How to Scale-up Green MSMEs?  
*Exploring financial, institutional, market and policy means*

India’s aim to achieve the Sustainable Development Goals and the targets of Nationally Determined Contributions (NDC) may not be possible if it doesn’t amend the trends of jobless growth and serious concerns of environmental degradation. It is estimated that, in order to streamline the current alarming job situation, India will need to add 15 million new jobs annually, for the next 15 years. (Bhattacharya, A. and Bijapurkar, A., 2017)

MSMEs are a vital part of India’s economy, contributing substantially to job creation and local economic development and potentially to reduce environment degradation. Green MSMEs will therefore be instrumental for achieving SDGs by:

- Enhancing economic development resulting in job creation (SDG 8), poverty eradication (SDG 1)
- Bringing diversity of businesses and risks and thus strengthen resilience of the economy (SDG 8, 13)
- Ensuring environmentally conscious operations and management (SDG 12, 13, 15)

Overall, the MSME sector encompasses 46 million MSMEs, employing 106 million people in India (Ministry of MSMEs, 2014). The sector accounts for 45 percent of the manufacturing output, 95% of the industrial units and 40 percent of exports. The sector provides employment to almost 60 million people. While most of the sector is un-organized (approximately 94 per cent), informal and un-registered, initiatives to have more enterprises registered are well underway.

**State of Green MSMEs in India – Challenges in Scaling up**

Market ecosystem is one of the key barriers to growth and scaling up of green MSMEs. Some common challenges faced by MSMEs include:

- **Limited financing innovations for the needs of green MSMEs:** As per the statistics compiled in the fourth census of MSME sector for registered units (April 2011), only about 11.7 per cent of MSMEs availed finance from institutional sources, and about 1 per cent had taken finance from non-institutional sources. Green MSMEs face further challenge due to non-availability of standard financing frameworks and inadequate capacities of banks to assess green enterprise projects.
- **Capacity and skill gaps:** 85% of innovative small and medium firms see the unavailability of skilled workers as a barrier to innovation, making it one of the foremost challenges in SME innovation. (Pachouri & Sharma, 2016)
- **Inadequate market and technology information:** More than 75% of the innovative small firms, and 86% of the medium firms, face barriers pertaining to technology information and information on markets in India.
The renewable energy sector in the country has seen tremendous growth phase in the last few years. India expanded its solar capacity 8 times from 2.6 GW in 2014 to 20 GW in 2018. The solar market is growing at 9.1% CAGR with heavy investments from domestic and international investors. The energy sector has successfully been able to expand towards the green option from solar power. Substantial push from government through schemes and incentivizing the investments in the solar sector has led to building an enabling market ecosystem for solar industry in India.

Fly ash bricks as an alternate to red bricks in the construction sector are another green alternative. Many state governments, including Bihar, Odisha have promoted use of fly ash in brick production over the use of virgin materials. Government has attempted to incentivize production of fly ash by increasing demand from the public sector itself, including fly-ash bricks in the mandate of public procurement. However, the fly ash bricks sector has not yet flourished as big and swift as the renewable energy sector due to various factors that inhibit growth of fly ash MSMEs. Secure and cheap availability of fly ash, sand and other regulatory factors have led to poor uptake of fly ash bricks industry.

Despite better ROI and lesser payback period, Fly ash units find it difficult to attract investors when compared to another green technology solar power primarily because of absence of public awareness & policy frameworks.

Exploring levers for scaling up green MSMEs

The creation and sustenance of "mutually consistent" and "complimentary interventions" that aid entrepreneurial zeal and creativity keeping in mind planetary boundaries is non-negotiable in the current development paradigm. Despite the crucial role of Green MSMEs in promoting sustainable development, there are limited support systems and functions that nurture the development of green small business in a sustainable manner. This breaks down into exploring the financial, institutional, market and policy means which should work in synchronization eventually encouraging new green ventures and the scaling up of the existing green MSMEs.

Key Questions to be addressed

- What is the scope of green MSMEs in green the large Indian economy?
- What are the perceived risks and/or capacity gaps that prevent formal financing institutions to lend to green MSMEs?
- Learning from existing sector cases, how can policy influence market trends through subsidies and incentives towards scaling up of green MSMEs?