

## Consultant for

# Small and Medium Enterprise Data Collection For Identifying Opportunities of Decarbonization

# A. Background

The industrial sector is proliferating in Indonesia. Along with the strong growth of the industry is the increase in greenhouse gas emissions emitted from the sector, from the growing energy consumption, the industrial processes, and the waste. Based on IESR estimation, in the Industry sector itself, energy takes up to 68% of its total emission in 2017. In Indonesia, around 99.2% of 4.3 million manufacturing industries are Small and Medium-sized Enterprises/industries (SMEs¹) (processed from BPS, 2019). The medium and large-scale enterprises only comprised 33577 industries in 2017. Most of the small/micro-scale industries are in the food & beverages, textile, and wood and furniture industry. There are also steel and foundry SMEs which could consume lots of energy in the process. Although the number of SMEs is huge, the data available for this sector is still limited and opportunities for GHG emission reduction from these industries are not yet explored. Therefore, it is important to assess the opportunity for decarbonizing SMEs in Indonesia.

IESR currently works to scope out decarbonization opportunities in the SME sector in Indonesia. IESR would start with mapping SME sectors, understanding each SMEs contribution to the economy and its use of energy. This initial work would be the basis for IESR in building an engagement strategy and providing the relevant capacity building for the stakeholders. In this project, IESR will get support from LBNL (Lawrence Berkeley National Laboratory) for the technical aspect and capacity building part.

Building the baseline data is important and finding key information from primary data gatherings (e.g., surveys, interviews, cooperation with SME actors/associations) are means for completing the baseline data. The SMEs mapping will help to give direction for collecting this information. The scoping work would also map out the opportunity for SMEs that supply the large multinational companies that have committed to the net zero commitment. All the results would support the upcoming work in building a strategy specific for SMEs in adopting the low carbon options as part of their work process.

#### B. The Scope of Tasks

The consultant is expected to support IESR work in collecting and creating baseline data to scope out decarbonization opportunities in SMEs. The baseline data will include the scoping of SME classification and energy usage and regions of SMEs. The objective of SME data collection is to understand the condition of SMEs in Indonesia and their energy use towards decarbonization opportunities.

The overall tasks are as follows:

a. Propose the definition of SMEs and clear classification of SMEs based on the definitions and detailed into sectoral basis (e.g. apparel, ironwork, etc). This may include expert/stakeholder interviews to scope out the definition and classification (e.g. Kementerian Koperasi dan UKM, Kemenparekraf, Kemenperin, associations, etc)

 $<sup>^{1}</sup>$  BPS classify enterprise based on the number of workers. Note that there are also different definition of SMEs



- b. Gather and build database from publicly available data regarding SMEs in Indonesia and SMEs clusters/sectors in Indonesia. The database shall include the following information:
  - i. Economic-related: SMEs category, type, revenue, asset, number of workers, market (domestic, international)
  - ii. Energy-related: total energy consumption, type of fuel consumes, business process activities with high energy consumptions, etc
  - iii. Environment-related: waste, emission, any other relevant information
- c. Propose datasets to be procured to complete the database if necessary (data procurement would be conducted by IESR if relevant)
- d. Provide recommendations of 5 clusters/regions of SMEs for further exploration on decarbonization or specific EE solutions.

## C. Qualifications

- Minimum 1-year experience in research related to the industry
- A Master's degree in environmental science, sustainability, engineering, or business would be beneficial
- Excellent understanding of decarbonization and climate change, especially knowledge of how Indonesia's SMEs contribute to Greenhouse Gas Emissions
- Knowledge of the Indonesia SME sector
- Knowledge of the energy efficiency
- Relevant project experience related to the SME sector in Indonesia

#### D. Duration

Consultant shall work with IESR to complete the study starting from March 2023 until June 2023.

Please indicate how many hours you expected and allocated for this work as well as the proposed/allocated time for consultation for the IESR team. IESR shall consider both the availability and expertise of the consultant's candidate in the selection process.



#### E. Budget Requirement and Proposal

- Budget and CVs will be accepted until 10:00 p.m. Indonesian Western Standard Time (WIB, GMT+0700),
  Sunday, 19 March 2023. Kindly address the energy transformation program manager at deon@iesr.or.id
  and the coordinator in energy efficiency and sustainable building at dwi@iesr.or.id for inquiries. Any
  proposals received after this date and time will be regarded as inadmissible. All proposals must be signed
  by the proposing service provider.
- Evaluation of proposals will be conducted from the submission deadline until 24 March 2023.
- The selection decision for the winning bidder will be made by 27 March 2023.
- Upon notification, the contract negotiation with the winning bidder will begin immediately and must proceed extremely quickly to meet the project timeline.
- Proposals should include the proposed budget, detailed with the number of working hours expected by
  the consultants along with the proposed rate. Negotiation with the consultant candidate will happen
  between 20-24 March focusing on aligning the scope of work as well as the expected man-hours from IESR
  to the consultant to complete the work.
- Costs should be stated as one-time or non-recurring costs. The budget proposed would be in the form of manhours and rated in Indonesian Rupiah.