

# DIGITAL GREEN



## “MSEs' Adoption of Digital Technologies for Environmental Sustainability”



Organized by



(ICFAI Foundation for Higher Education)



July 14 & 15,  
2023

Venue

**IBS** | **ICFAI Business School**  
Ahmedabad

## FES India

The Friedrich-Ebert-Stiftung (FES) is a non-profit German foundation committed to the values of democracy and social justice. Widely acknowledged by the German and Indian governments for being an important actor in the promotion of dialogue (people-to-people contacts), FES has been active in India since the late 1970s and established its official country office in 1983 in New Delhi.

## Centre of Excellence for Digital Transformation (CeDT)

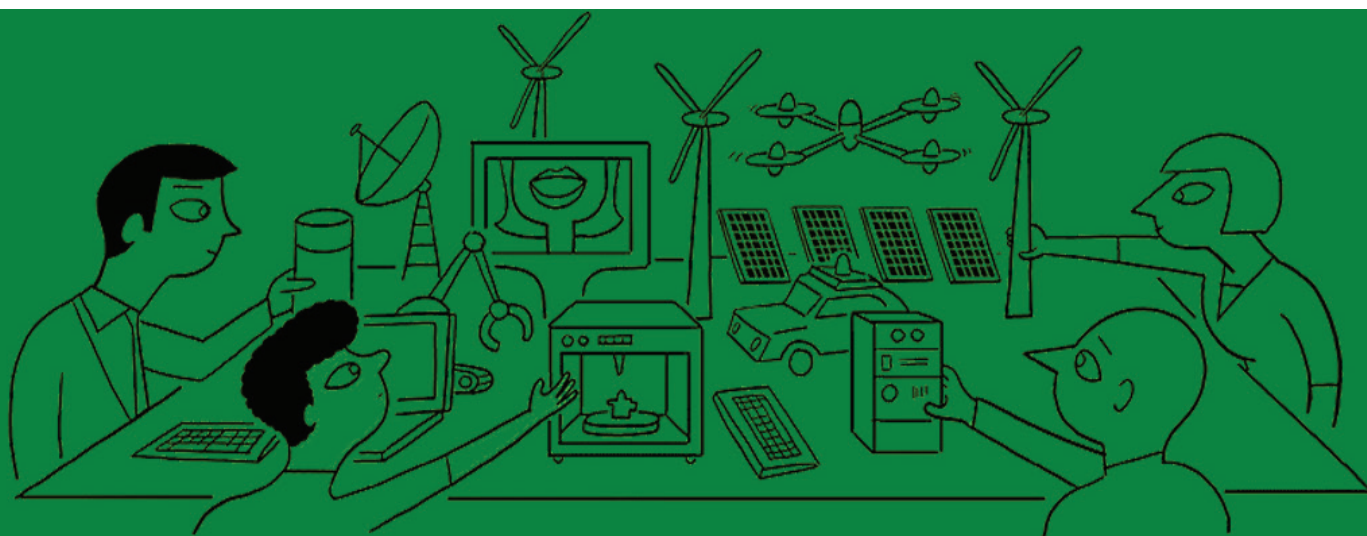
The Centre of Excellence for Digital Transformation (CeDT) at the IFHE has been established with an agenda of leveraging information and communication technologies for the benefit of the underserved.

We at CeDT believe that constructive interactions between actors in an ecosystem shape various aspects of business and social practices and technology. Thus, continuous engagement with crucial human and non-human stakeholders across industry, academia, and society to advance our agenda is the guiding principle of the center.

The activities through which we plan to engage with key stakeholders include research, consultancy, training/teaching, and outreach. The tools that we plan to use for the activities as mentioned above include experiments (both field and laboratory), surveys, digital gap analysis, content creation, and curriculum design.

## I. Introduction

- 1.1. In collaboration with the Friedrich-Ebert-Stiftung (FES) India Office, the Centre of Excellence in Digital Transformation (CeDT) at IFHE Hyderabad is embarking on an action research project to promote digital technologies in micro and small enterprises (MSEs) to facilitate the transition towards sustainable and green production processes. MSEs play a vital role in India's economy. By leveraging digital technologies, MSEs can improve resource efficiency, reduce waste, and contribute to a greener and more sustainable future. "Digital Green" aims to create awareness among MSEs about the potential benefits of adopting sustainable practices and provide them with the necessary knowledge and resources to implement digital solutions.
- 1.2. **Digital Transformation-** The advent of Information Communication Technologies (ICT) has impacted the world around us in a big way. As a result, digital transformation is an integral part of the discourse around transforming enterprises, both informal and formal. Digital Transformation "encompasses the profound changes in society and industries through digital technologies" (Vial, G., 2021).
- 1.3. **Digital Transformation and Enterprises-** DT brings many significant benefits to firms. Transaction costs are reduced by providing better and quicker access to information and communication between staff, suppliers, and networks. It can help micro and small enterprises by providing access to resources, including finance (e.g., peer-to-peer lending), training, and recruitment channels, including government services, which are increasingly available online (OECD, 2021). Therefore, studying the Micro and Small Enterprises (MSE) sector is important.
- 1.4. **Micro and Small Enterprises (MSEs)-** The Ministry of Micro, Small and Medium Enterprises, Government of India, classifies a company with an investment in Plant and Machinery or Equipment of not more than Rs. 1 Crore and an annual turnover of not more than Rs. 5 Crore as "Micro" and a company with an investment in Plant and Machinery or Equipment of not more than Rs. 10 Crore and an annual turnover of not more than Rs. 50 Crore as "Small" (Ministry of Micro, Small and Medium Enterprises). The Micro Enterprises sector includes 630.5 lakh enterprises, accounting for over 99% of the country's total number of MSMEs. The Small Enterprises sector includes 3.3 lakh enterprises which are 0.5% of total MSMEs. Micro, Small, and Medium Enterprises- According to a World Trade Organization report, micro, small, and medium-sized enterprises (MSMEs) are aware of climate change. They know they need to adopt decarbonization practices to participate in supply chains. Still, they face obstacles, especially in accessing information about the changes to be made in their businesses and the cost of change. This report also included a finding which suggested that "A larger share of female respondents (20 percent) than of male respondents (15 percent) needed more information before making a climate-related change to their business practices."
- 1.5. **Sustainability Focus-** The Ministry of Micro, Small and Medium Enterprises (MSME), Government of India (GoI) has adopted the Cluster Development approach as a key strategy for enhancing the productivity and competitiveness as



well as capacity building of Micro and Small Enterprises (MSEs) and their collectives in the country. Promoting green & sustainable manufacturing technology for the clusters to enable units to switch to sustainable and green production processes and products is also imperative. This project will focus on clusters with a view to green and sustainable manufacturing technologies.

1.6. **Relevant SDG Targets** related to Micro and Small Enterprises (MSEs) correspond to

- **SDG Goal 3** - Ensure healthy lives and promote well-being for all ages
- **SDG Goal 5** - Achieve gender equality and empower all women and girls
- **SDG 8.3** - Promote development-oriented policies that support productive activities, decent job creation, entrepreneurship, creativity, and innovation, and encourage formalization and growth of micro-, small- and medium-sized enterprises through access to financial services
- **SDG Goal 9** - Build resilient infrastructure, promote inclusive and sustainable industrialization, and foster innovation
- **SDG 10.2** - By 2030, empower and promote the social, economic, and political inclusion of all, irrespective of age, sex, disability, race, ethnicity, origin, religion, or economic status
- **SDG Goal 11** - Make cities and human settlements inclusive, safe, resilient, and sustainable
- **SDG Goal 12** - Ensure sustainable consumption and production patterns
- **SDG Goal 13** - Take urgent action to combat climate change and its impacts

## 2. Digital Green and MSE Ecosystem - Key Takeaways

- 2.1. This project presents an excellent opportunity for multiple stakeholders in the MSME ecosystem to contribute their knowledge, skills, and enthusiasm to drive positive change in the Indian business landscape.
- 2.2. Digital Green envisages engaging with key stakeholders (including MSE entrepreneurs, government agencies, technology providers, sustainability experts, researchers, policymakers, INGOs, and Indian NGOs, to gather diverse perspectives and insight), organizing roundtables, documenting best practices, and generating awareness through social media campaigns.
- 2.3. The team will conduct comprehensive research on the current state of MSEs in India, including their adoption of digital technologies and environmental sustainability practices. This research will be a foundation for identifying opportunities and challenges in implementing sustainable and green production processes.
- 2.4. We intend to document best practices and success stories from MSEs that have already adopted sustainable and green production processes with the help of digital technologies. These case studies will serve as valuable references for other MSEs and contribute to building a repository of practical solutions.
- 2.5. We wish to develop a deep understanding of the interface between digital transformation and environmental sustainability within the context of MSEs. This knowledge will be precious as sustainability practices continue gaining prominence in business.

## 3. Why should you participate?

- 3.1. **Enhanced understanding and Practical insights:** Participants will gain a deeper understanding of the interface of digital technologies and environmental sustainability in the MSE sector, allowing them to contribute to future research, projects, and initiatives in this field. This would give stakeholders practical insights into the challenges and opportunities associated with MSEs adopting digital technologies for sustainability practices.
- 3.2. **Networking opportunities:** The Digital Green project will facilitate meaningful interactions and collaborations among stakeholders, including business school faculty members, students, MSE entrepreneurs, government agencies, technology providers, NGOs, researchers, sustainability experts, and policymakers. These connections can lead to future partnerships and collaborative projects.
- 3.3. **Knowledge sharing:** The findings, best practices, and case studies generated through the Digital Green initiative will be shared within the MSME ecosystem, fostering a culture of sustainability and digital transformation. This knowledge sharing will enable stakeholders to contribute to the broader discourse on sustainable business practices.

## Process

*Following activities are proposed:*

- a. **Review of studies** on the digital transformation of the MSEs in general and specifically in the context of climate change imperative.
- b. **Regional Consultations:** We will use multiple case study designs to identify the challenges and opportunities for the digital transformation of MSEs vis-a-vis climate change challenges. We propose to hold four 2-day regional consultations in multiple MSEs clusters:
  1. Regional Consultation hosted by IBS Gurgaon
  2. Automobile Ancillaries hosted by IBS Pune
  3. Garments hosted by IBS Bengaluru
  4. Food Processing hosted by IBS Ahmedabad
- c. **National Consultation at IFHE Hyderabad:** After a review of existing initiatives and regional consultations, we would develop a framework for evaluating the various digital transformation initiatives. This may also lead to developing a toolkit for the digital transformation of MSEs, including possible training workshops.

## Program Schedule for Regional Consultations

July 14, 2023

Time	Program
NOON	<b>Arrival of Participants and Registrations</b> Short Exhibition of the Digital Transformation initiatives in the region
<b>1300 - 1400 Hrs</b>	<b>Lunch</b>
1400 - 1415	<b>Welcome and Introduction</b> A short introduction to FES and its Economy of Tomorrow project by <b>Mandvi Kulshreshtha</b> , Program Adviser, FES
1415 - 1430	Introduction of the Participants
1430 - 1445	<b>What is CeDT?</b> A short Introduction for the Audience by <b>Sanjay Fuloria</b>
1445 - 1500	<b>Why Digital Green?</b> by Project Team
1500 - 1530	<b>Methodology of the Project</b> Introduction to the Program for the Regional Consultation by <b>Nishant Agrawal</b> Introduction to the Methodology for the Digital Green by <b>Shailendra Singh Bisht</b>
<b>1530 - 1600</b>	<b>Tea / Coffee Break</b>
1600 - 1800	<b>Open Space Dialogue</b> A fishbowl conversation used as open space dialogue will be played out in this session. The idea is to have an open dialogue and develop an understanding of the terms used in digital transformation. Two main components: <ul style="list-style-type: none"> <li>Experiences from the leadership/entrepreneurs in MSEs.</li> <li>Solutions from digital transformation and climate change imperative</li> </ul>

July 15, 2023

Time	Program
0900 - 1100	<b>Focused Group Discussion</b> The participants will be divided into multiple groups. A research team member will host each group. The participants will be asked to share information from their digital transformation journey to be documented as a case study under the project. These sessions will be audio-recorded
<b>1100 - 1130</b>	<b>Tea / Coffee break</b>
1130 - 1300	Focused Group Discussion continued
1300 - 1400	Lunch Break and departure of participants
1400 - 1530	<b>In-depth Interviews</b> The research team will conduct a personalized, in-depth interview with the selected participants to extract more information about their digital transformation journey.
<b>1530 - 1600</b>	<b>Tea / Coffee break</b>
1600 - 1800	In-depth interviews continued

RSVP

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