector Forum on NAP Implementation

#### EPA STAFF TRAINING WORKSHOP

The objective of the training workshop is:

- Review public private partnerships and identify opportunities for NAP Implementation

Provisional Agenda	
Time	Activity
8h45	Registration of Participants
9h00	Opening Prayer
9h05	Introductions
9h20	Welcome Address Deputy Executive Director (Technical), EPA
9h30	Key Note Address Private Sector Representative
9h40	Objectives of the Forum Deputy Director and NAP Project Coordinator, EPA
9h50	Status of Climate Change Governance in Ghana, NAP, and UNFCCC Country Commitments EPA Climate Change Unit
10h30	Group Photograph and Snack Break
10h45	Year in Review: Public-Private Engagement in NAP EPA Climate Change Unit
11h30	Selected Private Sector Actor shares Adaptation Efforts under NAP EPA Climate Change Unit
12h00	Group Breakout Session: Identifying Gaps, Lessons Learnt, Successes and Challenges
12h30	Lunch
13h30	Group Presentations and Plenary Discussions
14h30	Plenary: Identifying Opportunities for Ensuing Year
15h00	Summary of Workshop Outcomes
15h10	Closing Remarks and Next Steps
15h15	Closing Prayer
15h20	Close

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## Appendix 11: Draft Agenda for Monitoring and Evaluation Workshop

### Workshop Training on Project Monitoring and Evaluation

#### EPA STAFF TRAINING WORKSHOP

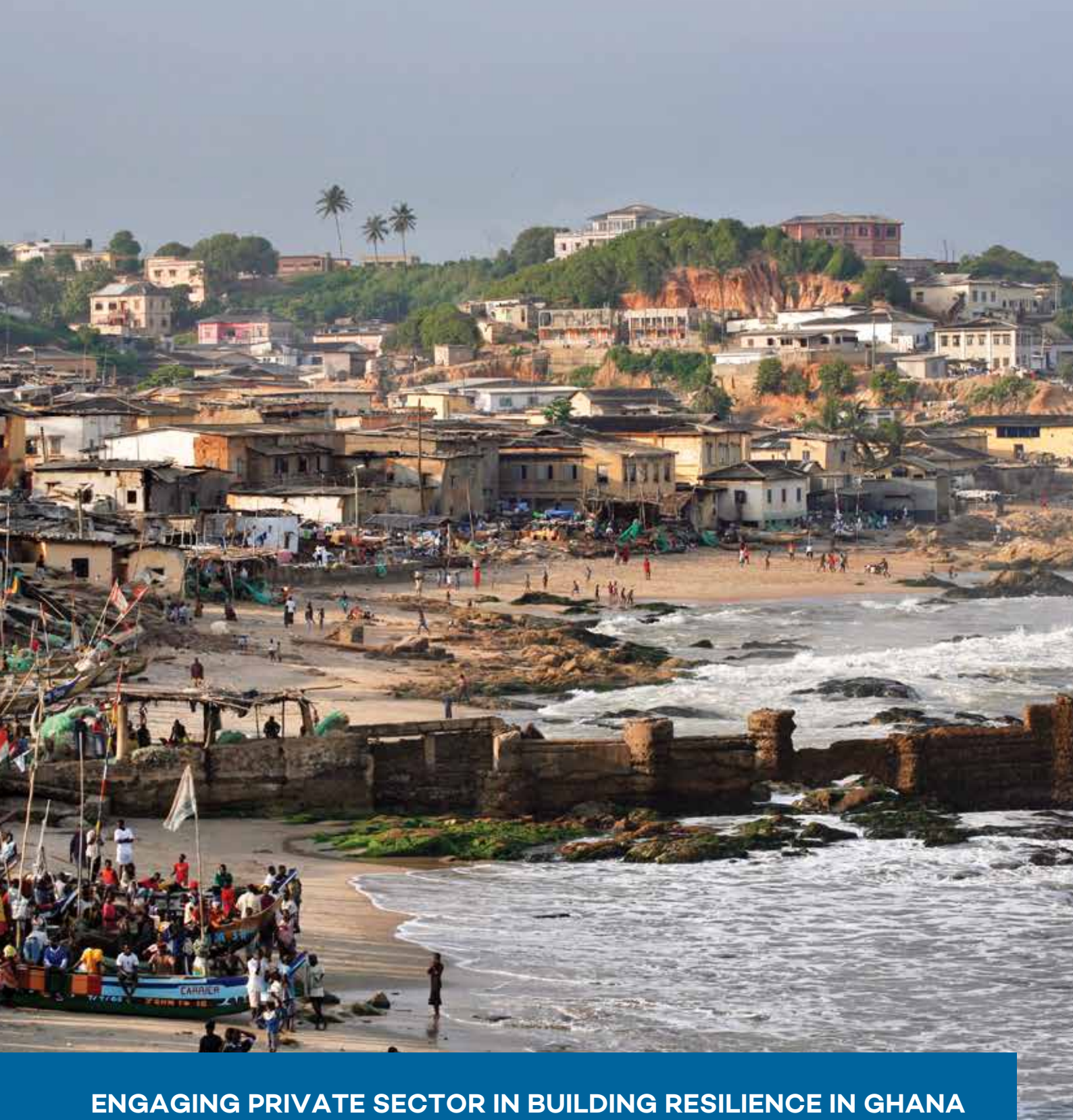
The objective of the training workshop is:

- Build Staff Capacity in M&E to improve project reporting

Provisional Agenda	
Time	Activity
8h45	Registration of Participants
9h00	Opening Prayer
9h05	Introductions
9h20	Welcome Address Deputy Executive Director (Technical), EPA
9h30	Objectives of the Training and Participants' Expectations EPA Climate Change Unit
9h45	Introduction to Monitoring and Evaluation Project Monitoring Expert
10h30	Group Photograph and Snack Break
10h45	Introduction to Indicators and Types of Indicators Project Monitoring Expert
11h15	Types of Data Sources, Data Quality and Use Project Monitoring Expert
11h45	Group Breakout Session: Formulating Indicators for Projects
12h30	Lunch
13h30	Group Presentations and Plenary Discussions
14h30	How M&E is Done Project Monitoring Expert
15h15	Summary of Workshop Outcomes
15h20	Closing Remarks and Next Steps
15h25	Closing Prayer
15h30	Close

# **ANNEX**

## **Engaging Private Sector in Building Resilience in Ghana: In-Country Consultations**



**ENGAGING PRIVATE SECTOR IN BUILDING RESILIENCE IN GHANA  
: IN-COUNTRY CONSULTATIONS**



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# Executive Summary

Ghana has exhibited a strong regard in addressing the threats and impacts that a changing climate presents and has taken steps over the years to integrate climate actions into development activities at national and sub-national level. The latest action in the series of climate smart actions being the development of the National Adaptation Plan framework which proposes sectoral-based approach to climate change adaptation planning in Ghana. Central to the implementation of Ghana's NAP is the recognition that multiple stakeholders have distinct but collective roles to play and therefore it is essential to develop a Private Sector Engagement Strategy to promote the role of private sector in resilience. Therefore, this project set out to improve the institutional capacity of EPA to engage with the private sector to achieve the climate and development priorities outlined in Ghana's National Adaptation Plan, Nationally Determined Contributions, and other climate change and development strategies and plans managed or supported by the EPA.

Bilateral consultations with some key private sector actors such as Association of Oil Marketing Companies and the Ghana Association of Poultry farmers to identify preliminary interests, opportunities and constraints of the role(s) that private sector actors can play in adaptation in Ghana. With preliminary sectors prioritized as Agriculture, Construction, Finance, and Mining already identified, several barriers were identified from in-depth consultations as factors impeding the engagement of private sector entities. The barriers identified are:

- Limited/Lack of knowledge, awareness and capacity
- Limited collaboration and ineffective coordination
- Lack of favourable government policies and law enforcement
- Limited financial resources and an enabling financial environment
- Bureaucracy

To address these barriers, the following factors are needed to overcome barriers:

- Awareness raising, training and capacity building
- Improve collaboration and coordination
- Create enabling policy environment and improve law enforcement
- Creating enabling financial environment including green financing
- Softening Bureaucracy
- Developing and adopting standards
- Build and showcase profitable green business cases

To further facilitate private sector engagement, some general opportunities and entry points were identified to facilitate engagement:

- Linkage to broader sustainability and development frameworks
- Using existing committees, working groups and platforms
- Link to other stakeholder efforts, projects and interventions
- Corporate social responsibility
- Integrating CC into Environmental impact assessment and environmental reporting

# 1. Background

Ghana, with a population of 30 million people has in recent years witnessed a burgeoning economy that is still very much dependent on its natural resources like forestry, agriculture, and hydropower energy. The country's developmental efforts, and its ambition to achieve the Sustainable Development Goals remain at risk from climate change. In 2016, Ghana ranked 101 out of 181 countries measured for climate vulnerability and was therefore the 68<sup>th</sup> most vulnerable country and the 85<sup>th</sup> least ready country (Ministry of Foreign Affairs of the Netherlands, 2018). The major impacts of Climate change and variability in Ghana have been identified as increasing temperature, change in rainfall, and sea level rise. The mean annual temperature is projected to increase by 1.0-3.0°C by the 2060's, and 1.5-5.2°C by the 2090's (see figure 1 below), with the projected rate of warming being most rapid in the northern inland regions of Ghana. For precipitation, total annual rainfall is projected to decline by 1.1%, and 20.5% in 2020 and 2080, respectively<sup>8</sup>. Climate change is projected to impact water resources, energy supplies, crop production, food security and infrastructure.

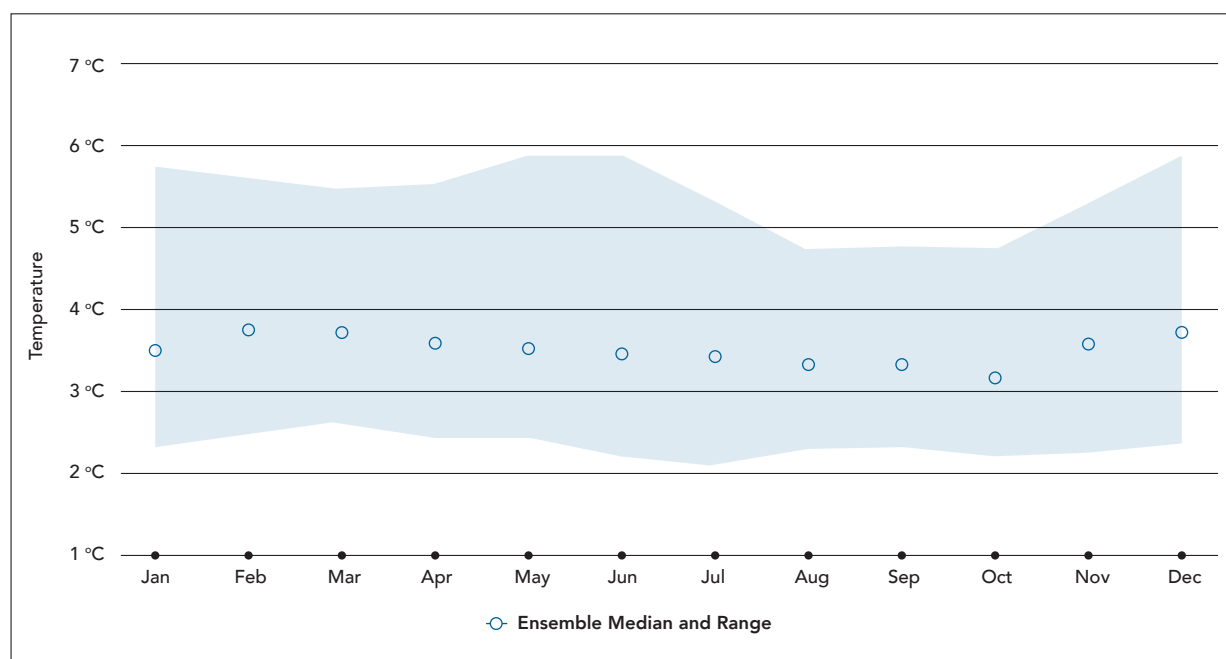


Figure 1: Projected change in monthly temperature for Ghana for 2080-2099 (Source: World Bank Climate Change Knowledge Portal)

Since Ghana became a signatory to the United Nations Framework Convention on Climate Change (UNFCCC), the country has exhibited a strong regard in working to reduce the threats and impacts that a changing climate presents. Ghana has taken steps to integrate climate actions into development activities at national and sub-national level. The Ministry of Environment, Science, Technology and Innovation (MESTI) on behalf of the Government of Ghana developed the National Climate Change Adaptation Strategy (2012); enacted the 2013 National Climate Change Policy; committed and developed its Nationally Determined Contributions (2015); and a National Climate Change Master Plan Action Programmes for Implementation over 2015 -2020 period.

<sup>8</sup><https://climateknowledgeportal.worldbank.org/country/ghana/climate-data-projections>

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The National Climate Change Policy prioritizes five main policy areas as agriculture and food security, natural resource management, disaster preparedness and response, equitable social development and energy, and industrial and infrastructural development. The latest action in the series of climate smart actions being the development of the National Adaptation Plan framework which proposes sectoral-based approach to climate change adaptation planning in Ghana.

There is a recognition that effectively addressing climate change requires the inclusion of multiple stakeholders and citizens in both climate adaptation and mitigation. However, engagement with the Private sector in adaptation in Ghana is currently limited. The Environmental Protection Agency (EPA) has therefore started embarking on activities and plans that would foster private sector engagement in adaptation and building of resilience. Winrock International, under the Private Investment for Enhanced Resilience (PIER) is therefore supporting the Ghana EPA via the provision of institutional support to improve the engagement of private sector in resilience. With high percentage of the populace being small-scale farmers, and people in small-medium scale enterprises, it is crucial that the private sector actors are engaged into coping with the changes.

This collaboration between the EPA and Winrock International will result in the development of a Private Sector Engagement Strategy (PSES) aimed at the implementation of the Ghana National Adaptation Plan (NAP) and other resilience commitments that Ghana has made to the UNFCCC. The strategy would lay out the opportunities and entry points that exist for engagement and highlight key changes and actions that would improve institutional capacity of the EPA to engage private sector actors.



## 2. Objectives

The overall goal of the PSES is to improve the institutional capacity of EPA to engage with the private sector to achieve the climate and development priorities outlined in Ghana's National Adaptation Plan, Nationally Determined Contributions, and other climate change and development strategies and plans managed or supported by the EPA. This report describes in-country consultations that served as the initial activity in developing the PSES. The consultations aimed to explore and profile key private sector actors and stakeholders; understand existing institutional arrangements and activities; identify challenges impeding private sector engagement; identify opportunities that can facilitate private sector engagement; and instigate early engagement with private sector in drawing up a PSES.

This report contains the findings of the initial in-country bilateral consultations. It sets off with a background on Ghana's actions in addressing climate change, followed by the objectives that inform the larger engagement strategy development work. The third section lays out the methodology applied in this initial consultation and provides a background on each stakeholder consulted. Section 4 focuses on the Ghana National Adaptation Plan, and it is followed by an overview of the private sector set up in Ghana. Following this section, is the analysis of the findings which delves into the existing adaptation actions that private sector is undertaking in Ghana, barriers, enabling factors and identified entry points for the engagement of private sector within what is currently workable in the Ghana context. The final section addresses the next steps in developing the engagement strategy based on the findings that have emerged presently.

Findings from the in-country consultations will not only contribute to the design of the tool for assessing institutional capacity of the EPA to engage with Private Sector but will also feed into the final PSES to be developed. The overall technical support from Winrock International to the EPA will further result in an action plan for institutional capacity building and collaborative framework

### 3. Stakeholders and Stakeholder Consultations

Prior to the in-country consultations, a profile of key sectors to Ghana's changing climate was identified, and relevant stakeholders identified. Following earlier processes and principles of the EPA such as those drawn under the IISD private sector engagement work undertaken in 2019, initial interest was in the private sector umbrella organizations like the Associations, Initiatives, and Federations as these provided platforms for access to larger network of PS actors. The stakeholders (see Appendix 1) targeted and engaged were within the sectors that have already been prioritized by the EPA for trying out a first phase of private sector engagement.

Bilateral consultations were held with a cross-section of key stakeholders including the Ghana National Association of Poultry Farmers, the Federation Association of Ghanaian Exporters, UNDP Ghana, Biogas Technologies Africa, EPA, the Association of Oil Marketing Companies, and the Association of Small-Scale Industries. The consultations helped identify preliminary interests, opportunities and constraints of the role(s) that private sector actors can play in adaptation in Ghana. The process also raised awareness of stakeholders on EPA's plans to develop and institute a private sector engagement strategy and on the process of the NAP. Points of discussions held with stakeholders included previous and current experience with climate change, understanding of how climate change impacts the several private sector actors, awareness of the NAP and NAP Framework, institutional capacity constraints and enabling factors to promote private sector engagement in resilience.

Some key stakeholders that could not be consulted during the consultation period due to the scheduling difficulties include the Sustainable Banking Initiative, Ghana Chamber of Mines, and the Association of Road Contractors. Aside from being key developmental sectors, these groups are private sector dominant and under the NAP framework, belong to the set of prioritized sectors of focus. Further efforts to include these stakeholders in the development of the PSES would be pursued as they remain key for understanding the similarities and differences in constraints and opportunities within the mining, finance, and construction sectors with respect to private sector engagement. Other key private sector groups declined to honour the consultation stating explicitly a dis-interest to engage.

## 4. Ghana's National Adaptation Plan

The NAP process was initiated at the UNFCCC Conference of Parties (CoP) 16 in 2010 in Cancun, with interests to address both medium and long-term adaptation needs in developing countries. Ghana's NAP process seeks to identify priority climate adaptation actions; facilitate institutional coordination around climate change adaptation; and accelerate mobilization of funds for climate change adaptation.

In November 2018, the Government of Ghana, through the Ghana EPA released the National Adaptation Plan Framework. The NAP Framework guides the development of Ghana's national adaptation plan, the coordination process of developing the plan, and the implementation of the plan. Overall, the framework in serving as a guide, outlines the country's vision, objectives and principles for the NAP process, and contributes to addressing the country's adaptation needs in a coherent and coordinated manner.

As part of the national processes, Ghana submitted a NAP Readiness Proposal to the Green Climate Fund in October 2018 for approval under the objective that having a NAP framework in place would be crucial momentum for the country's adaptation planning. Furthermore, the framework aligns the NAP process with the country's existing policies, strategies and adaptation research; spells out stakeholder roles; and identifies specific themes relevant to Ghana's context such as its agrarian economy.

The framework assessed Ghana's governance systems and structures and highlighted certain approaches that should underpin a successful NAP process in Ghana. The governance approach requires both a vertical integration (i.e. mainstreaming adaptation across sub-national structures) and horizontal integration (i.e. integrating adaptation across government ministries) to ensure that climate change is well integrated in the different governance levels and economic sectors of development planning. Another major approach is the principle for inclusive stakeholder engagement in NAP planning and implementation especially the private sector who have minimal recorded engagement in adaptation and resilience building in Ghana.

The NAP also seeks to promote the engagement of the youth in climate change adaptation while also ensuring an inherent gender-responsiveness in its design and approach. The NAP document intimates that a deliberate focus on gender and social equality in development will help achieve more inclusive benefits and enhance human and environmental well-being. In achieving all of this, the NAP further recognizes that future climatic and non-climatic shocks are likely to change with time and therefore is provisioned to be flexible. This flexibility allows future dynamics and changes in vulnerability due to social, economic, and climatic changes to be considered and planned for.

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In line with the goal to enhance national adaptation planning and action in developing countries, the NAP Global Network contracted Climate Analytics to support the EPA in commencing actions to improve private sector engagement with specific focus on continued NAP planning and implementation. Climate Analytics and IISD undertook initial consultations with some key private sector stakeholders selected on the basis of perceived interest in the topic (i.e. either demonstrated interest or expected vulnerability of the sector), and influence (i.e. considering their role in the sector, coverage of membership, or position to effect change). Due to the wide nature of private sector in Ghana, IISD and Climate Analytics could not cover all actors. This project under PIER therefore builds on the work that was commenced by IISD and Climate Analytics by broadening the scope of actors consulted, through the in-depth consultations with new and different actors not already engaged. Based on stakeholder consultation, existing vulnerability studies, role of private sector actors (that is sectors that are dominated by or had significant private sector engagement), and assessment of interest and influence of the private sector actors, EPA, IISD and Climate Analytics prioritized 4 sector industries to be considered under a PSES for NAP. The prioritized sectors are Agriculture, Finance, Construction, and Mining.

***As per the Ghana NAP framework, the governance approach for the country's NAP requires a vertical and horizontal integration***

# 5. Overview of Private Sector in Ghana

Ghana's economy has shown progressive boom leading to the country having achieved middle-income status in the last decade. Since 2017, the fast pace of growth has placed Ghana among 10 fastest growing economies in Africa. With a GDP of GHS256.6bn (\$55.4bn) at the end of 2018, and a continued expansion in 2019 with real GDP growth estimated at 7.1%, Ghana is arguably one of the year's fastest-growing economies worldwide (See Figure 2 below). Ghana is the second-biggest gold producer in Africa and second largest producer of cocoa worldwide. Both of these sectors are private sector owned and operated, as are other major sectors in the countries such as oil and gas, and telecommunications. The discovery and subsequent exploration of oil and gas in Ghana is streaming in revenue for the West African State. There has also been a rapidly expanding information and communications sector. In first quarter of 2018, the communications and information sector grew by 26% (Oxford Business Group, 2019)<sup>9</sup>.

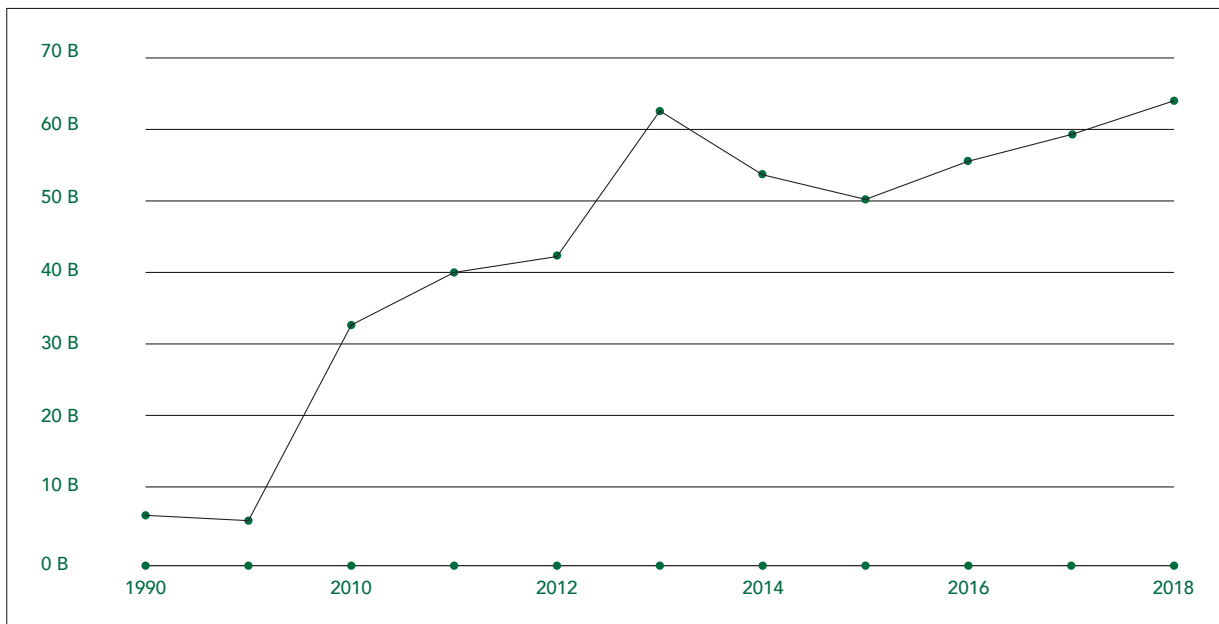


Figure 2: GDP growth trend for Ghana

Understanding the context of private sector in Ghana is key to understanding how they operate and appropriately identifying the roles that private sector can play in adaptation. The private sector i.e. the formal and informal small-medium enterprise segment is responsible for 93% of jobs in the country. It is recorded that Micro, Small and Medium enterprises (MSMEs) comprise 92% of all companies in Ghana, with a contribution of 70% to the nation's GDP pie. A major challenge for these MSMEs however is the limited access to finance and the high cost of borrowing from financial institutions, all of which impact the ease of doing business in Ghana. On a scale of 1 to 190, with 1 being the best and 190 being the worst, the ease of doing business ranks Ghana's economy as 118, which indicates that Ghana does not have the most conducive regulatory environment for business operations. The challenge of access to finance stifles growth and reduces the ability of MSMEs to improve technical capacities in a competitive global market.

<sup>9</sup><https://oxfordbusinessgroup.com/ghana-2019/country-profile> (15/01/2020)

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The private sector is made up of individuals and organizations engaged in money generation activities that thrives on government creating an enabling business environment for their successful operations. While the private sector needs government's help to operate in a conducive environment, the government in turn needs the private sector to complement its efforts in the creation of jobs, provision of infrastructure and services, revenue generation, and much more recently as partners in environmental stewardship. According to Hoedoafia (2019), the private sector is identified as a key player in delivering economic, social and environmental development in both developed and developing countries. In Ghana, the private sector operates in both formal and informal sectors, all of which contribute to the economic growth of the country. There are several characteristics of various businesses including sole-proprietorship, conglomerates, multinational corporations, smallholder farmers, struggling businesses, rich businesses, etcetera, all taking risks and relying on markets for profits and income (Hoedoafia, 2019). Though private initiatives and risk-taking are key characteristics of private sector operations, what is key for advancing resilience is the markets and competition known to drive production and instigate invention (Hoedoafia, 2019).

Ghana's then Ministry for Private Sector Development & Presidential Special Initiative was established to provide an overall enabling environment for private firms to operate efficiently, and specific institutions and policies to promote private sector development. In the current ruling administration, a Ministry of Business Development with similar goal to advance private sector activity in Ghana was envisaged. In 2011, a national policy on Public Private Partnerships (PPP) was developed to encourage private sector participation in infrastructure and services delivery. Thus, activities of private businesses are said to add value to a nation's resources through the introduction of new ideas and ability to combine such resources (Bonaglia and Fukasaku, 2007). Private investments play a critical role in economic growth by often embodying newer technologies and capital compared to public investments (Hoedoafia, 2019). However, the private sector in Ghana is not without some challenges. The private sector faces inadequate access to long-term finance; low skilled and poor corporate management, inadequate infrastructure support, and stifling bureaucratic systems, among others.

Private sector engagement in adaptation and in building resilience has become a key topic of discussion in many countries mainly due to the realization that donor funding is not positioned to sustainably support adaptation actions in the longer term. Private sector can therefore play several critical roles in building resilience. However, private sector is not homogenous but highly diverse and therefore engaging them requires a strategy that targets all the different types of private sector actors. Earlier studies commissioned by the EPA indicated that based on the types of private sector in Ghana, the two broad ways within which private sector can engage in adaptation is to minimize climate impacts to business delivery and markets; and by creating markets in technologies and services that are beneficial to adaptation.

# 6. Key Industries and Vulnerabilities

## 6.1. Agriculture

Agriculture is a key component of Ghana's economy accounting for about 42% of the country's Gross Domestic Product (GDP) and employing more than half of the national workforce, mainly small landholders (GIPC, 2020)<sup>10</sup> who are into subsistence farming. Thirty-five percent (35%) of the agricultural commodities produced in the country are exported. Ghana's agricultural sector includes land-based crop farming, fisheries, and livestock and animal husbandry. Land based farming is largely rain-fed across the country and therefore highly climate dependent. With changing climate and variability, agriculture across all of Ghana's geographic zones is projected to suffer significantly especially for cocoa, which remains a vital cash crop. With increasing rainfall variability, there is increase in risks associated with predictions such as timing for planting, and also with total rainfall amounts projected to decrease, crop yields will be affected. Aside from increasing temperatures leading to increased incidences of bushfires, it will also cause pests and disease invasion that destroys farms.

Given the number of smallholder farmers, agriculture is one of the sectors with high private sector engagement. There are several platforms and associations within the sector that have been formed to propel the interests of farmers. These include Ghana National Association of Poultry Farmers, Peasant Farmers Association of Ghana, Vegetable Producers Association, Ghana Grains Council, Ghana Cocoa Coffee and Sheanut Farmers Association, and Farmers Organizations Network of Ghana. The fishing subgroup of agriculture which historically recorded high revenue numbers, is in decline due mainly to declining fish stock. On the other hand, the livestock subgroup is thriving and driving growth in the agriculture sector (Oxford Business Group, 2019). Government of Ghana aims to enhance competitiveness and profitability of crops via access to improved and modern technological packages for increased production. In addition to increasing productivity, the government plans to ensure sustainable management of the environment in crop production systems. This offers an entry point for agriculture and the consideration of climate change adaptation and resilience.

The Ghana National Adaptation Strategy (NCCAS) identifies agriculture as a key sector for addressing climate change. In the strategy, adaptation within agriculture includes building and strengthening the capacity of extension officers in new farming technologies to enhance their technical support to the farmers; build and strengthen capacity of local farmers to increase agricultural productivity and awareness of climate issues; promote the cultivation of crops and rearing of animals adapted to harsh climatic conditions.

<sup>10</sup><https://gipcghana.com/17-investment-projects/agriculture-and-agribusiness/cash-crops/282-sector-overview.html> (15/01/2020)

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## 6.2. Telecommunications

The telecommunications sector has been one of Ghana's fastest growing economic sectors since the first privatization of the sector occurred. In the 2nd quarter of 2019, the information and communication sector was the main driver of economic growth with a recorded 52.8% increase<sup>11</sup>. Telecommunication in Ghana has witnessed digital innovations like "mobile money", which is a technology that allows people to receive, save, and spend money using their mobile sim card number. The impact of climate change on other sectors will impact incomes and therefore the revenue that telecommunications make from the use of their mobile money exchange platform. In addition, increasing temperatures and reduced rainfall or drought will affect hydropower generation which will result in power failures and affect telecommunication services. Operators are therefore likely to face increased operation costs as they have to run more back-up generators. The increase in extreme weather events and storms will impact telecommunication infrastructure like uprooting transmission poles, while flooding will submerge and destroy telecommunication facilities. The telecommunication industry is therefore vulnerable to climate change as increasing temperatures, extreme weather events, and floods will impact its infrastructure and cause disruption of services.

## 6.3. Banking and Financial Services

The banking and financial sector in Ghana has seen rapid growth since 2010 with total financial assets growing from 53% of GDP in 2010 to 78% GDP in 2017. In recent years, the Bank of Ghana has led many reforms to strengthen the banking sector. There is a persisting high interest rate that discourages borrowing. The financial sector has catalyzed on mobile telecommunication penetration to operate within the digital space. With innovations such as mobile money skyrocketing, the financial sector in Ghana is increasing in its electronic outreach. A key resilience action within the banking sector has been the introduction of the Sustainable Banking Principles and Sector Guidance notes that ensure environmental concerns including adaptation are reflected in all aspects of the core operations of banks. The financial sector is likely to suffer from decreasing performance of other sectors that are affected by climate change. Loans granted to businesses will be difficult to recover as businesses are impacted negatively by climate change. The increase in frequency and severity of damaging floods, droughts, and increasing sea level rise, can lead to losses that destabilize insurance companies, banks, and other financial intermediaries with direct and indirect exposure to different affected industries and assets.<sup>12</sup>

<sup>11</sup><https://thebftonline.com/2019/editors-pick/telecom-sector-is-new-economic-powerhouse-as-it-grew-by-52-in-q2/>

<sup>12</sup><https://www.americanprogress.org/issues/economy/reports/2019/11/21/477190/climate-change-threatens-stability-financial-system/> (accessed 17/02/20)



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## 6.4. Mining

The mineral and mining sector in Ghana plays a critical role in the amount of foreign exchange revenue that the country earns. With 23 large-scale mining companies, and over 300 small scale miners that produce gold, manganese, bauxite, and diamonds, Ghana is Africa's number one gold producer. The industry has seen a proliferation of small-scale illegal miners referred to in the local lingo as "galamsey". The unsustainable means via which mining in Ghana is undertaken has resulted in destruction of waterbodies including rivers, lakes and lagoons. The destruction of waterbodies increases the risk of a changing climate that causes shortage of water, a resource that mining companies require significantly in their operations. Climate change will impact the stability and cost of water or mining operations. The sector is also likely to face interruption in production as increased rainfall and extreme weather precipitations can cause flooding and cost new and additional controls to be instituted. Climate change leading to higher temperatures are likely to increase the incidence and prevalence of tropical diseases which can impact workforce health.

## 6.5. Infrastructure, Building and Construction

Infrastructure, building and construction as a key developmental sector continues to be one of the important sectors for public-private partnerships (PPP). The sector has demonstrated consistent growth over the past years and employs over 320,000 people (Oxford Business Group, 2019). There is high demand for infrastructure development and construction due to increasing population, urbanization, and a growing oil and gas economy. Government has outlined frameworks that clearly articulate the roles of stakeholders in approved public-private partnerships. Major construction projects of PPPs have been for road constructions, real estate development, and ports development and improvement.

In Ghana, the sector is vulnerable to climate change impacts such as sea level rise, flooding, increasing temperatures. Increasing intensity and frequency of floods, rainstorms and strong winds are destroying roads, homes, drains, power distribution lines and many other structures. It is projected that coastal erosion and sea level rise will impact infrastructure on Ghana's coastal settlements especially the eastern coast. Heavy downpours will destroy road networks, public facilities, residential homes, cultural edifices and structures, etcetera.

# 7. Private Sector Engagement in Building Resilience in Ghana

## 7.1. Stakeholders' experience with climate change

### 7.1.1. Federation of Association of Ghanaian Exporters (FAGE)

The Federation of Association of Ghanaian Exporters (FAGE) comprises various businesses with a common denominator of exporting goods. The federation mobilizes several industries and institutions to discuss pertinent issues. Public agencies central to the operations of FAGE include Ministry of Trade and Industry, Food and Drugs Authority, Ministry of Agriculture, Plant Protection and Regulatory Services Division (PPRSD). However, in the case of climate change, FAGE considers PPRSD to be key as its the institution responsible for ensuring that planting materials are of high quality. In a changing climate, quality seeds will contribute to improving the adaptive capacity of agriculture, which is one of the main sectors of exports for FAGE.

The Federation is not focused on climate change issues but was engaged in the validation of the National Adaptation Strategy for the Infrastructure sector in 2019. FAGE has in the past approached GIZ and requested for farmers to be trained on climate smart agriculture and on building resilience, such as erecting wind shields/belts to protect their crops from heavy wind, crop diversification to reduce pest attack, etcetera.

### 7.1.2. Association of Small-Scale Industries (ASSI)

The Association of Small-Scale Industries (ASSI) acts as an umbrella organization for businesses in the production, manufacturing and servicing industry. ASSI was formed by the Association of National Board of small-scale industries in 1986. The association started with individual private sector operators and a few associations but currently comprises of businesses from more than 26 sector associations including the Ghana Electronic Association, Tailors Association, etcetera. ASSI is national and has presence in all of Ghana's 16 administrative regions and districts (about 171). With a system of district, regional, and national executives structure, the district executives serve as the core of ASSI and work with the district assemblies. Each National Executive Committee stays in office for 4 years and hold annual general meetings twice a year in the ruling period. ASSI has a national president that oversees day to day running of the association.

ASSI has been involved in several climate change meetings and dialogues with Ghana EPA, however, participation has been under the umbrella of the Private Enterprise Federation (PEF). Leadership of ASSI recognize that climate change has impact on their various businesses and trade especially on small scale farming. Aside meetings, the association has not undertaken or been involved in concrete adaptation and resilience actions. However, to safeguard the environment, certain members of the ASSI such as the Ghana Electronic Servicing and Technicians Association, and the National Association of Air Conditioners and Refrigerators, have embarked on campaign for the proper disposal of digital waste. Have not had any climate activity or resilience activities.

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Though some members of the association are into tree planting, it is not because of climate change. The leadership envisions a scale-up of the tree planting if its members become more aware and understand climate change.

### **7.1.3. Association of Oil Marketing Companies (AOMC)**

The Association of Oil Marketing Companies has been in operation since 2004 with an Industry Coordinator at the helm of affairs of the over 120 members. Shell, Total, Goil and Oando are the founding members. The association members are businesses dealing in Liquefied Petroleum Gas (LPG) and “white products” i.e. petrol and diesel. There is a 9-member board committee that meets quarterly to deliberate on association issues. There are 5 standing committees that carry out work assigned by the board. Each of the 5 committees are made up of 5 members and fall within the following categories: Health, Security and Environment Committee; Legal and Ethics Committee; Strategic Oversight Committee; Technical Committee; Product Security Committee; and Operations Committee. The industry coordinator sits on various committees, like National Petroleum Authority (NPA), Advisory council, etcetera. AOMC has only been engaged in climate change to the level of workshops and meetings such as those organized by the EPA and in the recent Global Landscapes Forum. There have not been specific interventions on climate adaptation and resilience undertaken by AOMC.

### **7.1.4. Ghana National Association of Poultry Farmers (GNAPF)**

The Ghana National Association of Poultry Farmers (GNAPF) with 3000 members, serves as the mouthpiece of the poultry industry in Ghana. The association has district and regional branches and an executive committee at the national level that governs it. GNAPF builds members’ capacity via workshops and training meetings on use of modern technology and on how best to mobilize as a platform to engage government.

GNAPF has not been engaged in climate change adaptation or resilience activities nor with any of the government climate change governance processes and interventions. According to the leadership of the association, poultry farming contributes to climate change and the sector is also impacted by the changing climate. However, this knowledge is not comprehensive amongst the members and therefore climate change does not get the required attention which therefore threatens loss of livelihoods.

### **7.1.5. Ghana Chamber of Telecommunication**

The Ghana Chamber of Telecommunication is an industry association of mobile network operators in Ghana. It is currently comprised of MTN, Airtel-Tigo, Vodafone, American Towers, Helios Power, and Eaton Towers with a national secretariat that oversees the day to day operations of the chamber. Though not permanently on a sectoral committee, the secretariat of the Chamber represents and engages various policy makers and the various government regulators on a constant basis including the EPA. There are 4 working groups that provide professional and technical capacity to support the Chamber’s work, namely: Technical, Finance, Communications, and Legal and Regulatory.

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The chamber participated in a stakeholder workshop that dialogued on the role of Ghana's private sector in addressing climate change hosted by the EPA. Engagement with the EPA is beneficial to the Chamber as there are early plan of the industry players to manage carbon footprint of their operations by adopting some sustainable means in their supply chain such as switching to the use of renewable energy sources. In addition, some members of the platform have adopted and commenced waste segregation strategies to improve waste management.

#### 7.1.6. Ghana LPG Operators Association

The association has members spread all over the country except in the three traditional northern regions. The association serves to protect the interest of LPG operators in meeting the demand for gas in the country. The association has not been engaged with the EPA on climate issues but have championed awareness raising on avoiding deforestation.



#### 7.1.7 Biogas Technologies Africa

Biogas Technologies Africa is a private sector actor that works in the environment sector including climate change adaptation and mitigation. Biogas Technologies chairs the NAMA private sector platform. NAMA platform deliberates on how to position Ghana to meet that NAMA obligations. Meeting depends on the availability of funding. MESTI hosts the platform and supported by EPA. About 10 organizations are on the NAMA including banks. Biogas Technologies is also part of the Public Procurement Authority task force because of sustainable production and consumption. The organization also participates in the Africa round table that works on sustainable production and consumption of biofuel and renewable energies. Biogas Technologies has been working to address climate change in Ghana by engaging on several climate change activities such as policy formulation, strategy development, capacity building and deliberations. Biogas Technologies has spearheaded the development of waste to energy strategy documents and submitted to the EPA for consideration.

## 7.2. Barriers/Constraints with Private Sector engagement in resilience

The stakeholder consultation identified several constraints to private sector engagement in resilience in Ghana as follows:

- Limited/Lack of knowledge, awareness and capacity
- Limited collaboration and ineffective coordination
- Lack of favourable government policies and law enforcement
- Limited financial resources and an enabling financial environment
- Bureaucracy

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### **7.2.1. Limited/Lack of knowledge, awareness and capacity**

The limited and, in some cases, total lack of knowledge on climate change by private sector actors deters engagement in building resilience and undertaking appropriate adaptation actions. The poor level of sensitization and awareness raising targeted at private sector by government has affected the prioritization of climate change for engagement. For private sector actors that have some understanding of climate change, the limitation has been the ability to appropriately identify which part of their operations will be affected by a changing climate, and how their operations in turn contributes negatively to climate change. Without frequent communication, information sharing, and capacity building/training by the public sector, the private sector fails to understand climate change issues, appreciate climate change integration, and engage to contribute to sustainable and resilient futures. For private sector banks and financiers, a lack/limited understanding of climate change with has been a major cause in the shortfall of availability of finance for green businesses, and the low number of private sector actors engaging in resilience building activities. Another tier of the problem is that despite the knowledge on climate change and the associated sector impacts that some private sector actors have, there is limited or no knowledge on solutions, and therefore the private sector actor continues operations on a business-as-usual approach.

### **7.2.2. Limited collaboration and ineffective coordination**

Current engagement with the private sector in efforts to adapt and build resilience in Ghana is limited. Government ministries and agencies take decisions and make plans with little or no involvement of private sector actors. Decisions are therefore taken in a vacuum and at times do not fully satisfy specific realities on the ground. The lack of engagement means that government is unable to ascertain the level to which private sector actors understand climate change and are engaged in building resilience. Without the consultation and participation, private sector actors fail to ascertain what part of their production chain/processes contribute to climate change, identify strategies for adaptation, and how government can support their engagement to adapt.

Effective stakeholder engagement or collaboration is most often interfered with by politics and therefore impacts the formation of holistic solutions that stakeholder engagement more often affords government processes and decision-making.

Furthermore, there is an existing silo mentality executed by various government ministries where collaboration and coordination with other requisite government ministries, agencies and departments are ignored in decision making and programme implementation. Coordination for the public sector has been challenging over the years, leading to decisions that fail to consider the interests, roles and responsibilities of various stakeholders including the private sector. There is an inter-ministerial committee where all the different ministries must work together but the coordination is a bit handicapped as some ministries do not communicate to each other. In most cases, when other sector ministries relevant to a decision process, are not engaged, there is either a duplication of efforts, or negative impact on private sector, which hampers private sector interest in engagement.

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There is limited engagement and provision of resources and public funds at the disposal of research institutions and the academia to develop context specific adaptation solutions for the uptake of private sector in Ghana. This hinders the availability of knowledge that exists for adoption by private sector actors in a bid to build resilience in their respective sector industries. However, another challenge linked to academia and research institutions is that the government more often relies on academicians and technocrats for project implementation and side lines the private sector.

In some cases, mobilising different private sector actors to engage or collaborate on a resilience project/programme is a daunting challenge. The competitive nature of businesses makes some refuse to collaborate with other private sector entities. Therefore, engagement is low where a government programme requires different private sector actors to work together. A typical example is in the Government of Ghana's landscape approach to reduce emissions from deforestation and degradation in the cocoa regions of Ghana, where some private sector actors initially refused to partner other private sector actors so they could work in their own space.

### **7.2.3. Lack of favourable government policies and law enforcement**

There are existing government policies that do not support businesses to thrive in the Ghanaian economy, while the absence of other enabling policies hampers private sector engagement including in building resilience. A much-needed protection from government for private sector functioning is missing, creating sustainability issues for private sector businesses in several sectors in Ghana. For example, the lack of protection for locally produced goods over preference for imports has contributed to the reduction in youth engaging in agriculture. According to findings, about 95 per cent of day-old chicks are imported from Holland, Turkey and other countries due to the perception that the local ones are sub-standard. The lack of enabling policies and environment results is attributed to political interferences as a major cause due to the allegation that some politicians are into importation and therefore choose to focus more on the importation than protecting the local private actor in the country. Politicians therefore lack focus on promoting climate change adaptation for private sector to engage.

There are several cumbersome processes that private sector actors face in registering new businesses and commencing operations in Ghana, which is affecting the existence of green businesses that will contribute to resilience. The institutional setup which causes delays, thwarts the interest of businesses to set up, coupled with the corruption experienced in registration processes. Therefore, even when private sector actors are well informed and knowledgeable on climate change, have the requisite capacity, and the needed technology to engage and contribute to resilience and adaptation, they get cut out of the process due to the unfavourable business environment.

Government efforts to ensure public-private partnership strategies and plan are actualised are not well grounded as law enforcement is weak and doesn't give the needed security required to invest and engage on initiatives. The failure of government to meet its roles and responsibilities in a public-private partnership arrangement creates a business-as-usual situation and affects the return on investment of the private sector actor. This dampens private sector enthusiasm to enter into partnerships with government even for resilience projects.

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#### **7.2.4. Limited financial resources and an enabling financial environment**

The financial resources available for private sector to pursue adaptation and resilience is limited. The urgency of the climate crisis does not correspond to the availability and type of facilities available for private sector access towards adaptation in financial institutions. Other issues receive prominent attention over climate change in the financial sector therefore contributing to a low number of trainings and deliberations held within the sector on resilience.

Private sector already relies on loans to run and must repay these loans from profit margins. Those who operate businesses are therefore usually looking for ways to cut costs in as much as they desire to implement the best of processes in profit generation. Financing is a major hurdle because the banks and financial institutions do not understand the importance of financing green businesses and adaptation. Without access to green finance, private sector is left with the option to borrow at high interest rates as under commercial loans. Therefore, without an enabling environment for green financing vis-à-vis the need to increase margins, the private sector refrains from adaptation actions and resilience building to cut down costs. This challenge of costs arises because private sector is much more short term focused, and do not see any immediate gains from resilience and adaptation, which are more often long-term benefits. The emission footprint of a business in Ghana is relatively low and so businesses who are already struggling with conventional operations, do not embark on resilient and sustainable pathways because those are perceived as relatively more expensive.

#### **7.2.5. Bureaucracy**

The biggest challenge with the two work systems, that is the Public Service and Private Sector, is with bureaucracies. Bureaucracy impedes Public-Private Partnerships to deliver adaptation related interventions for especially communities. In building resilience in the forestry and cocoa sector in Ghana for example, most of the private sector entities have offices in Ghana that are not in the position to take decisions. Therefore, despite constant engagement, results are delayed because issues must be communicated to superiors and higher authorities outside Ghana who make the decisions. In worst case scenarios, the in-country representatives engaged fail to properly articulate what the needs and discussions are. and they are not able to articulate what you want to do and put across. This challenge posed by bureaucracy is that lots of efforts, time and energy is spent on engaging stakeholders, which leads to no desired fruitful outcomes. Frustrations associated with bureaucracy causes private sector actors to refrain from engaging in activities including those that contribute to resilience.

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## 7.3. Barriers/Constraints with Private Sector engagement in resilience

The following were identified as factors needed to overcome the barriers identified above and improve the engagement of private sector in resilience. These include:

- Awareness raising, training and capacity building
- Improve collaboration and coordination
- Create enabling policy environment and improve law enforcement
- Creating enabling financial environment including green financing
- Softening Bureaucracy
- Developing and adopting standards
- Build and showcase profitable green business cases

### 7.3.1. Awareness raising, training and capacity building

Awareness raising to increase private sector knowledge of climate change and the need for resilience is key. Awareness raising should be undertaken at the local level in the appropriate local language to promote the sensitization and familiarity of local businesses with climate change. Information disseminated should showcase realities of a changing climate and that various stakeholders including businesses, must contribute to addressing it whether individually and/or collectively. Initiatives on the ground must be captured and showcased in a well packaged manner that makes sense and can be appreciated by private sector. In addition, more tailored trainings and capacity building sessions are relevant for private sector. Trainings and capacity building will create an understanding of the bigger developmental issues of climate change. In raising awareness and building capacity, government must lay out what adaptation and resilience actions can be achieved in the short, medium and long term. This should be accompanied by roles that private sector can play to contribute towards achieving the set resilience objectives. Continuous information sharing on climate change would help private sector to understand how climate change affects their operations and the sustainability of their business, and thus be able to strategize. As part of the awareness raising and capacity building approaches, the development and circulation of educational flyers and materials would further contribute to propagating the message. Apart from the technical aspects of climate change training, building capacity of businesses to advocate will further advance the desired and required private sector engagement.

With Private sector usually having the institutional set up and technology needed for building resilience, the knowledge from capacity trainings will foster engagement. Building the capacity of the institutions is crucial for public sector as the latter need key long-term private sector experts to champion the cause and contribute to achieving results. Capacity building should not be built on paper – it requires practicality beyond the theoretical trainings. For example, architects and other building professionals should be trained to understand green buildings so they can advise their clients accordingly and incorporate climate change into building designs and planning to foster resilience and sustainability. For private sector to effectively actualize the implementation of climate change resilience, building capacity of the artisans and people who work in these sectors is relevant. Capacity building of what is needed to build resilience would promote climate integration business activities and foster sustained long-term business plans.



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### 7.3.2. Improve collaboration and coordination

The work of the public sector would benefit from diverse viewpoints and experiential information when there is consultation and engagement with private sector stakeholders. The dialogue and discussions that arise out of collaboration, coordination, and stakeholder engagement promotes the creation of new knowledge which helps achieve more. Stakeholder engagement must take place in an environment that will foster both government and private sector learning and adapting from each other. Ideally, continuous engagement allows the public sector to get more from private sector and get the true picture so that objectives would be achieved, and the results will be suitable.

Engagement strategies must spell out the roles for all stakeholders. Collaboration between the public sector and private sector will only be effective after stakeholders have been sensitized enough to have understood the climate change issues and can engage in deliberations. Without the complete understanding of the issues, solutions from the private sector would not be forthcoming.

There should be a lot more collaboration between academia, research institutions and various operators to develop new solutions and strategies that take the context of Ghana and Africa into consideration. Aside government's role in roping in private sector, cross-sectoral dialogues between private sector actors would further strengthen capacity and firm up engagement with the country's adaptation efforts.

A grey area for attention, is to build the capacities of public sector officials on operational and technical delivery in resource utilization. The acquisition of such capacity is expected to create far more effective partnerships between private and public sector and promote private sector financing in adaptation and resilience actions. Further capacity building on private sector systems, would diversify the sort of engagements that government has with business owners and reduce the strong perception where private sector is engaged purely based on funding roles. Public private dialogues must be institutionalized and the first step of this requires the Ministry of Trade and Industry, Ministry of Business Development, and the Ministry of Environment, Science, Technology and Innovation to coordinate, collaborate, and develop robust plans on working together to mobilize private sector actors to build resilience.

By institutionalizing a continuous two-way engagement between the EPA and private sector experts in various fields, existing communication gaps will be closed. Existence of such a system will help identify workable local actions and modalities of implementation of the proposed actions for sustainability. A pre-requisite for effective collaboration, is to undertake a needs assessment to determine existing skills of artisans and the additional knowledge and skills required to develop, innovate, and operate and maintain technologies for resilience.

There should be increased commitment to resource provision and funding for research institutions and academia towards developing different adaptation and resilience actions for several sectors. Examples of this can be drawn from work that has been done by CSIR in developing and propagating appropriate quality seeds, and drought resistant varieties of crops like maize. The research institutions should further explore partnerships with private sector actors on researching into needed adaptation actions and resilience activities.

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### **7.3.3. Create enabling policy environment and improve law enforcement**

Private sector actors in Ghana need an enabling policy environment that will foster their trade and promote their further engagement in resilience building. Without the appropriate enabling environment, the private sector faces conventional problems that hinders new and innovative actions for resilience. A fostering policy environment would attract more private sector investment and actors. For example, urbanization is leading to agricultural lands being overtaken by other land uses, and coupled with the high level of importation, affecting local agricultural businesses, and deterring engagement in agriculture. The public sector must protect agricultural businesses by developing and introducing an enforceable land use map that delineates agricultural lands and other land uses. There should be a lot more commitment from government on law enforcement, policy restructuring and policy implementation for the private sector to thrive. Government must stick to its commitments of public-private partnerships. The successful enforcement of laws provides security to private sector actors.

There should be incentive schemes for businesses that are trying to deploy cleaner ways of doing business, and greener ways of living. Same incentive approach should be targeted at businesses that invest in adaptation related actions. This will encourage and promote engagement in green and resilience projects and programmes.

To improve private sector engagement, the power of policy and law must be used to encourage businesses to invest more in resilience through their Corporate Social Responsibility actions that must consider climate related adaptation interventions. Policies that would require private sector to consider elements of adaptation to a changing climate in pursuant of their activities and work is key. The government can fund the private sector to undertake turn-key adaptation projects, but with the appropriate policy directions. Part of an enabling policy environment is the support for intellectual property protection so that industries feel secure to develop and share new technologies and solutions that can support resilience building.

### **7.3.4. Create enabling financial environment including green financing**

To engage in adaptation and build resilience, the private sector requires the appropriate resources. Finance should be available and accessible by businesses that innovate and find solutions to climate change challenges. With the right enabling financial environment, businesses can scale up green efforts and those without green portfolios can enter the space. Part of Ghana having an enabling financial environment, is to have cheaper sources of funding and borrowing to pursue green initiatives. The lending rates for green business should not be same as the commercial loans since private sector would not borrow at such high lending rates to undertake adaptation actions or incorporate resilience into their conventional activities. Resilience activities are usually beneficial in the long term, but commercial loans are often issued on short term loan conditions. Therefore, the right financing models would have to be put in place.

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Banks, financial institutions and other lending agencies of the private sector, must be sensitized and trained to understand resilience issues so that they can recognize bankable proposals, and appreciate the role of green financing in a developing economy such as Ghana's. The sensitization and education must highlight how long-term investments, and ethical investments are key in sustaining the banking industry itself. The public sector must engage and work together with the financial sector to create an enabling financial environment in Ghana to promote private sector engagement in resilience.

### **7.3.5. Reduce bureaucratic processes**

For effective engagement, bureaucracies in both public and private sector need to be reduced. Breaking barriers to bureaucracy require efforts that create an understanding of the benefits of the resilience initiatives, so that duty bearers will place premium on initiatives. Government needs to review its systems for private sector registration and soften any administrative bureaucracies that delay processes unduly. These will promote the ease of doing business in Ghana and foster private sector engagement including establishment and registration of new green businesses.

### **7.3.6. Developing and adopting green standards and certification**

To promote resilience activities in private sector, government should consider promoting the use of green standards in trading so that by their competitive nature, private sector would strive to meet those standards. Green standards would ensure that businesses follow codes that safeguard resources and promote environmental well-being thus contributing to society's resilience to changing climate and variability. Accompanying the use of standards is the need for certification to show that products conform to requirements and therefore meet the desired quality. Aside from the introduction of green standards, government must ensure that enforcement is strengthened. For example, a standard requiring sustainable cocoa production showcases the adoption of dynamic agroforestry processes and reduces encroachment and deforestation in forest reserves.

### **7.3.7. Build and showcase profitable green business cases**

To increase private sector engagement, government must sufficiently demonstrate to businesses that going green will positively impact and improve bottom lines. Private sector is primarily concerned with return on investment so government must draw plans to show benefits of climate actions, programmes/projects for the private sector. The benefits do not always be monetary but innovative enough to include non-monetary benefits e.g. a national award recognizing green and resilience efforts. When such recognition boosts businesses, it peaks interest for continued engagement and sets as an inviting example for other businesses. A conscious and well thought plan should have the returns on investments that covers a host of financial, social, and environmental benefits. As part of showcasing green business cases, government should develop comparison scenarios using accurate data on outcomes for when no action is taken by the business and when action is taken. The government having pilot projects/cases to showcase, will allow people to first hand witness and appreciate climate resilience in business and to encourage climate change inclusion in business by businesses.

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## 7.4 Opportunities and entry points

The earlier part of this section lays out the general opportunities and entry points identified for private sector engagement, while the latter part focuses on entry points for specific actors consulted. The general opportunities and entry points identified to facilitate private sector engagement are:

- Linkage to broader sustainability and development frameworks
- Using existing committees, working groups and platforms
- Link to other stakeholder efforts, projects and interventions
- Corporate social responsibility
- Integrating CC into Environmental impact assessment and environmental reporting

### 7.4.1 General opportunities and entry points

#### [Linkage to broader sustainability and development frameworks](#)

The Private Sector Engagement Strategy (PSES) must link to the broader frameworks of Sustainable Development Goals (SDG) Financing strategy, the Nationally Determined Contributions (NDCs), and other key national climate and resilience processes. The PSES needs to contribute to the bigger discussions already happening in-country on mobilizing resources from the private sector to implement the SDGs. These resources are regarded in both financial and technical assistance and so there is the opportunity to coordinate all the various initiatives targeting private sector engagement to achieve impact at scale without duplication.

Another entry point is the government's current development policy agenda of "Ghana beyond aid". It instigates the country to consider using its own resources in an optimal manner, and to be creative and innovative to finance its development. The development policy agenda sets the case for promoting private sector engagement including financing over donor-led funding in building resilience.

Engaging private sector in resilience is geared towards sustaining the country's economic development. Therefore, with the government's one district, one factory, from the Ministry of Trade and Industry, private sector can be engaged in resilience and adaptation. These factories can be owned and operated by private sector but with directive from government to have an element of green business portfolio. This will create wealth, create sound environment and sustain the industry. Government can use this opportunity to establish factories that consider adaptation and integrate resilience as a showcase to private sector.

#### [Using existing committees, working groups and platforms](#)

There are platforms, working groups and committees that already exist within the environment, climate change, and development sectors in Ghana. No new engagement structures are needed as there is the opportunity to capitalize on engaging key private sector actors on existing platforms and committees to embolden their role in resilience building.

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There is an SDG private sector working forum, that periodically organizes breakfast meetings with companies and businesses to examine resource mobilization towards SDGs implementation. Though SDG is broader in scope, the existence of Goal 13 on Climate Action serves as an entry point for pushing discussions on private sector's active engagement in resilience and climate adaptation. The breakfast meetings can serve as platforms for sharing information on existing adaptation interventions and for showcasing and marketing well-packaged innovative ideas as a springboard for private sector identification of entry points.

There is a Sustainable Banking Initiatives platform that is comprises of the Bank of Ghana, Ghana Association of Bankers, and the EPA who have developed Sustainable Banking Principles. The Sustainable Banking Principles apply to 5 sectors: Agriculture and Forestry; Mining, Oil and Gas; Construction and Real Estate; Energy and Power; and Manufacturing. With principles including "identifying, measuring, mitigating, and monitoring environmental and social risks and opportunities in banks' business activities", this platform can serve to promote the engagement of private sector actors in resilience building.

#### [Link to other stakeholder efforts, projects and interventions](#)

There are several stakeholder efforts and projects in Ghana that provide the impetus for private sector engagement in resilience. Recently, UNDP Ghana country office decided to increase focus on engaging private sector via both support that can be provided to private sector (especially Small Medium Scale Enterprises) in terms of business models and improvement of business operations, and on leveraging resources from private sector. For example, in its South-South Cooperation on renewable energy technology transfers project, UNDP Ghana, is engaging private sector in Ghana and China to examine joint ventures especially in the renewable energy space. Furthermore, UNDP Ghana is supporting MESTI to develop financing strategies for the implementation of the NDCs by examining bankable projects that can be developed, and the resources that can be mobilized. To propel private sector engagement with the appropriate government agencies working in climate change adaptation and resilience, there should be conscious effort to link into existing initiatives and projects. UNDP is compounding lessons learnt on its private sector engagement including business operations, models, successes, and challenges.

Another example of how projects can be entry points to facilitate private sector engagement in resilience is the C40 support for building resilient cities. With funding from Denmark, and increased focus on Africa and African cities, there is opportunity to include private sector roles in 5-year plans being drawn up for building resilient cities. Climate adaptation, sustainable production and growth as has been established as priorities for Tema Metropolis, can be the focus of engaged private sector actors.

#### [Corporate social responsibility](#)

Companies and businesses embark on Corporate Social Responsibility to contribute to society's development. There can be a deliberate government policy to promote and encourage businesses to consider building resilience into their corporate social responsibility projects. Some corporate social responsibility projects can be fully geared towards adaptation related actions on the ground.

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### [Integrating CC into Environmental impact assessment and environmental reporting](#)

Environmental reporting is submitted annually to EPA by businesses and companies. The EPA guidelines for annual environmental reports, need to include requirements of private sector indicating how they contribute or build resilience of resources relied on and/or areas operated in. Under such requirements, private sector will allocate resources for resilience especially as it is an opportunity to showcase their efforts and build their brand. Linked to company set up is the requirement for completing environmental impact assessment which is submitted to the EPA. Likewise, the guidelines for completing EIAs should integrate climate change and resilience into its requirements so that businesses can demonstrate intention to contribute to resilience building and/or address climate impacts that may be worsened by their business operations.

### **7.4.2 Sector-specific opportunities and entry points**

In the next section, entry points and opportunities identified for specific industries are presented:

#### [Agriculture](#)

There is an agricultural committee organized by the donor community, that meets to discuss issues within the agricultural sector. Though invitations are sometimes extended to private sector actors, there is no designated permanent representation on the committee. There is value in identifying such committees and participating in issues on resilience in the agriculture sector. The creation of a specific value chain committee that discusses the movement of products from the farm to consumer and the associated climate threats and solutions is recommended. To promote engagement on climate smart agriculture, members within FAGE can be used as role models for demonstrations. These demonstration farms will serve as practical examples of the difference between farms using traditional approaches, and those installed under a resilient pathway approach. The availability of such evidence will encourage private sector engagement in building resilience.

The Ministry of Food and Agriculture is embarking on a one district, one warehouse initiative, which increases adaptive capacity of farmers. The use of these warehouses for produce storage will reduce perishability of farm produce and therefore support food security measures and the resilience of private sector actors. Engaging the private sector in the implementation of this initiative would increase support for the action and improve the sector's focus on resilience related actions.

#### [Small Scale Industries](#)

The Association of Small-Scale Industries hold general meetings every 6 months, and an annual general meeting at the end of the year. The annual general meeting brings together members in all the districts and various sectors. Therefore, to engage the association, EPA should coordinate and plan with the executives so activities such as training and sensitization can be aligned and delivered at the Annual General Meetings. The Ministry of Trade and Industry has included ASSI actively in the preparation of the Micro-Small-Medium Enterprises (MSME) policy. The association has further engaged on platforms and interacted with various processes led by the Ministry of Trade and Industry. The opportunity is to do similar and for ASSI to share and discuss with EPA its workplan.

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Based on national priorities, EPA can then advise on the components and activities in ASSI's workplan that are related to environment and climate change and can contribute to meeting the country's commitments. ASSI keeps a 5-year strategic plan for its operations and reviews its workplans annually so there is opportunity to review and include resilience issues once the capacity is built. Examining workplans of private sector associations is key for pushing climate change engagement of private sector in Ghana. Financial support towards integrating resilience in the workplan would also promote the engagement of ASSI as some members have the knowledge and understanding of climate change, but lack resources.

### [Oil and gas](#)

An entry point for the Association of Oil Marketing Companies is the assistance from public sector to undertake a risk and vulnerability assessment for the industry as this will help safeguard businesses. A risk and vulnerability assessment would show how exactly climate change is impacting the industry's supply chain. For example, how much product volume is lost, where the losses are greatest, etcetera. due to increasing temperatures. AOMC members can then translate the loss into financial costs and compare to the costs and long-term benefits involved in increasing resilience and adaptation. Once savings are made from the latter, businesses would be motivated to engage in adaptation related actions. There is a staff training on health and safety organized for AOMC members annually. This is a good platform to integrate climate change adaptation and resilience trainings, so industry actors understand how climate change is impacting the sector and the solutions required to build resilience. In the NAP planning, EPA needs to consult the association as the pragmatic experience in the sector and of the various businesses across the country can add insight into policy and strategy.

The Liquefied Petroleum Gas Operators Association are poised to support tree planting and the promotion of LPG in the rural areas. The association's presence across a wide geographical coverage of the country presents the opportunity to work with the national EPA office and regional offices to sensitize citizens on risks of deforestation and tree burning for charcoal production. The Ghana EPA and other relevant public sector agencies should use the already mobilized LPG Operators platform by training and building tailored capacity, and financially supporting visits to the rural areas to empower rural folks to adopt and use gas instead of charcoal and firewood. There would be a lot more resilience in the forest and natural resource sector if rural folks understand the effects of tree cutting, deforestation and degradation.

### [Telecommunication](#)

The Ghana Chamber of telecommunication highlights that an entry point for the sector to engage in resilience and climate change adaptation is the promotion of the use of telecommunication technology for virtual meetings to cut down travel for meetings. This requires investing in telecommunication equipment that provide optimum service so that other private sector actors and stakeholders will choose tele-meetings over physical ones.

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Another entry point is the role of telecommunications in awareness creation on climate adaptation, resilience and all other government interventions such as the NDC's and the NAP. The medium via which public agencies create awareness and encourage green business investments is well served via telecommunication systems. Any sector that is prioritized under the Ghana NAP, relies to some extent on the use of telecommunication technology. Within digital transformation, sectors such as agriculture can benefit from early warning systems using telecommunications, which also applies to health, education, mining etcetera.

Specific to the NAP process, the Ghana Chamber of Telecommunications can partner with the EPA to use technology in supporting the monitoring and evaluation of the NAP. To a very large extent the mobile industry is ubiquitous, and it affects and impacts on several sectors. Therefore, climate impact on other sectors would ripple affect the industry. Considering this, the telecommunication industry needs public sector partnership to study and understand of various sectoral impacts on the industry and identify the appropriate technology to support and make its services sustainable.

The government needs to prioritize telecommunication under NAP process given the extent of the industry and linkage to the performance of other economic sectors.



## 8. Way Forward

The in-country consultation has revealed insights and findings on private sector engagement in Ghana's national adaptation actions and resilience. The study will feed into the next project steps and culminate in a drafted Private Sector Engagement Strategy. The immediate step is to conclude on consultations with some key stakeholders who were not engaged such as Private Enterprise Foundation, and the Sustainable Banking Initiative.

A review of existing literature on capacity assessments and opportunity identification toolkits will be carried out to identify successes and challenges with the use of such capacity assessment tools by mid-March 2020. The output is to develop a localized assessment protocol for institutional capacity assessment and opportunity identification for private sector engagement. The assessment tool would be deployed for public sector agencies, platforms and committees that engage in resilience in Ghana such as the EPA, MESTI, Forestry Commission, National Climate Change Committee, Ministry of Lands and Natural Resources, Ministry of Trade and Industry, and the Ministry of Finance.

Based on the findings from the assessment protocol, an action plan for institutional capacity building and collaborative framework designed to fit the local context will be developed and finalized by end of second quarter of 2020. This process of developing the action plan will be iterative using key stakeholder interviews and organization of stakeholder validation meetings. Several trainings will be organized for EPA staff and relevant government stakeholders including Ministries from June to July 2020, to create awareness and build capacity on NAP and for the action plan to facilitate implementation. In July 2020, the action plan for private sector engagement will be evaluated to ascertain if the action plan is meeting the required needs and effect any necessary changes to the modalities of public-private sector engagement on climate change adaptation and resilience is effective.

# Bibliography

- Ackah, C., Adjasi, C., & Turkson, F. (2016). Industrial Policy in Ghana. In *Manufacturing Transformation: Comparative Studies of Industrial Development in Africa and Emerging Asia*. Oxford Scholarship Online. Doi:10.1093/acprof:oso/9780198776987.001.0001.
- Antwi-Agyei, P. (2018). Ghana's National Adaptation Plan Framework. Environmental Protection Agency, Accra.
- Asante, F. A., Amuakwa-Mensah, F. (2015). Climate Change and Variability in Ghana: Stocktaking. *Climate*, 3:78-99. Doi:10.3390/cli3010078  
Bank of Ghana. (N.D). Sustainable Banking Principles and Sector Guidance Notes.
- Bonaglia, F. and Fukasaku, K. (2007). Private Sector Development in Poor Countries: Seeking Better Policy Recipes? *OECD Policy Insights*, 48, 1-2.
- Government of Ghana. (2011). National Policy on Public Private Partnerships. Ministry of Finance and Economic Planning, Accra.
- Hoedoafia, M.A. (2019). Private Sector Development in Ghana: An Overview
- MESTI. (2013). Ghana National Climate Change Policy. Accra.
- Nelson, J., Schuchard, R. (N.D). Adapting to Climate Change: A Guide for the Mining Industry. BSR
- The Ghana Chamber of Mines. (2019). Performance of the Mining Industry in Ghana – 2018. Accra.
- The Ghana Chamber of Mines. (2018). Performance of the Mining Industry in Ghana – 2019. Accra.
- The World Bank. (2019). Enhancing Financial Inclusion; 4th Ghana Economic Update. Washington.
- UNDP. (2012). National Climate Change Adaptation Strategy. Accra
- USAID. (2012). Ghana Climate Vulnerability Profile. Annex to USAID Agency Sustainability Plan and Agency Adaptation Plan.

# Appendix 1

No	Name	Organization	Date of Interview
1.	Anthony Sikpa	Federation of Associations of Ghanaian Exporters	5th November 2019
2.	Afari Idan	Biogas Technologies Africa/ NAMA Private Sector Platform	8th November 2019
3.	Kenneth Edem Ashigbey	Ghana Chamber of Telecommunication	27th December 2019
4.	Alfred Addo-Yobo & K. Agyemang-Duah	Association of Oil Marketing Companies	11th November 2019
5.	Torgbi Adaklu V	Ghana Liquefied Petroleum Gas Operators Association	6th November 2019
6.	Saeed Moomen	Association of Small-Scale Industries	5th November 2019
7.	Lawrence Tetteh	Ghana National Association of Poultry Farmers	19th December 2019
8.	Abena Baafi & Ole Pilgaard Stubdrup	Support to Private Sector Development Programme, Danish Embassy	12th November 2019
9.	Saadia Bobtoya	IUCN	11th December 2019
10.	Kingsley Bekoe	UNDP	21st November 2019
11.	Roselyn Zuta	Forestry Commission	23rd December 2019
12.	Juliana Bempah	EPA	20th December 2019



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