### **REVISED STAP SCREENING TEMPLATE**

GEF ID	11074
Project title	Global Programme to Support Countries to Upscale Integrated Electric
	Mobility Systems
Date of screen	13 June 2023
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# 1. Summary of STAP's views of the project

This program aims to support the global shift to zero emissions electric mobility in Low and Middle-Income Countries (LMICs) and mitigate the adverse effects of poor end-of-life management of used electric vehicles and their batteries. Thus co-addressing climate change and waste management goals. The program seeks to increase the number of countries implementing the GEF-7 e-mobility program from 32 to 39 and contribute to upscaling integrated e-mobility systems in LMICs. It will leverage the work of the GEF-7 program by using existing structures and institutional arrangements to support new national child projects.

The project document is well-prepared, providing a detailed description of baselines and issues on e-mobility in LMICs. The theory of change includes all the necessary information and shows the causal pathways to success and the underlying assumptions. The five program components addressed the identified barriers, and the proponent provided a detailed description of intended activities and expected outputs.

Policy coherence will be essential to achieve the expected outcomes, and the proponent indicated some relevant activities around this, including inter-ministerial collaboration and policy and regulatory framework development. STAP recommends strengthening activities under this aspect to ensure that no contradictory policies in countries or at the regional level could derail the program's goal.

Overall, STAP believes this is a viable program that can deliver on its objectives if well implemented. STAP has provided some recommendations that can further help enhance the program.

#### STAP's assessment\*

✓ Concur - STAP acknowledges that the concept has scientific and technical merit.
Minor - STAP has identified some scientific and technical points to be addressed in project design
Major - STAP has identified significant concerns to be addressed in project design

Please contact the STAP Secretariat if you would like to discuss.

# 2. Project rationale, and project description – are they sound?

This program builds on and expands the work started in GEF-7. The problems and issues to be addressed at the country level and the implications at the global scale are well-articulated. The main drivers of the problem linked to an increase in fossil-fuel-driven internal combustion engine vehicles in the transport sector are adequately described. Various components of the status quo and proposed system shifts and how they interact are explained. Upstream and downstream elements are highlighted.

The proponents correctly highlight that in the absence of interventions to support the e-mobility transition, there is a risk of a burgeoning increase in fossil fuel use, GHG emissions and air pollution from road transport, and accumulation of large amounts of end-of-life EVs and batteries in LMICs. Continuing along this path will negatively impact global climate change, increase pollution, including hazardous materials containing POPs, and increase the cost of mobility, affecting the overall quality of life globally, regionally, and locally.

The proposal wrongly identified NOx, SOx, and PM as short-lived climate pollutants. Although these are usually co-emitted with black carbon (a shortlived climate pollutant), they are not classified as shortlived climate pollutants. The primary shortlived climate pollutants are black carbon, methane, tropospheric ozone, and hydrofluorocarbons. It is also essential to note that SOx has a global climate cooling effect, which must be accounted for in projects that simultaneously address short-lived climate pollutants and SOx.

The programs' objectives are well-formulated and justified, and a convincing explanation of the need to shift to efficient and effective e-mobility systems and manage e-waste is given. The changes happening in the global North, from where the global South imports vehicles, make this project of paramount importance in preparing countries in the global South for the inevitable global shits to e-mobility. The proponents also give a detailed account of the intended outcomes and how they will change the baseline. The key barriers and enablers to achieving the outcomes are described at the global child project level.

A detailed theory of change narrative and diagram that builds on a problem tree was provided at the global child project level. The interventions identified in the theory of change are described in a detailed and logical manner to discern the main focus and basis of the proposed solutions. All the critical elements of a good theory of change are included.

The link to the GEF-7, other e-mobility initiatives, and other integrated programs is a significant strength of this program. The key stakeholders are convincing and identified, and their anticipated roles and responsibilities well-articulated. By utilizing structures and the knowledge-sharing platform established in GEF-7, the GEF-8 program will benefit from experiences, lessons, and adjustments to improve the delivery of set objectives. The program also includes well-designed knowledge curation, management, dissemination, and learning activities built across the program components.

The plan to develop policies to support e-mobility and circularity is welcome, as well as the intention to ensure policy coherence, including through inter-ministerial collaboration, harmonization of policies, and engaging other sectors. It is essential that the activities related to this also include undertaking an analysis of policies across the various economic sectors to identify any incoherence or contradiction at the national or regional levels and ensure that the policy and regulatory components of the program address these issues, if any are found. This will be essential for the durability of the outcomes and impact of the program.

The program has the potential to demonstrate different innovative solutions (technology, financing schemes, business models, policy, and institutions) that can be replicated, scaled up, and potentially lead to the transformation of the sector, especially concerning promoting circularity. We encourage the proponents to consider activities related to this as the program is developed further. For example, how to incorporate circularity in policy designs that will contribute to innovative thinking to incentivize and facilitate circular methods of production and consumption. What policies can LMICs implement to promote the redesign of e-vehicles for enhanced reusability and recyclability? What financing scheme will attract entrepreneurs and VCs into this sector? What business models will be more effective for LMICs? Etc.

STAP commends the proponent for including indicators for tracking the success of each project component, some of which are aligned with STAP's recommended metrics for tracking transformational change. Including other transformational change metrics recommended by STAP will also be helpful.

The PFD provides a detailed explanation of how the GEBs were estimated. It also recognized the potential to generate other local environmental and socioeconomic co-benefits, including the growth of local economies, job creation, and air pollution reduction. We encourage the proponent to consider how these co-benefits would be tracked so that the full return on GEF's investments can be reported.

Including women or vulnerable groups in this currently male-dominated industry will be vital in fostering equity in e-mobility systems. More details on how this will be done need to be included.

The program intends to cooperate with other financing institutions, including the GCF. STAP encourages that this should be explored as this could be a good way of demonstrating GEF-GCF complementarity.

The several risks to the project are identified, and appropriate mitigation measures are described.

# 3. Specific points to be addressed, and suggestions

We recommend the following as the program is further developed:

- 1. Include activities to undertake analysis of policies across the various economic sectors in each country to identify any incoherence or contradiction to ensure no conflicting policies could hinder the program objectives.
- 2. Include Figure 2, which is currently missing.
- 3. STAP encourages the global child project to distill knowledge and lessons on effectively transitioning to a circular economy across the various targeted sectors in the program and how policy design can be an effective enabler.
- 4. Reflect and proactively include interventions that foster innovation and consider how to ensure scale-up and catalyze transformational change.
- 5. Consider adding indicators for tracking transformational change. Please see <u>STAP's paper on transformation</u> for more details.
- 6. Put in place the provision to track, measure and report these co-benefits. Please see <u>STAP's paper on incorporating co-benefits in GEF's investments</u> for guidance.

<sup>\*</sup>categories under review, subject to future revision

### **ANNEX: STAP'S SCREENING GUIDELINES**

- 1. How well does the proposal explain the problem and issues to be addressed in the context of the **system** within which the problem sits and its drivers (e.g. population growth, economic development, climate change, sociocultural and political factors, and technological changes), including how the various components of the system interact?
- 2. Does the project indicate how **uncertain futures** could unfold (e.g. using simple **narratives**), based on an understanding of the trends and interactions between the key elements of the system and its drivers?
- 3. Does the project describe the **baseline** problem and how it may evolve in the future in the absence of the project; and then identify the outcomes that the project seeks to achieve, how these outcomes will change the baseline, and what the key **barriers** and **enablers** are to achieving those outcomes?
- 4. Are the project's **objectives** well formulated and justified in relation to this system context? Is there a convincing explanation as to **why this particular project** has been selected in preference to other options, in the light of how the future may unfold?
- 5. How well does the **theory of change** provide an "explicit account of how and why the proposed interventions would achieve their intended outcomes and goal, based on outlining a set of key causal pathways arising from the activities and outputs of the interventions and the assumptions underlying these causal connections".
  - Does the project logic show how the project would ensure that expected outcomes are
     enduring and resilient to possible future changes identified in question 2 above, and to the
     effects of any conflicting policies (see question 9 below).
  - Is the theory of change grounded on a solid scientific foundation, and is it aligned with current scientific knowledge?
  - Does it explicitly consider how any necessary **institutional and behavioral** changes are to be achieved?
  - Does the theory of change diagram convincingly show the overall project logic, including causal pathways and outcomes?
- 6. Are the project **components** (interventions and activities) identified in the theory of change each described in sufficient detail to discern the main thrust and basis (including scientific) of the proposed solutions, how they address the problem, their justification as a robust solution, and the critical assumptions and risks to achieving them?
- 7. How likely is the project to generate global environmental benefits which would not have accrued without the GEF project (additionality)?
- 8. Does the project convincingly identify the relevant **stakeholders**, and their anticipated roles and responsibilities? is there an adequate explanation of how stakeholders will contribute to

the development and implementation of the project, and how they will benefit from the project to ensure enduring global environmental benefits, e.g. through co-benefits?

- 9. Does the description adequately explain:
  - how the project will build on prior investments and complement current investments, both GEF and non-GEF,
  - how the project incorporates **lessons learned** from previous projects in the country and region, and more widely from projects addressing similar issues elsewhere; and
  - how country policies that are contradictory to the intended outcomes of the project (identified in section C) will be addressed (**policy coherence**)?
- 10. How adequate is the project's approach to generating, managing and exchanging knowledge, and how will lessons learned be captured for adaptive management and for the benefit of future projects?

### 11. Innovation and transformation:

- If the project is intended to be **innovative**: to what degree is it innovative, how will this ambition be achieved, how will barriers and enablers be addressed, and how might scaling be achieved?
- If the project is intended to be **transformative**: how well do the project's objectives contribute to transformative change, and are they sufficient to contribute to enduring, transformational change at a sufficient scale to deliver a step improvement in one or more GEBs? Is the proposed logic to achieve the goal credible, addressing necessary changes in institutions, social or cultural norms? Are barriers and enablers to scaling be addressed? And how will enduring scaling be achieved?
- 12. Have **risks** to the project design and implementation been identified appropriately in the risk table in section B, and have suitable mitigation measures been incorporated? (NB: risks to the durability of project outcomes from future changes in drivers should have been reflected in the theory of change and in project design, not in this table.)