

Vol. XIV | September 2024

# ॥ सुखिनो भवन्तु ॥

(A Monthly Newsletter of Sustainability Standards Board)



**The Institute of Cost Accountants of India**

(Statutory body under an Act of Parliament)

[www.icmai.in](http://www.icmai.in)

*Behind every successful business decision, there is always a **CMA***

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## Sustainability Standards Board

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CMA T.C.A. Srinivasa Prasad  
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### Secretary to the Board

CMA Dibbendu Roy

*\*Details awaited*



## Message From Chairman, SSB

*"The activist is not the man who says the river is dirty. The activist is the man who cleans up the river" –Ross Perot*

On September 16<sup>th</sup> of every year, we observe International Day for the preservation of the Ozone layer. The observance is of immense relevance and if we practice the same on our day to day life, we are extending the life of earth so that many more future generations can come, live and enjoy in this earth. It is not only the mankind, but also the other species and plants which are going to be benefitted by the dedicated efforts of human. So let us all, on the occasion of International Day for the preservation of the Ozone layer, take a pledge to protect the nature and earth, by way of which we can safeguard the ozone layer. The festive months have come and our country will witness various festivals till the year end. While we enjoy and actively involve, it is also our responsibility to take care of our nature.

It is a matter of great pride for me for having a new and dedicated members in the Sustainability Standards Board. On September 21, 2024, the Board had its first meeting in Pune. I was indeed thrilled to chair the meeting which was bubbling with novel ideas. The ideas were highly realistic, well timed and implementable. It is a matter of sheer delight to inform you that the Board has approved for the commencement for "Best Article Award" for the articles featured in *Sukhinobhavantu* newsletter. This award will be given annually. SSB will soon start the process and declare the results of Best Article Award. Further, I am confident that the decisions taken in the meeting will be implemented on real time basis with the support of members of the Board and the effective implementation initiatives by the officers of SSB. I must thank the Central Council Members who are part of SSB, for extending their whole hearted support in implementation of new initiatives of the Board.

I hope all the readers and viewers, particularly the members of ICMAI are getting immense benefits through the *Sukhinobhavantu* newsletters and *Vasudhaiva Kutumbakam* webinar series. SSB is trying its best to provide you with all the timely updates in the area of Sustainability. Your views and suggestions will help us to do better.

The enrolment for the 2<sup>nd</sup> Batch of our ESG course is in full swing and the admission will be closed shortly. Those who are keen to take the admission may make use of this opportunity.

Since I have to rush my page to the designer to cope-up with the publishing timelines, I have not touched upon some of the areas, which I will speak in the ensuing issue. However, I look forward to your views and expectations to make the initiatives better and more meaningful.

Professionally Yours,

**CMA (Dr.) Ashish P Thatte**

September 25, 2024

# The Group of Twenty (G20)

## Part IV

**CMA (Dr.) Aditi Dasgupta**  
Joint Director, ICMAI  
Kolkata

In the previous issue we discussed about the summit information on G20 2015, 2016, 2017 and 2018 summits. In this issue we have concluded this series by highlighting the summit information on G20 2019, 2020, 2021, 2022 and 2023.



The 2019 G20 Summit, held in Osaka, Japan, focused on eight key themes: the global economy, trade and investment, innovation, environment and

energy, employment, women's empowerment, development, and health. The event was notable for efforts to ease trade tensions, particularly between the U.S. and China, and for addressing issues related to climate change and digital data governance. Japan, hosting the summit for the first time, played a leading role in navigating discussions on global economic growth, trade reform, and environmental challenges. The summit also reaffirmed the commitment to multilateralism and global cooperation, with calls to strengthen institutions like the WTO and the United Nations.

One of the primary highlights was the temporary pause in the U.S.-China trade war, as both nations agreed to resume talks and avoid new tariffs, offering some relief to global markets. Climate change discussions saw a divide, with 19 nations supporting the Paris Agreement and the U.S. maintaining its withdrawal. Leaders also discussed sustainability, reducing plastic waste, and promoting innovation through the "Osaka Track," which aimed to enhance cross-border data flows while addressing privacy and security concerns.

In addition to trade and environmental issues, the summit addressed tensions in the Middle East, particularly regarding U.S.-Iran relations and

oil security. The importance of gender equality was also emphasized, with commitments to reduce the gender pay gap and increase women's participation in the workforce. Bilateral meetings, including those between Russia and Saudi Arabia, and the U.S. and India, added further weight to the summit's outcomes.



The 2020 G20 Summit, hosted virtually by Saudi Arabia due to the COVID-19 pandemic, focused heavily on global efforts to combat the

pandemic and its economic impacts. Leaders from the world's largest economies pledged to ensure fair distribution of vaccines, treatments, and diagnostics for COVID-19, acknowledging the need for collective efforts to overcome the health crisis. The economic recovery from the pandemic was a central theme, with discussions on the importance of continued fiscal and monetary support to mitigate the economic damage caused by the virus.

Climate change remained a key topic, with most G20 nations reaffirming their commitments to the Paris Agreement, despite the U.S.'s continued withdrawal under President Trump. The leaders discussed the need for sustainable economic recovery plans that also addressed environmental concerns, with a particular focus on transitioning towards greener energy sources and achieving carbon neutrality.



The 2021 G20 Summit, held in Rome, Italy, focused on several critical global issues, including the COVID-19 pandemic, economic recovery, climate

change, and global tax reform. One of the major outcomes was the leaders' commitment to ensure equitable access to COVID-19 vaccines, with a pledge to vaccinate 70% of the global population by mid-2022. They also highlighted the importance of strengthening global health systems to prevent future pandemics.

Economic recovery was another key theme, with leaders discussing ways to achieve a more inclusive and sustainable global rebound from the pandemic. The summit saw broad support for continued fiscal and monetary policies to stimulate growth, with special attention to the needs of low-income countries. The G20 endorsed the Organization for Economic Cooperation and Development's (OECD) global tax reform plan, which included a minimum global corporate tax rate of 15%, aiming to curb tax avoidance by multinational corporations.

Climate change was a central issue, with the G20 reaffirming their commitment to the Paris Agreement and pledging to pursue efforts to limit global warming to 1.5 degrees Celsius. Leaders agreed to work towards achieving carbon neutrality by mid-century and committed to stop financing new coal-fired power plants abroad by the end of 2021.

Other discussions included the importance of multilateral cooperation in addressing global challenges, advancing digital transformation, and promoting gender equality. Despite some disagreements on specific targets, particularly regarding climate goals, the summit underscored the necessity of coordinated action on global health, economic recovery, and sustainability.



The 2022 G20 Summit, held in Bali, Indonesia, centered around key global challenges including the ongoing impacts of the COVID-19 pandemic, geopolitical tensions, economic recovery, food and energy security, and climate action. One of the dominant themes was the global economic impact of Russia's invasion of Ukraine, which sparked significant debates among G20 members. While

the summit did not reach a full consensus on condemning Russia, a majority of countries expressed concerns over the war's impact on global food and energy markets.

Economic recovery from the pandemic remained a priority, with discussions on strategies for sustainable growth and resilience against future shocks. Leaders emphasized the importance of digital transformation in boosting economies and enhancing global infrastructure. They also recognized the growing threats to food and energy security, aggravated by geopolitical conflicts and supply chain disruptions, and committed to coordinated efforts to stabilize global markets.

Climate change was a critical focus, with leaders reiterating commitments to the Paris Agreement and recognizing the urgency of achieving net-zero emissions. The G20 committed to accelerating efforts to limit global temperature rises to 1.5 degrees Celsius and pledged to phase down coal power. The summit also saw discussions on green energy transitions and the financing needed for developing countries to achieve climate goals.

In addition, the leaders addressed issues of global health architecture, aiming to strengthen international systems to respond more effectively to future pandemics. There was also emphasis on the need for multilateral cooperation in resolving global crises, advancing economic stability, and fostering inclusive growth. Despite geopolitical tensions, the summit underscored the need for collaboration on critical global challenges.



The 2023 G20 Summit, held in New Delhi, India, focused on global challenges such as economic instability, geopolitical tensions, climate change, and digital transformation. One of the major outcomes was the inclusion of the African Union as a permanent member of the G20, reflecting a push for more inclusive global governance.

The summit addressed global economic concerns, particularly inflation, debt crises in developing nations, and the need for more resilient supply chains. Leaders emphasized



sustainable development and committed to reforms of international financial institutions to better support vulnerable economies.


Geopolitical tensions, especially related to the Ukraine war, featured prominently. While the final communiqué avoided directly condemning Russia, it stressed the importance of respecting territorial integrity and peaceful conflict resolution.

The African Union joined the G20 as a permanent member, the first since the G20's formation in 1999. A new organization called the Global Biofuel Alliance (GBA) was launched, to promote the development and adoption of sustainable biofuels, and set relevant standards and certification. The New Delhi Leaders Declaration was adopted with consensus.

Climate action was a significant focus, with G20 members agreeing to triple renewable energy capacity by 2030 and reaffirming their commitment to limiting global temperature

rises to 1.5 degrees Celsius. However, there was no consensus on a complete phase-out of fossil fuels, which remained a contentious issue.

Digital public infrastructure and technological innovation were highlighted as crucial drivers of future growth. The summit discussed the need for equitable global digital governance, including data privacy, cybersecurity, and digital inclusion for developing nations.

The 2023 G20 Summit also placed strong emphasis on gender equality, health, and education, with commitments to enhance women's participation in the workforce and improve global health systems. Despite differing views on several issues, the summit underscored multilateral cooperation as essential in addressing complex global challenges. 

Source:

[www.g20.in](http://www.g20.in)

# Sustainability – A Global Outlook

## 1. Global investors push for stronger climate policies ahead of COP29, urging governments to unlock \$29 trillion for net-zero transition

More than 530 financial institutions, managing over \$29 trillion in assets, are pressuring governments worldwide to take decisive action on the climate crisis. In a joint statement ahead of COP29, investors call for policies that will accelerate the transition to a net-zero, climate-resilient economy, including mandatory climate-related reporting and decarbonization strategies for high-emitting sectors.

[Read More.....](#) 

## 2. GHG emissions have decreased by 32.55% since 1990 despite the economy growing by 67%

The 2024 State of the Energy Union report highlights the EU's significant progress in ensuring secure, competitive, and affordable energy, while also laying the groundwork for future economic growth and competitiveness. The report reflects the EU's success in overcoming energy security challenges, reducing reliance on Russian gas, and accelerating the clean energy transition.

[Read More.....](#) 

## 3. Apple reduces New iPhone 16's carbon footprint by 30%

Apple continues its drive toward sustainability with the release of the iPhone 16 and iPhone 16 Plus, reducing their carbon

footprint by 30% compared to earlier models. This milestone aligns with Apple's 2030 goal of carbon neutrality. They have reduced emissions for iPhone 16 Plus by 30 percent compared to business-as-usual scenarios, as per their Product Environmental Report.

[Read More.....](#) 

## 4. Ursula von der Leyen names New EU Commission team focused on climate action, security, competitiveness

European Commission President Ursula von der Leyen has revealed the team that will lead the EU's most powerful institution for the next five years, with a clear focus on addressing climate change, geopolitical challenges from the war in Ukraine, and rising competition from China.

[Read More.....](#) 

## 5. 94% of investors use ESG ratings monthly amid limited studies and growing regulatory attention

With 94% of investors relying on ESG ratings at least once a month, the influence of these tools in financial markets has surged. Despite this, the data's integrity and the consistency of these ratings are under scrutiny. As governments start rolling out voluntary codes and regulations, CDP is tracking and advising policymakers on how to maximize impact while preventing fragmentation in the system.

[Read More.....](#) 



### 6. **Australia to mandate climate reporting starting January 01, 2025**

Climate reporting begins on January 1, 2025, with a phased approach for entities based on size and reporting structure. Entities must assess both a 1.5-degree and catastrophic global warming scenario. Large entities report first, with Group 1 starting in 2025, followed by Group 2 and Group 3.

[Read More.....](#) 

### 7. **Deloitte launches Deloitte Academies to upskill workforces in AI, sustainability, and innovation**

Deloitte has launched Deloitte Academies, an initiative designed to equip organizations with critical skills for future success, focusing on areas like AI, sustainability, and leadership development. As businesses face rapid changes, Deloitte is committed to providing learning experiences that address modern workforce challenges.

[Read More.....](#) 

### 8. **UN Supports Tajikistan's launch of green bond market to fund climate goals**

The United Nations is collaborating with the Government of Tajikistan to develop a green bond market, aiming to enhance sustainable finance in the country. The UN Economic and Social Commission for Asia and the Pacific (ESCAP), the UN Resident Coordinator Office (RCO), and the Agency for Securities Market Development and

Special Registration of Tajikistan have joined forces with the Luxembourg Green Exchange to provide specialized training on thematic bond issuance.

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### 9. **Thomson Reuters partners with sap to simplify esg reporting compliance**

Thomson Reuters (TSX/NYSE: TRI) has partnered with SAP to launch a product integration that simplifies Environmental, Social, and Governance (ESG) reporting for global businesses. This integration combines Thomson Reuters ONESOURCE Statutory Reporting with SAP Sustainability Control Tower, offering customers a seamless, unified platform for ESG data preparation and reporting.

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### 10. **FCA grants temporary flexibility for sustainable fund naming rules**

The UK Financial Conduct Authority (FCA) has extended the deadline for sustainable fund marketing rules to April 2025. This extension applies to the "naming and marketing" rules designed to curb greenwashing. Funds must still submit applications to comply with the Sustainability Disclosure Requirements (SDR) by October 1, 2024, but now have additional time to make name changes and ensure marketing compliance.

[Read More.....](#) 

# Sustainability – Indian Context

## 1. Hero Future Energies to invest \$20 billion in renewable expansion by 2030

Hero Future Energies, a unit of the Hero Group, is set to invest \$20 billion over the next six years to expand its renewable energy capacity nearly 16-fold. This ambitious plan aligns with India's national goal of achieving at least 500 GW of clean energy by 2030, as the country works to reduce carbon emissions. Hero Future Energies, which is backed by global investors KKR and International Finance Corporation (IFC), plans to fund this growth through internal resources as well as a mix of debt and equity.

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## 2. India's Tata Power to invest up to \$9 billion to expand renewable energy capacity

Tata Power has unveiled an ambitious plan to invest approximately 700-750 billion rupees (\$8.95 billion) over the next five to six years to ramp up its renewable energy capacity. The company is committed to adding 15 gigawatts (GW) of renewable energy by 2030, underscoring its dedication to India's green energy transition.

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## 3. Reliance, Adani, and financial firms pledge \$386 billion to help INDIA achieve 500 GW of clean energy by 2030

India's push toward clean energy just received a major boost, with \$386 billion in funding commitments to help reach its target of 500 gigawatts (GW) of renewable energy by 2030. Key industry players, including Reliance Industries and Adani Green Energy, have pledged to significantly expand their renewable energy capacities.

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## 4. India's largest wind energy project to power 3 million homes

India has unveiled its largest wind energy project, which will power 3 million households. The 1,166-megawatt (MW) initiative is a collaboration between government-owned NTPC Green Energy Limited (NGEL) and Suzlon Group, marking a significant step in the country's renewable energy expansion.

[Read More.....](#) 

## 5. Mercedes-Benz expands sustainability efforts in india with new centers for climate innovation and charging infrastructure

Mercedes-Benz Research and Development India (MBRDI) has broadened its Sustainability Garage initiative, an effort aimed at promoting sustainable mobility and environmental innovation. This expansion includes the establishment of two new Centres of Excellence in Hyderabad and New Delhi, underscoring Mercedes-Benz's dedication to fostering a sustainable future.

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## 6. India's bioeconomy to triple to \$300 billion by 2030 under new bioE3 policy for sustainable growth

India is on a path to significantly expand its bioeconomy, with projections indicating growth from \$130 billion in 2024 to \$300 billion by 2030. This expansion is driven by the newly introduced Biotechnology for Economy, Employment and Environment (BioE3) policy, which aims to position India as a leader in sustainable development and bio-based industries.

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### 7. India targets zero-emission trucks by 2050 with 30 policy interventions to accelerate electrification

India is making a bold move toward environmental sustainability with the “Indian Zero Emission Trucking Policy Advisory,” aiming to transition entirely to zero-emission trucks (ZETs) by 2050. The government’s Office of the Principal Scientific Advisor highlighted the urgency of this shift, with projections estimating 17 million trucks on India’s roads by mid-century. This growth in freight transport poses a serious threat to the environment. To achieve India’s Net Zero target by 2070, it is essential to complete the transition to zero-emission trucks by 2050.

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### 8. India proposes expansion of sustainable finance framework in securities market

India’s Securities and Exchange Board (SEBI) is set to broaden the sustainable finance landscape in its securities market, aiming to incorporate new ESG-labeled instruments. The proposed framework, which includes the introduction of sustainable securitized debt instruments or “green securitization,” would significantly diversify the range of

investment products available for raising sustainable finance.

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### 9. ESG-compliant risk assessment in focus for HDFC Bank

HDFC Bank has implemented ESG-based risk assessment for wholesale banking loans to promote sustainable finance. Loans exceeding Rs 100 crore undergo detailed environmental and social assessments. The bank aims to increase income for marginal farmers and become climate-neutral by 2032, while also raising green deposits aligned with RBI guidelines.

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### 10. Morgan Stanley quietly walks away from plastics financing goal

Morgan Stanley will no longer track financing activities related to plastic waste as a standalone goal but will continue working with clients and partners on sustainable finance solutions, aiming to mobilize \$1 trillion by 2030.

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# Brochure on Certificate Course on ESG (Batch No. 2)

CERTIFICATE COURSE

## CERTIFICATE COURSE ON ESG



*Brochure*

### Sustainability Standards Board



## ICMA THE INSTITUTE OF COST ACCOUNTANTS OF INDIA

Statutory Body under an Act of Parliament  
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### About The Institute

The Institute of Cost Accountants of India (ICMAI) is a statutory body set up under an Act of Parliament in the year 1959. The Institute as a part of its obligation, regulates the profession of Cost and Management Accountancy, enrolls students for its courses, provides coaching facilities to the students, organizes professional development programmes for the members and undertakes research programmes in the field of Cost and Management Accountancy. The Institute pursues the vision of cost competitiveness, cost management, efficient use of resources and structured approach to cost accounting as the key drivers of the profession. In today's world, the profession of conventional accounting and auditing has taken a back seat and cost and management accountants increasingly contributing towards the management of scarce resources like funds, land and apply strategic decisions. This has opened up further scope and tremendous opportunities for cost accountants in India and abroad.

### International Affiliation

The Institute is a founder member of International Federation of Accountants (IFAC), Confederation of Asian and Pacific Accountants (CAPA) and South Asian Federation of Accountants (SAFA). The Institute is also an Associate Member of ASEAN Federation of Accountants (AFA) and member in the Council of International Integrated Reporting Council (IIRC), UK.

### Institute's Network

Institute's headquarters is situated at Kolkata with another office at New Delhi. The Institute operates through four Regional Councils at Kolkata, Chennai, Delhi and Mumbai as well as through 117 Chapters situated in India, 11 Overseas Centres abroad, 2 Centres of Excellence, 61 CMA Support Centres and 401 Recognized Oral Coaching Centres.

### Institute's Strength

The Institute is the largest Cost & Management Accounting body in the World, having a large base of about 1,00,000 CMAs either in practice or in employment and around 5,00,000 students pursuing the CMA Course.

### Vision Statement

"The Institute of Cost Accountants of India would be the preferred source of resources and professionals for the financial leadership of enterprises globally."

### Mission Statement

"The Cost and Management Accountant professionals would ethically drive enterprises globally by creating value to stakeholders in the socio-economic context through competencies drawn from the integration of strategy, management and accounting."

### Course Objective

- ▲ To build strategies and effectively integrate sustainability matters into all business practices dealing with the strategy, finance, operations and communications.
- ▲ To comprehend and assimilate the rules and regulations and structural framework of Business Responsibility and Sustainability Reporting.
- ▲ To understand and analyze the various disclosures made by the Indian companies and various assurance aspects.
- ▲ To understand and comprehend the best practices adopted in ESG.
- ▲ To build an understanding for preparation of Business Responsibility and Sustainability Report.
- ▲ To understand the value chain partners and their role in the business proposition.
- ▲ To properly map Business Responsibility and Sustainability Report to Global Reporting Initiative (GRI) and Integrated Reporting Framework.

### Course Eligibility

- ▲ FCMA/ACMA/ those who have qualified Final CMA examination
- ▲ Final year Students of the CMA course
- ▲ Any Graduate

(Minimum Intake is 25 numbers to start a batch)

### Course Duration

- ▲ Classroom learning of 2 hours per day in the Weekend through online mode
- ▲ 50 hours online coaching

### Online Examination for 100 marks

- ▲ Multiple Choice Questions – 70 questions, 1 mark each
- ▲ Case Study (also multiple choice) – 5 questions, 2 marks each
- ▲ Project Report – online submission – 20 marks

Minimum Marks is 60 % in each of the all above levels

### Course Fees

- ▲ Course Fees (including learning kit) of Rs. 6000 plus GST of 18 %.
- ▲ Final year Students of the CMA course for an amount of Rs. 4500 plus GST of 18 %.
- ▲ Examination Fees of Rs. 750 plus GST per attempt.

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## Syllabus of the ESG Course

| Session No. | Particulars  | Module Duration |
|-------------|--|-----------------|
| 1           | <p><b>Shareholders to stakeholders</b><br/>Shifting emphasis from shareholders to Stakeholders<br/>Corporate Social Responsibility (CSR)<br/>The Three Ps – People, Planet and Profits<br/>Connecting sustainability to Strategy and Corporate Governance</p> <p><b>ESG – the pathway to Sustainability</b><br/>Introduction<br/>Conceptual framework<br/>Material ESG Issues<br/>Concept of ESG Maturity<br/>Challenges in implementing ESG</p>   | 3 hours         |
| 2           | <p><b>Importance of Economics, Environment, Social and Governance (E+ESG) in Sustainability</b><br/><b>UN Mandated Sustainable Development goals (SDGs)</b><br/>17 SDGs<br/>Where are we in SDGs – Globally and in India<br/>Reconciling priorities of SDGs – in India and Globally</p>  | 5 hours         |
| 3           | <p><b>Issues with respect to Environmental Factors</b><br/><b>COP 26 and 27 – Outcome</b><br/>Climate Change – Risk Mitigation and Adaptation<br/>Pressures arising out of depletion of natural resources, bio-diversity loss, land use and marine resources, <b>Waste Disposal, Carbon Emission, Conservation of Energy</b><br/><b>Overview of TCFD and CSRD Reporting, Sustainability and Integrated Reporting – how it incorporates environmental factors</b></p> <p>Approaches to Environmental Analysis – Differences in approaches of developing, emerging and developed economies<br/>Circular Economy<br/>Clean and technological innovation<br/>Green / ESG related products<br/>Blue Economy<br/><b>Overview of Environmental Laws in India</b></p>                | 5 hours         |
| 4           | <p><b>Product Life Cycle, Service Life Cycle and Life Cycle Assessment</b></p>   | 2 hours         |
| 5           | <p><b>Overview of Laws relating to social security and Human rights</b><br/>Labour-Employer relationship<br/>Training &amp; Development<br/>Occupational Health &amp; Safety<br/>Community Development &amp; Public Policy</p>   | 3 hours         |
| 6           | <p><b>ESG Investments, Different ESG Instruments, Ratings, Due Diligence and Assurance</b><br/><b>Approaches to ESG Investments</b><br/>Responsible Investment, Socially Responsible Investment (SRI), Sustainable Investment, Best in Class Investment, Thematic Investment, Impact Investment, Green Investment etc.</p> <p><b>Investing in ESG through Different Instruments</b><br/>Equity-Based Instruments, ESG &amp; Fixed Income Instruments, Derivative &amp; Alternative Instruments<br/><b>ESG Ratings</b> – How conceptually different from Credit Ratings, Regulatory Ratings and Investor driven ratings<br/><b>ESG Assurance</b> – External Assurance and Internal Audit / Assurance<br/><b>ESG Due Diligence</b><br/><b>ESG Risk &amp; Opportunities</b></p> | 5 hours         |

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CERTIFICATE COURSE



Certificate Course on ESG | The Institute of Cost Accountants of India



### Syllabus of the ESG Course

| Session No. | Particulars  | Module Duration |
|-------------|--|-----------------|
| 7           | <b>KPIs with specific reference to ESG – How ESG compliance creates long-term value for the organization</b>   | 4 hours         |
| 8           | <b>ESG and Capital markets</b><br>Evolution of regulations<br>National voluntary guidelines<br>- BRR regime<br>- NGRBC guidelines<br>- Current BRSR regime<br><br><b>Overview of global reporting framework (GRI, IIRC framework)</b><br>SEBI consultative paper on ESG Ratings, Disclosure and reporting<br>ESG Ratings<br>SEBI consultative paper on ESG Ratings                 | 3 hours         |
| 9           | <b>Detailed coverage of BRSR</b><br>3 sections<br>9 principles<br>Essential Indicators and Leadership Indicators<br>Presentation / coverage on the detailed requirements of disclosure in the reporting<br>Guidance Note Issued by SEBI<br>Identification of data points in the BRSR report and discussion on the same.<br>Case studies and practical aspects with respect to BRSR | 9 hours         |
| 10          | <b>Concept of ESG Audit and opportunities</b><br>how it is related with building up of corporate attitudes towards development of the society  | 1 hour          |
|             | <b>Project Work</b>  | 10 hours        |
|             | <b>Total</b>   | 50 hours        |

Contact for further queries

#### Course Coordinators

CMA Dibbendu Roy, Additional Director and Secretary, SSB at [ssb@icmai.in](mailto:ssb@icmai.in), Mobile No. 9643443047  
CMA (Dr.) Aditi Dasgupta, Joint Director at [ssb.newsletters@icmai.in](mailto:ssb.newsletters@icmai.in), Mobile No. 9831004666

## Sustainability Standards Board



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**THE INSTITUTE OF**  
**COST ACCOUNTANTS OF INDIA**

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# Green Jobs and CMAs

**CMA Arunabha Saha**  
Practicing Cost Accountant  
Thane

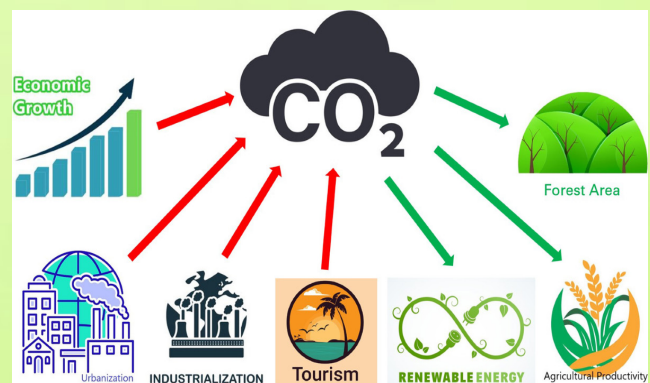
Green jobs are becoming more important in fighting climate change and promoting sustainability. The demand for these jobs is growing across many sectors as regulators focus more on reducing carbon footprints. This article looks at the role of Cost and Management Accountants (CMAs) in this transition, stressing the importance of environmental management accounting in driving green initiatives. It also highlights how CMAs can help future generations to pursue opportunities in green jobs to build a sustainable future.

A green job is one that contributes to the preservation or restoration of the environment, promoting sustainability, and reduces the negative impacts of economic activities on the planet. Green Jobs (GJ) are highly required to fight against climate change and to establish sustainability. In this contemporary world, the economy is shifting towards decarbonisation and the importance of GJ is growing. In this issue, we will discuss GJ from an overall perspective, and in subsequent discussions, we will explore them sector by sector, such as manufacturing, energy, design, agriculture, tourism, and transport.

## The Role of Cost and Management Accountants (CMAs) in GJs:

CMAs play a vital role in the green economy by using the inherent skills to reduce carbon footprints and align sustainability into business strategies. The expertise of a CMA in strategic planning, financial analysis and risk management helps them to attain sustainable practices.

CMAs can utilise the concept of Environmental Management Accounting (EMA) by estimating the environmental costs along with financial data. EMA helps the CMAs to assess costs, set goals, and develop strategies to reduce use of energy and material and hence reduce the CO<sub>2</sub> emission.



## EMA and its benefits:

### 1. Identify Environmental Costs:

- Raw material and energy costs with environmental relevance,
- Hidden costs (circumstantial cost impacting environment)
- Contingent costs (future costs, such as cleaning up) and social relationship costs (intangible costs like environmental impacts).

### Benefits:

- CMAs can trail and quantify the environmental impact of raw materials and energy used in production. A CMA can do a precise valuation and facilitate strategies to reduce emissions, waste, and resource depletion.

- CMAs can use Environmental Activity-Based Costing (EABC) to identify and allocate hidden environmental costs in overheads to specific activities, making them visible for better management. This helps organisations to reduce waste, fix inefficiencies, and enhance sustainability.
- CMAs can assess and plan for contingent costs, like future cleanup expenses, ensuring financial preparedness. CMA can also evaluate image and relationship costs, such as the value of producing environmental reports, to enhance transparency and build trust with stakeholders.

### 2. Life-Cycle Costing (LCC):

- Comprehensive Cost Evaluation
- Identify Cost-Saving Opportunities
- Support Sustainable Decision-Making
- Enhance Green Job Development

#### Benefits:

- Considering the costs of raw materials, manufacturing, installation, maintenance, and end-of-life disposal, a CMA can derive the life cycle costing of a solar panel. This analysis evaluates the minimisation of overall environmental impact while maximising the financial returns.
- In the production of electric vehicles (EVs), a CMA can use LCC to find how both material cost and environmental impact reduces by using recycled materials. This leads to more efficient and sustainable production.
- A CMA can advise a construction company to invest in energy-efficient building materials. By evaluating long-term energy savings and lower maintenance costs, the CMA helps the company choose sustainable options that are economically beneficial.

- A CMA in a manufacturing company can apply LCC to justify the shift to renewable energy sources. This not only lowers long-term costs but also creates green jobs in solar and wind energy sectors by demonstrating the financial viability of the transition.

CMAs can contribute to green jobs in several additional areas beyond EMA. Some key roles of CMAs to make significant impacts:

#### 1. Sustainable Supply Chain Management:

- Role: CMAs can play a pivotal role in analysing and optimising supply chains to reduce environmental impacts. CMA can assess the sustainability of suppliers, evaluate the carbon footprint of logistics and transportation, and identify opportunities for reducing waste and resource consumption.
- Impact: By creating awareness of sustainable practices across the supply chain, CMAs can help businesses to reduce their overall environmental footprint, enhance resource efficiency.

#### 2. Carbon Accounting and Reporting:

- Role: CMAs can develop and implement carbon accounting systems to track greenhouse gas emissions across all business operations. CMA can calculate and prepare report of the required compliance with regulations on CO2 emission.
- Impact: Fair calculation of carbon accounting enables business to understand their emission profile. The emission report set reduction targets to management and demonstrate transparency to stakeholders. This is important for securing investment and maintaining a positive corporate image.

#### 3. Green Financing and Investment Analysis:

- Role: CMAs can assess the financial viability of green projects and initiatives. Mainly investments in renewable

energy, energy-efficient technologies or sustainable product development. CMA can also assist in obtaining green financing through mechanisms like green bonds or sustainability-linked loans.

- Impact: By providing detailed financial analysis, CMAs can produce a report for the allocation of capital to green projects that generate long-term environmental and financial benefits and business sustainability.

#### 4. Eco-Friendly Product and Process Design:

- Role: Working closely with design and engineering teams, CMAs can help in developing eco-friendly products and processes by analysing the cost implications of sustainable materials, energy-efficient production methods, and end-of-life disposal or recycling options.
- Impact: CMAs can ensure that the sustainability factors are integrated into product design and manufacturing processes which reduces environmental impact and enhances market competitiveness.

#### 5. Circular Economy Initiatives:

- Role: CMAs can help in transition of a business from a linear to a circular economy by analysing the costs and benefits of recycling, refurbishing, and reusing materials. They can develop financial models to measure the impact of waste reduction and resource recovery initiatives.
- Impact: CMAs can help business to minimise waste, lower resource consumption, and create new revenue streams from recycled or repurposed products.

#### 6. Energy Management and Efficiency Projects:

- Role: CMAs can identify opportunities for energy conservation and efficiency

improvements within an organisation. They can evaluate the financial return on investment for energy-saving projects, such as upgrading to energy-efficient lighting, HVAC systems, or renewable energy installations.

- Impact: Implementing energy management initiatives helps business to reduce operating costs, decrease carbon emission and enhance long-term sustainability.

#### 8. Environmental Taxation and Incentive Optimisation:

- Role: CMAs can analyse the financial impact of environmental taxes, such as carbon taxes or waste disposal fees, and optimise the use of government incentives for sustainable practices, such as tax credits for renewable energy investments or grants for energy efficiency projects.
- Impact: By understanding the complexities of environmental taxation and incentives, CMAs can help business to maximise financial benefits by minimising environmental liabilities.

#### Conclusion:

The role of CMAs in GJ is crucial. They are experts in the concept of EMA and strategic planning. They can help a business to steer the problems on the green economy. They can help an organisation in reducing the environmental impact and contribute to a sustainable future. Reflecting on Dr. Abdul Kalam's words, "Allow your students to dream; let them dream about the opportunities they have and teach them how to achieve those dreams," - it is vital to inspire our young CMAs to envision their role in fighting against adverse climate change and promoting sustainability. Our Institute's Sustainability Standards Board will guide them not only to dream of these opportunities (Green Jobs) but also equip them with the skills and knowledge to turn those dreams into reality, creating a greener world.



# Practical aspects of Essential Performance Disclosures under “Environment Principles” in BRSR

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SEBI has mandated filing of Comprehensive version of Business Responsibility and Sustainability Report (BRSR) for the top 1000 listed companies (by market capitalization) with effect from the financial year 2022-2023. The business leaders in sustainable business need to strive towards a greener future. With due care for our planet, all the stakeholders need to set out on a mission to grow their businesses whilst reducing environmental footprint and much greater responsibility is cast on the governance professionals to ensure compliance with reporting of mandatory principles under ESG.

Sustainability has become a buzzword for the companies to “do good”, while ESG is the incorporation of three critical elements namely Environment (impact on Planet), Social (impact on People) and Governance (how well a Company is governed) for today’s business leaders and investors.

Sustainable development stands for development that meets the needs of the present without impacting the ability of the future generations to meet their own needs wherein there is no permanent loss of the environmental attributes.

Sustainable business creates values for investors, customers, host communities and environment by operating at the intersection of Profit, People and Planet (PPP).

## Reporting Requirements in India

SEBI has mandated filing of Comprehensive version of Business Responsibility and Sustainability Report (BRSR) for the top 1000 listed companies (by market capitalization) with effect from the financial year 2022-2023.

The reporting under BRSR is under three major sections namely, General Disclosures under section A that covers the basic information of the Company; Management and Process Disclosures under section B that focus on Policy

and Management processes; Governance, Leadership and Oversight; and Principle-wise Disclosures under section C (categorised into Essential Indicators which are mandatory and Leadership Indicators that are voluntary) that comprise of the nine principles on ESG areas which are focussed at helping businesses demonstrate their performance in integrating the Principles and Core Elements with key processes and decisions.

Environment covers 2 out of 9 principles, i.e. Principle 2 on Safe & Sustainable Products and Services which a business should provide in a manner that is sustainable and safe; and Principle 6 provides that business should respect and make efforts to protect and restore the environment. The remaining seven principles relate to Social & Governance.

### i. Disclosures of Essential Indicators under Principle 2:

- EI-1 requires disclosure on the percentage of R&D and capital expenditure (capex) investments in specific technologies to improve the environmental and social impacts of product and processes to total R&D and capex investments made by the entity, respectively.

“Hindustan Unilever(HUL) during the year FY2023-24, have undertaken the R&D on sustainability projects like Deforestation Free Palm, replacing non- recyclable plastics with recyclable plastics and greenhouse gas (GHG) reduction through eco-design projects.

The Company has also undertaken Capex on sustainability projects like setting up machinery to replace palm fatty acids with starch, heat pump for hot water application, magnetic chiller for chiller application, enhancement of solar plant & windmill footprint, water conservation & harvesting, and occupational health & safety improvement programmes.”

- EI-3 requires disclosure on the processes in place to safely reclaim your products for reusing, recycling and disposing at the end of life, for (a) Plastics (including packaging) (b) E-waste (c) Hazardous waste and (d) other waste.

“HUL has a comprehensive standard operating procedure (SOP) for safely handling and disposing of expired/damaged stocks of finished goods returned from the market and depots which are either safely disposed of or recycled or reused.

Also for Plastic waste as part of Extended Producer Responsibility (EPR), HUL follows the new national EPR Framework that has become operational since April 2023 wherein an EPR wallet credit system has been created by CPCB.

In FY 2023-24, ITC collected and sustainably managed more than 70,000 tonnes of plastic waste across the Country. The amount of plastic waste managed exceeded the amount of plastic packaging utilised the Company during the year, enabling the Company to maintain the milestone of Plastic Neutrality.

For other wastes, all ITC Units have established systems and procedures to

ensure that waste is disposed through authorised agencies in line with applicable regulations.”

- EI-4 requires disclosure on whether Extended Producer Responsibility (EPR) is applicable to the entity’s activities and if the Company uses Plastic then it must register itself under EPR.

“HUL purchases EPR credit based on plastic footprint / consumption and fully meet the EPR obligation”

### ii. Disclosures of Essential Indicators under Principle 6

- EI-1 requires information disclosure on consumption of energy including from renewable as well as non-renewable sources and energy intensity i.e. energy consumption per rupee of turnover including adjusted for purchasing power parity and also in terms of physical output. Further the independent evaluation of this is required to be reported.
- EI-2 requires disclosure if the entity have any sites/facilities identified as designated consumers (DCs) under the Performance, Achieve and Trade (PAT) Scheme of the Government of India? (Y/N) If yes, disclose whether targets set under the PAT scheme have been achieved. In case targets have not been achieved, provide the remedial action taken, if any.

“ITC has disclosed that three Units of ITC’s Paperboards and Speciality Papers Business and twelve Hotels of Hotels Business are covered under the PAT scheme and that ITC has made significant investments in reducing energy consumption and, accordingly, the performance of the Company’s Units covered far exceeds the energy efficiency targets fixed under the PAT scheme.”

- EI-3 requires disclosure on water withdrawal by sources (i.e. from Surface, Ground, Thirdparty, Sea or any other source), total water consumption, water

intensity per rupee of turnover (including adjusted for PPP) and in terms of physical output.

*“HUL is addressing water scarcity through conservation, restoration, recharge, and reuse of water. In this pursuit, at the community level, it has implemented Water Stewardship Projects across 12 water-stressed locations.”*

- EI-4 requires disclosure on water discharge to destinations (i.e. to Surface, Ground, Thirdparty, Sea and any other source) and level of treatment. Also Independent third party assurance provider need to assure that water discharge is at a reasonable

*“HUL’s wastewater is treated in the Company’s own effluent treatment plants through secondary treatment and then discharged in line with consent requirements of the Pollution Control Board.”*

- EI-5 requires disclosures if the entity has implemented a mechanism of zero water discharge (i.e. recycling and reuse of waste water thereby reducing the requirement of fresh water) and if yes then the details of its coverage and implementation is to be provided

*“In HUL as on 31<sup>st</sup> March 2024, 26 out of 28 factories are Zero Liquid Discharge, i.e. they recycle and reuse 100% of their wastewater within the site. Such recycled water is used in cooling towers, as a boiler feed, in fire tanks, external area cleaning, toilet flushing, and gardening. The remaining two factories discharge water in common effluent treatment plants (CETP)/ municipal drainages as per the consent to operate conditions issued by the Pollution Control Board.”*

- EI-6 requires disclosure in a specified format, of the air emission (other than GHG emissions) i.e. of Nitrogen Oxide (NOx) and Sulphur Oxide (SOx) gases, Particulate matter (PM), persistent

organic pollutants (POP), Volatile organic compounds and Hazardous air pollutants (HAP) that cause air pollution and are harmful to human inhalation.

Also Independent third party evaluation is required for this.

- EI-7 requires disclosure in a specified format, on details of greenhouse gases (GHG) both scope 1 & scope 2 emissions with details of carbon dioxide and other gases and its intensity per rupee of turnover (including for adjusted PPP) and in terms of physical output. Also Independent third party evaluation is required.

*“HUL reports emissions with reference to the latest Greenhouse Gas Protocol Corporate Accounting and Reporting Standard (GHG Protocol). Energy conversion and emission factors are used as per the UN’s Intergovernmental Panel on Climate Change (IPCC).”*

- EI-8 requires an entity to disclose if it has undertaken any project to reduce GHG emission and if yes then details thereof are to be provided.

*“HUL has outlined Climate Transition Action Plan to progress towards near-term value chain emission reduction targets which includes priority action areas i.e. Supplier Climate Programme, reformulating products, forest-risk commodities, regenerative agriculture, chemical ingredients, packaging, logistics and ice cream cabinets. To support the goal of achieving zero emissions in own operations, the Company has started taking the actions like buying renewable power through solar power plants, invested in windmill to reduce requirement of grid power, eliminated use of coal from operations & introduced biomass instead, replaced use of diesel and furnace oil with bio-fuel. The company has adopted various energy saving projects like heat pumps, energy efficient motors etc to become energy efficient.”*

- EI-9 requires an entity to provide details of waste management in a specified format to give information on wastes generated from plastic, electronic (E), bio-medical, construction & demolition, battery, radioactive, hazardous and non-hazardous materials.

The intensity of waste per rupee of turnover (including adjusted for PPP) and in terms of physical output also needs to be disclosed.

Further, for each category of waste generated, total waste recovered through recycling, re-using or other recovery operations is to be provided. Also the waste disposal by each method i.e. incineration, landfilling and other disposal methods is to be disclosed.

Further, an Independent third party evaluation is required.

*“In FY 2023-24, ITC continued to recycle over 99% of waste from its operations. In addition to this, the Company’s PSPD recycled over 89,000 tonnes of externally sourced waste paper, thereby creating a positive environmental footprint. The Company also collected and sustainably managed more than 100% of its post-consumer plastic packaging waste.”*

- EI-10 requires to briefly describe the waste management practices adopted in establishments. Describe the strategy adopted by company to reduce usage of hazardous and toxic chemicals in its products and processes and the practices adopted to manage such wastes


*“HUL with zero-waste mindset looks at waste materials as a resource. Where it has not been able to find ways to reduce waste, it looks for routes to reuse or recycle it. In the absence of recycling infrastructure, it recovers energy from the waste, to strengthen its circular economy approach – improving factory operations and reducing its environmental impact. All its factories are equipped with*

*pre-processing facilities, such as waste segregation and waste reduction at source, thus improving recyclability.”*

- EI-11 requires an entity to specify details in the specified format if it has operations/offices in/around ecologically sensitive areas (such as national parks, wildlife sanctuaries, biosphere reserves, wetlands, biodiversity hotspots, forests, and coastal regulation zones) where environmental approvals/clearances are required
- EI-12 requires details of environmental impact assessments of projects undertaken by the entity based on applicable laws, in the current financial year
- EI-13 an entity is to report, if it is compliant with the applicable environmental law/regulations/guidelines in India, such as the Water (Prevention and Control of Pollution) Act, Air (Prevention and Control of Pollution) Act, Environment protection act and rules thereunder (yes/no)? If not, details of all such non-compliances, to be reported in the in a specified format

*“HUL’s and ITC’s operations and offices comply with the country’s applicable environmental laws and regulations and operate as per Consent to Operate conditions from the Central and State Pollution Control Boards”.*

### Conclusion:

With global warming progressing at an unprecedented rate, the Climate change has now become a climate crisis. The business leaders in sustainable business need to strive towards a greener future powered by purpose, innovation, and integrity at a much faster pace and without wasting time. With due care for our planet, all the stakeholders need to set out on a mission to grow their businesses whilst reducing environmental footprint. 

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1. BRSR Report of Hindustan Unilever Ltd(HUL) 2023-24
2. BRSR Report of ITC Ltd. 2023-24

# Role of Waste Management and Renewable Energy in India's Sustainable Development

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India's commitment to achieving the Sustainable Development Goals (SDGs) aligns with the United Nations' 2030 Agenda, focusing on clean energy (Goal 7) and sustainable consumption (Goal 12). India's renewable energy sector has seen exponential growth, particularly in solar and wind power, contributing to reduced carbon emissions and energy security. Coupled with circular economy principles, India emphasizes resource efficiency and waste management innovations like recycling, composting, and waste to energy. These measures promote environmental sustainability, public health, and economic growth. The country's shift toward renewable energy and a circular economy positions it for long-term ecological balance and social equity.

India's sustainable development goals (SDGs) align with the United Nations' 2030 Agenda, aiming to balance economic growth, social inclusion, and environmental protection. The country's SDG framework includes 17 goals, addressing poverty, hunger, health, education, gender equality, clean water, and more. Central to India's strategy is Goal 7 (Affordable and Clean Energy) and Goal 12 (Responsible Consumption and Production), which emphasize the transition to renewable energy and sustainable waste management practices. The country's rapid economic growth and urbanization have led to significant environmental challenges, including pollution, resource depletion, and biodiversity loss. However, India seeks to mitigate these impacts, ensure long-term ecological balance, and improve the quality of life for its citizens. India's commitment to environmental sustainability is evident in various initiatives, such as the National Action Plan on Climate Change (NAPCC)

and the National Solar Mission. These initiatives aim to reduce carbon emissions, promote clean energy, and enhance resource efficiency. The Swachh Bharat Abhiyan (Clean India Mission) further highlights the importance of proper waste management in achieving a clean and healthy environment. In this backdrop, by integrating environmental considerations into economic and social policies, India aims to create a sustainable future, balancing growth with the preservation of natural resources and ecosystems. This approach is vital for addressing climate change, ensuring food and water security, and enhancing resilience against environmental risks.

## Types of Waste Generation

Waste generation can be broadly categorized into several types based on its source and nature. Understanding these categories is crucial for effective waste management and environmental protection. The main types of waste generation

are presented in the below (Image – 1).



### Current Status and Growth Trends of Renewable Energy

India has emerged as a global leader in renewable energy, significantly expanding its capacity across various sources to address growing energy demands, reduce carbon emissions, and enhance energy security. As of 2024, the country’s renewable energy capacity includes solar, wind, hydro, and biomass. However, India has witnessed exponential growth in solar energy, becoming the largest segment of its renewable portfolio. The installed solar capacity has surged due to declining costs of solar panels and technological advancements. Large-scale solar parks and decentralized rooftop installations are key contributors. With high solar irradiance and a government target of 280 GW by 2030, the potential for solar energy is substantial. Innovations in energy storage and grid integration will further boost solar adoption.

Wind energy also plays a major role in India’s renewable mix. The country’s installed wind capacity has steadily increased, supported by favorable wind conditions in states like Tamil Nadu, Karnataka, Gujarat, and Maharashtra. Recent developments include larger and more efficient wind turbines. India’s onshore wind potential is estimated at around 302 GW at 100 meters. Additionally, the exploration of offshore wind energy offers new growth opportunities along the coastline. Similarly, hydropower,

encompassing both large and small plants, is a traditional and significant source of renewable energy, especially in northern and northeastern regions. While large hydropower projects have grown steadily, small hydropower projects are emerging to serve remote areas. However, hydropower projects face challenges such as environmental concerns, displacement issues, and seasonal water variability.

Even, India has a diverse biomass resource base, including agricultural residues, animal waste, and industrial by-products. Biomass power plants and biogas facilities contribute to renewable capacity, with biomass used for electricity generation, combined heat and power systems, and clean cooking solutions in rural areas. The country’s large agricultural sector ensures a steady supply of biomass feedstock, offering significant potential for growth. The integration of energy storage technologies, such as batteries, is crucial for managing renewable energy variability. India is investing in storage solutions to enhance grid stability and reliability. Government policies, including the National Solar Mission and National Wind Mission, along with international collaborations like the International Solar Alliance (ISA), are pivotal for scaling up renewable energy. Decentralized solutions like rooftop solar and mini-grids are improving energy access in rural areas, with vast potential to enhance quality of life, education, and healthcare. The ongoing growth and investment in renewable energy are essential for India’s sustainable development and energy security.





### Circular Economy and Resource Efficiency

The concept of a circular economy revolves around creating a closed-loop system where resources are continually reused, recycled, and regenerated, minimizing waste and reducing environmental impact. Unlike the traditional linear economy, which follows a “take, make, dispose” model, a circular economy emphasizes sustainability by keeping products, materials, and resources in use for as long as possible. In a circular economy, waste management plays a pivotal role. Effective waste management practices such as recycling, composting, and waste-to-energy contribute by transforming waste into valuable resources. Recycling allows materials to be reused in manufacturing processes, reducing the need for new raw materials and minimizing landfill waste. Composting organic waste converts it into nutrient-rich soil, supporting agricultural productivity. Waste-to-energy technologies, which convert non-recyclable waste into energy, help reduce reliance on fossil fuels and provide a sustainable energy source.

Renewable energy supports the circular economy by providing sustainable alternatives to fossil fuels. Solar, wind, biomass, and other renewable sources generate energy with minimal environmental impact, reducing greenhouse gas emissions and conserving natural resources. Biomass energy, for example, utilizes organic

waste and agricultural residues, closing the loop by turning waste into energy. Similarly, innovations in energy storage and grid integration enhance the efficiency and reliability of renewable energy systems, further supporting circular principles. By integrating waste management and renewable energy into a circular economy framework, we create a system where materials are continuously cycled and energy is sourced sustainably. This approach not only minimizes environmental impact but also promotes resource efficiency and reduces waste. Ultimately, the circular economy aligns economic growth with environmental stewardship, fostering a sustainable and resilient future.

### Social and Economic Impacts

The transition to renewable energy and improved waste management practices significantly enhances public health and quality of life. Renewable energy reduces air pollution by cutting down on emissions from fossil fuels, leading to fewer respiratory and cardiovascular diseases. In rural and underserved areas, decentralized renewable solutions like solar mini-grids provide reliable electricity, improving access to education, healthcare, and clean water. Efficient waste management practices, such as recycling and composting, contribute to cleaner environments, reducing disease vectors and enhancing overall community health. Moreover,


these advancements foster social equity by creating job opportunities in green technologies and waste management sectors. Training and employment in these fields support economic inclusion and skill development, particularly in disadvantaged communities.

Economically, the growth of renewable energy and waste management sectors drives substantial investment and innovation. Renewable energy investments contribute to economic growth by creating jobs in manufacturing, installation, and maintenance, and by reducing energy costs over time. The renewable sector also attracts significant international investment and fosters technological advancements, positioning countries as leaders in the global green economy. Effective waste management reduces the economic burden of waste disposal and landfill use. Recycling and waste-to-energy initiatives create new revenue streams and reduce the costs associated with environmental cleanup and waste handling. Additionally, a circular economy approach, driven by effective waste management and renewable energy, promotes resource efficiency and reduces reliance on finite resources, enhancing long-term economic sustainability. Therefore, advancing renewable energy and waste management yields substantial social and economic benefits, including improved public health, job creation, economic growth, and resource efficiency. These impacts call attention to the importance of continued investment and



innovation in these critical areas for achieving sustainable development.

### Conclusion:

To sum up, solar and wind energy will likely dominate, with increased adoption of energy storage solutions enhancing grid stability and reliability. Emerging technologies, such as offshore wind and advanced bioenergy, will further diversify the energy mix. Governments and businesses are anticipated to invest heavily in these areas to meet ambitious climate targets and ensure energy security. In waste management, the focus will shift towards circular economy practices, emphasizing waste reduction, recycling, and resource recovery. Advances in waste-to-energy technologies and increased adoption of composting will contribute to more sustainable waste management systems. Smart waste management solutions, including IoT-enabled monitoring and sorting technologies, will enhance efficiency and effectiveness. Further, these trends and projections highlight a future where sustainability is increasingly integrated into energy and waste systems. The drive towards cleaner energy and more efficient waste management will support environmental protection, economic growth, and improved quality of life, setting the stage for a more sustainable and resilient future. 

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## 16<sup>th</sup> Webinar Green Costing

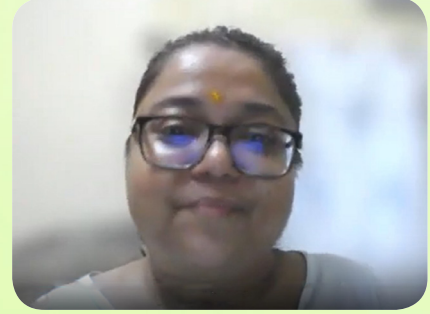
September 13, 2024 from 4 to 5: 15 pm



CMA Dibbendu Roy



CMA Subhasish Ghosh



CMA (Dr.) Aditi Dasgupta

The Sustainability Standards Board (SSB) as a part of *Vasudhaiva Kutumbakam* series organized the 16<sup>th</sup> webinar on Friday September 13, 2024. The subject deliberated during the webinar was on “Green Costing”. CMA Subhasish Ghosh, General Manager, ITC Ltd. was the resource person.

CMA Dibbendu Roy, Additional Director, ICAI welcomed the resource person and introduced the theme of the webinar. CMA Ghosh started his session mentioning about the significance of Green Costing and explained the pitfalls of traditional costing system where the fully embedded cost is not included, while the Green Costing includes it in the statement. He further dwelled on various components of Green Costing which includes both the direct environment costs and indirect environment costs.

He further explained activity based costing and the allocation of environment cost components. He highlighted the other costing methods like Life Cycle Costing and how the element of environment cost is stated throughout the product life cycle. He further touched upon the environment impact assessment and how it helps to assess and estimate the environment cost. He further discussed the reporting of sustainability reporting framework and the importance of proper disclosures for all stakeholders.

CMA Ghosh, thereafter elaborated in detail, the implementing steps for Green Costing and ESG, where he highlighted the benefits accrued with such implementation.

In conclusion, CMA Ghosh highlighted the use of technology and how it is required for proper Green Costing implementation. He emphasised the role of CMAs who can validate the ESG reporting and frame ESG strategies for the Companies.

CMA Ghosh devoted some time to address some pertinent queries raised by the participants. He cited various examples and real time instances from corporate sphere, where his three-decade experience in the field was clearly evident.

CMA (Dr.) Aditi Dasgupta, Joint Director delivered the concluding remarks and proposed vote of thanks. The participants had the opportunity to conclude the week by attending a webinar of immense topical relevance.

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**Vasudhaiva Kutumbakam Series**  
17<sup>th</sup> Webinar

**ESG and PSUs**

Friday | September 27, 2024 | 4 pm to 5:15 pm

Organised by Sustainability Standards Board (SSB)

**SPEAKER**

  
CMA Bibhuti Bhusan Nayak  
President, ICMAI

  
CMA T C A Srinivasa Prasad  
Vice President, ICMAI

  
CMA Ram Ganesh R  
Company Secretary  
Kerala State Beverages (M&M)  
Corporation Ltd.

  
CMA (Dr.) Ashish P. Thatte  
Chairman, SSB, ICMAI

**CPE Credit 1 Hour**

Web Link:  
[https://eicmai.in/Webinar\\_Portal/Members/Memberlogin.aspx](https://eicmai.in/Webinar_Portal/Members/Memberlogin.aspx)

For queries, email to [ssb@icmai.in](mailto:ssb@icmai.in)

Behind every successful business decision, there is always a CMA

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**Vasudhaiva Kutumbakam Series**  
18<sup>th</sup> Webinar

**Corporate Social Responsibility:  
Regulatory Provisions**

Friday | October 11, 2024 | 4 pm to 5:15 pm

Organised by Sustainability Standards Board (SSB)

**SPEAKER**

  
CMA Bibhuti Bhusan Nayak  
President, ICMAI

  
CMA T C A Srinivasa Prasad  
Vice President, ICMAI

  
Shri Naman Shah  
Director, Deloitte Haskins & Sells LLP

  
CMA (Dr.) Ashish P. Thatte  
Chairman, SSB, ICMAI

**CPE Credit 1 Hour**

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Behind every successful business decision, there is always a CMA

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**Vasudhaiva Kutumbakam Series**  
19<sup>th</sup> Webinar

**Overview of Green Battery Concept and its Future in  
Enhancing Sustainability in India  
(with Case Studies)**

Friday | October 25, 2024 | 4 pm to 5:15 pm

Organised by Sustainability Standards Board (SSB)

**SPEAKER**

  
CMA Bibhuti Bhusan Nayak  
President, ICMAI

  
CMA T C A Srinivasa Prasad  
Vice President, ICMAI

  
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Friday | December 6, 2024 | 4 pm to 5:15 pm

Organised by  
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CMA T C A Srinivasa Prasad  
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# Waste Management – Reduce, Reuse, Recycle!

**Usha Ganapathy Subramanian**  
Practicing Company Secretary  
Chennai

Ever since industrialization, mindless consumerism has had a heavy toll on the planet. Historically, we, as a society, lived in harmony with nature, practising a lifestyle that was inherently sustainable, mindful and efficient. Today, the invasion of plastics and consumerism has distanced us from these values, leading to a global waste crisis.

While the proliferation of petrochemicals has made available various products at affordable prices, the tendency to replace things with new ones fast and without remorse is also fuelled. But things take a life of their own after we throw them away and non-bio-degradable materials often outlive generations. In a previous article in the series, we saw that the life of a plastic water bottle could be 450 years.<sup>1</sup> It lives for a disproportionately longer time in the junkyard than it does with us. How unfair it is for the planet and the posterity to endure for half a millennium something that was used by a single person to quench his thirst once! The ban on single-use plastics is highly justified.

The world is generating wastes at unprecedented rates. As per the World Bank, in the year 2020, a total of 2.24 billion tonnes of waste were generated, which translates to 0.79 kg of wastes per day per person. This pace is expected to accelerate and lead to a waste generation of 3.88 billion tonnes per annum by the year 2050.<sup>2</sup> As per the Central Pollution Control Board's Annual Report 2020-21, the solid waste generated in India is 1,60,000 tonnes per day.<sup>3</sup>

Waste generation is unavoidable; however, the

- 1 World Wildlife Fund, (July 1, 2021), "The Lifecycle of Plastics", <https://wwf.org.au/blogs/the-lifecycle-of-plastics/>, retrieved July 14, 2024.
- 2 <https://www.worldbank.org/en/topic/urbandevelopment/brief/solid-waste-management>
- 3 [https://cpcb.nic.in/uploads/MSW/MSW\\_AnnualReport\\_2020-21.pdf](https://cpcb.nic.in/uploads/MSW/MSW_AnnualReport_2020-21.pdf)

quantum of wastes can certainly be reduced. The concept of circular economy can help battle the problem. Reduce, reuse and recycle needs to be adopted by every individual and business.

**Waste reduction:** A simple measure towards waste reduction is to consume less. This is not something necessitated only because of the environmental concerns but has been entrenched in our Indian ethos. Right from the Vedas to the *Thirukkural* recommend a simple lifestyle minimizing wastes. An austere lifestyle, popularized as minimalism these days, has been part of our sayings everywhere – from the Sanskrit saying, "Athi Sarvatra Varjayet" meaning, extremity should be avoided in all circumstances; or the Tamil saying, "Alavukku meerinal amizhdamum nanju" – meaning, even the divine nectar becomes a poison in extreme doses. When anything more than what is needed is considered an excess, wastes can naturally be reduced. Though there can be no one-size-fits-all approach to orient ourselves towards a simpler lifestyle, a lot of resources are available these days all over the internet – ranging from New York Times articles to Marie Kondo's books to social media posts – that can spark some ideas.

When it comes to manufacturing businesses, a conscious move towards achieving operational excellence by itself would bring in waste reduction. Emphasizing waste reduction as a performance criterion can be a game-changer not just in terms of sustainability but in cost reduction too. This requires exercising carefulness in product design, streamlining processes, production planning and inventory management, and perhaps even in planning the factory layout. All types of businesses must also have policies and procedures to identify and deal with e-waste and plastic wastes too.

**Emphasis on quality:** Quality over quantity, should be the mantra when it comes to a sustainable lifestyle. Our past generations have



always valued craftsmanship and durability – from handwoven khadi that lasts generations to handcrafted brass utensils that were passed down as family heirlooms, we traditionally placed value on durability over fleeting trends.

In contrast, these days, social media frenzy leads to a trap of constantly discarding perfectly functional items for something newer and trendier. Social media tends to amp the temptation to buy something that may not necessarily need but buy just to fit in the trend. It needs a lot of mindfulness to return focus to the functional use of a product rather than on the novelty factor. This will ensure quality over quantity and also prevent unhealthily excessive shopping sprees and hauls.

Just as in our homes, our ancestors treasured hand-made, beautifully-crafted, and sustainable articles, businesses too must return to this philosophy by making sustainable and long-lasting products, albeit aided by modern technologies. This would translate to better product design, sourcing quality raw materials, and focusing on a few basic variants instead of too many. Businesses could also encourage responsible consumption behaviour. For example, restaurants could levy a small fine for unfinished meals and donate the proceeds to charity or offer a discount for fully-finished meals, or encourage parcelling the unfinished meal home (doggy bags).<sup>4,5</sup>

**Repurposing things to other uses or for other users:** Another time-tested, environment-friendly and pocket-friendly measure, that does not force one into staunch austerity is recycling and repurposing things, a practice that has a quirky name these. This is found in many Indian homes – repurposing old clothes into bags, kitchen mats,

4 [https://fssai.gov.in/upload/media/FSSAI\\_News\\_Waste\\_Telegraph\\_10\\_01\\_2020.pdf](https://fssai.gov.in/upload/media/FSSAI_News_Waste_Telegraph_10_01_2020.pdf)

5 <https://economictimes.indiatimes.com/magazines/panache/fine-for-wasting-food-or-rebate-for-not/articleshow/74252330.cms?from=mdr>

kitchen towels, door mats or as quilts, making compost from bio waste, creating useful things like brooms, mats, etc. from dried leaves and other plant parts, reusing packing materials, and so on. Nothing is wasted and everything should be repurposed. With better time management and prioritisation, it is still possible to adopt these practices in the modern household – a movement gaining ground in the social media with a quirky name – *kabaad se jugaad* (improvising waste into useful things).

As far as businesses are concerned, they could look at how wastes could be turned into by-products or repurposed in a safe, hygienic and environment-friendly manner. Businesses must take up the case of product lifecycle management and look at ways to collect the used products from customers for recycling or refurbishing. Some businesses have sprung up in this space of collecting and refurbishing “preloved” products – in clothing, bags, vehicles and electronics. This is a heartening trend that gives waste management the boost it needs.

The articles that have reached the end of useful life for us can still be useful to others and of value to others. This is especially true for books. This is where we can consider donating them to those having genuine need of the products but cannot afford them. Donating books to libraries and other used but functional articles to organisations that repurpose them for the benefit of the underprivileged is surely rooted in sustainability.

**Waste segregation:** Different types of wastes require different types of treatment for safe disposal. Indian village communities and local governance bodies have historically done collective waste management. However, in the modern days, it requires more discipline as plastic and other non-biodegradable wastes have become intermingled with food or biodegradable wastes. The process of waste segregation needs to start from the point of origin and not after collection. When it is segregated at source, it becomes much easier to treat the wastes safely.


Just as households must segregate wastes, businesses too must commit to waste segregation and follow it religiously.

The basic discipline of maintaining separate bins for dry and wet wastes at homes, offices and shops needs to be strictly adhered to. Hygiene-related and bio-medical wastes must be kept

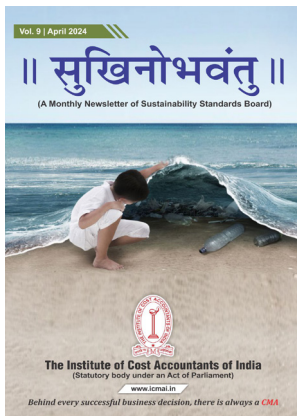
separate. Electronic wastes, especially those that can still emit radiation, must be separately handed over to the civic waste collection bodies or if the business selling the products has an end-of-life programme for such wastes, they may be handed over to them for safe processing. Wastes that could cause immediate harm like broken metals, glass, pins should be safely handed over to the waste collection bodies with specific notice. Furniture items to be discarded must also be reported to the bodies for collection by them instead of dumping them in the streets.

While households can repurpose and segregate waste, manufacturing units and companies can streamline their processes to minimize waste generation and ensure safe disposal. Operational excellence in manufacturing processes not only reduces waste but also cuts down costs, creating a win-win situation for both the environment and the economy.

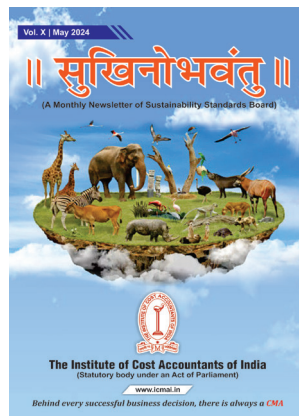
### Conclusion:

In essence, waste management is a lifestyle choice. It involves a deep awareness of the value arising out of the things that we use as well as the awareness of the cost of discarding things that we decide not to use. Whether as individuals making daily lifestyle choices or as businesses adopting sustainable practices, we have the individual responsibility as well as the collective power to stop the downward spiral of environmental degradation and restore the planet. By returning to our roots of mindful consumption, durability, and repurposing, we can make a difference. The future of our planet and our posterity depends on the choices we make today—let's choose sustainability. 

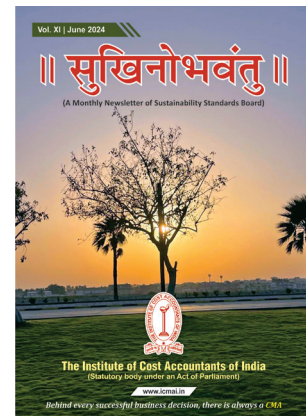
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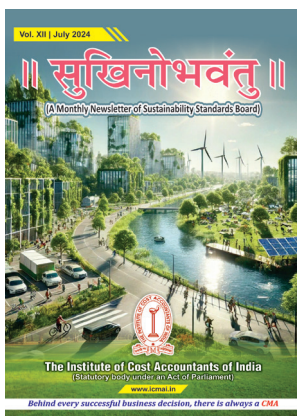
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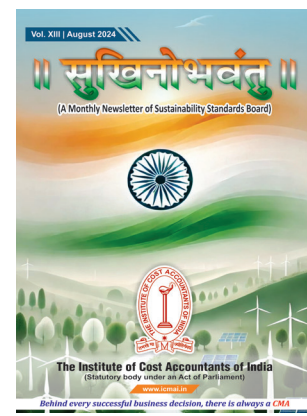
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# Human Development Index a key parameter for Sustainability of a Nation

**CMA Dibbendu Roy**  
Additional Director, ICMAI  
Kolkata

We know that a key acronym was developed by the United Nations called “Human Development Index”. It is developed in the year 1990 and it is a statistical measure which encapsulates the country human development in the field of health, knowledge and standard of living. The countries are ranked in four tiers namely very high, high, medium and low based on the higher score. The development of a country is not only based on Gross Domestic Product but also the soft growth of other intangible factors. We have seen USA, UK and other BRIC countries do not feature in the top bracket of the HDI Index.

## Who are the countries which feature high in the HDI Index?

Scandinavian countries have a high Human Development Index (HDI) because of their strong socio-structural foundations, which include a welfare state model providing generous benefits like free health and education, good pensions, and parental leaves. They have low corruption and are known for their integrity and transparency in governance. Further to that we have that those countries have a high level of trust, quality of governance, social-economic equality, high standards of living. To add to all the above factors, they are rich economies having oil and gas exports.

The Nordic model is the name given to the standards followed by the Nordic countries of Sweden, Norway, Finland, Denmark, and Iceland.

The Scandinavian countries lead the way in responsible development, being characterised not only by relatively high average wealth but also by low income inequalities and substantial investments in the future.

Denmark and Sweden’s freedom from poverty policy allows for enhancement in human welfare and equality among citizens. However, there are fluctuations in their HDI due to increased income gaps between immigrants and citizens. In the case of Iceland, the urban population grew rapidly after 2008.

Similar traits are seen in natural resources and exports amongst the Nordic countries. The early industrialisation of the Nordic countries was based on some key natural resources. Finland, Norway and Sweden had large forest resources, and, thus, timber and pulp and paper have been important export products.

The Nordic economies of Denmark, Finland, Iceland, Norway, and Sweden are among the world’s wealthiest. Their inhabitants enjoy some of the highest standards of living in the world due to relatively small wage gaps, high employment, and high taxation combined with accessible education and social security.

The 2030 Agenda for Sustainable Development, adopted by all United Nations members in 2015 which created 17 World Sustainable Development Goals (SDGs). They were created with the aim of “peace and prosperity for people and the planet while tackling climate change and working to preserve oceans and forests. The SDGs highlighted the connections between the environmental, social and economic aspects of sustainable development. Sustainability is at the centre of the SDGs.

The 17 SDGs are: No poverty (SDG 1), Zero hunger (SDG 2), Good health and well-being (SDG 3), Quality education (SDG 4), Gender equality (SDG 5), Clean water and sanitation (SDG 6), Affordable and clean energy (SDG 7), Decent work and economic growth (SDG 8), Industry,

innovation and infrastructure (SDG 9), Reduced inequalities (SDG 10), Sustainable cities and communities (SDG 11), Responsible consumption and production (SDG 12), Climate action (SDG 13), Life below water (SDG 14), Life on land (SDG 15), Peace, justice, and strong Institutions (SDG 16) and Partnerships for the goals (SDG 17).

These goals are ambitious, and the reports and outcomes to date indicate a challenging path. Most, if not all, of the goals are unlikely to be met by 2030. Rising inequalities, climate change, and biodiversity loss are topics of concerns threatening progress. The COVID-19 pandemic in 2020 to 2023 made these challenges worse. The pandemic impacted all 17 goals and emphasized the interconnectedness of global health, economic, social, and environmental challenges. Some regions, such as Asia, have experienced significant setbacks during that time. The global effort for the SDGs calls for prioritizing environmental sustainability, understanding the indivisible nature of the goals and seeking synergies across sectors.

With regards to the political impact of the SDGs, it has been observed that they have mainly influenced global and national debates. By doing so, they have led to discursive effects for global and national debates. However, they have struggled to achieve transformative changes in policy and institutional structures. The uneven prioritization of goals reflects longstanding national development policies. This complicates the global endeavour towards sustainable development. For example, there has long been a tendency to favour socio-economic objectives over environmental ones.

The challenges for a comprehensive associateship with the objectives of SDGs is the funding and for that efforts from the United Nations along with other international organization are undertaking concerted efforts to achieve it. The role of private investment and a shift towards sustainable financing are also essential for realizing the SDGs.


We can see an interlinkage with the performance of a country with a high ranking in the Human Development Index and fulfilment of Sustainable Development Goals and also between the best country which is having very high rating in HDI and also fulfilling the SDGs.

Human development are primarily covered mostly by SDGs No. 1–4 which is the main differentiating factor for the countries at the world level and for every group of countries. Overall, the differences between countries for SDG Indicators derive primarily from their Gross National Income.

Norway has achieved their goals of no poverty, good health and wellbeing, gender equality, clean energy, reduced inequalities and other SDG parameters. Norway's strategy for developing a green, circular economy includes the positioning of reducing waste generation, increasing resource efficiency and furthering reducing emissions. The net zero and negative carbon footprint is a reality in Norway. It also has taken proactive mission in promoting sustainable economic growth, creating green and decent jobs and education. Norway has committed in reducing emissions by at least 40% by 2030, compared to 1990 levels.

Thus, we see that the objective of HDI and SDGs somehow correlates and the Scandinavian countries are best advertisement for achievement both the parameters with equal élan. The HDI and the SDG Index are positively correlated as per the study with a correlation of 0.92.

Under International Human Rights Law and under the 2030 Agenda for the Sustainable Development it may be stated that the data for all targets needs to be collected and disaggregated by the prohibited grounds of discrimination under International Human Rights Law. It may be stated that including the respect and protection and thereby promotion of the human rights and fundamental values the SDGs are the panacea for the equal rules for each parameter.

Switzerland is the best country for HDI considering it is having very potent growth in trade and commerce and the world banking is having their hub at Geneva. It also leads on economic competitiveness, quality of life, innovation and good governance thanks to an enviable mix of social, political and economic success factors. The country also provides prosperity, leisure time and access to pristine nature. 

#### Sources:

1. UN Human Development Reports
2. UN SDGs
3. Wikipedia

# Sustainability in Mivan Technology

**CMA (Dr.) Aditi Dasgupta**

Joint Director, ICMAI

Kolkata

In the realm of construction, sustainability takes centre stage as the industry grapples with the environmental challenges of the 21st century. Among the myriad of innovative solutions emerging, Mivan Aluminium Formwork stands out as a beacon of eco-consciousness, poised to revolutionize the way we build. Mivan construction is a technique that uses aluminium formwork to create a fast, efficient, and durable method of construction, particularly in the building of residential and commercial structures. This method, which originated from Malaysia and gained popularity in India and other parts of the world, is often used in large-scale housing projects. Its focus is on speed, precision, and quality.

Mivan construction provides numerous advantages, most notably in its ability to greatly reduce construction time. This is achieved by using pre-engineered, reusable aluminium formwork that streamlines the building process, enabling projects to be completed much faster than with traditional methods. Not only does this efficiency lower costs, but it also minimizes disruptions to the environment, thereby contributing to the sustainability of the construction process.

From an environmental standpoint, Mivan construction offers multiple benefits. The aluminium formwork, which can be reused many times, significantly reduces waste typically generated during construction. Traditional methods often rely on materials like wood and steel, which can lead to waste and environmental damage. In contrast, the Mivan system encourages material recycling, helping to lower the carbon footprint of construction projects.

Additionally, the uniformity and precision of Mivan construction lead to more effective use of resources. Prefabricated forms ensure that materials such as concrete are used efficiently, reducing the need for excess supplies. This, in

turn, cuts down on energy consumption during construction, further promoting sustainability.

The method also enhances the long-term sustainability of buildings. Structures built with Mivan technology are generally more durable and require less maintenance over time, reducing the need for repairs and renovations, which consume resources and generate waste.

## Briefly sustainability in Mivan Construction:

### 1. Reduced Material Waste:

- Mivan construction minimizes material waste because the aluminium formwork can be reused up to 200 times. This reduces the need for additional raw materials and helps in cutting down waste generation, which is a significant sustainability benefit.

### 2. Energy Efficiency:

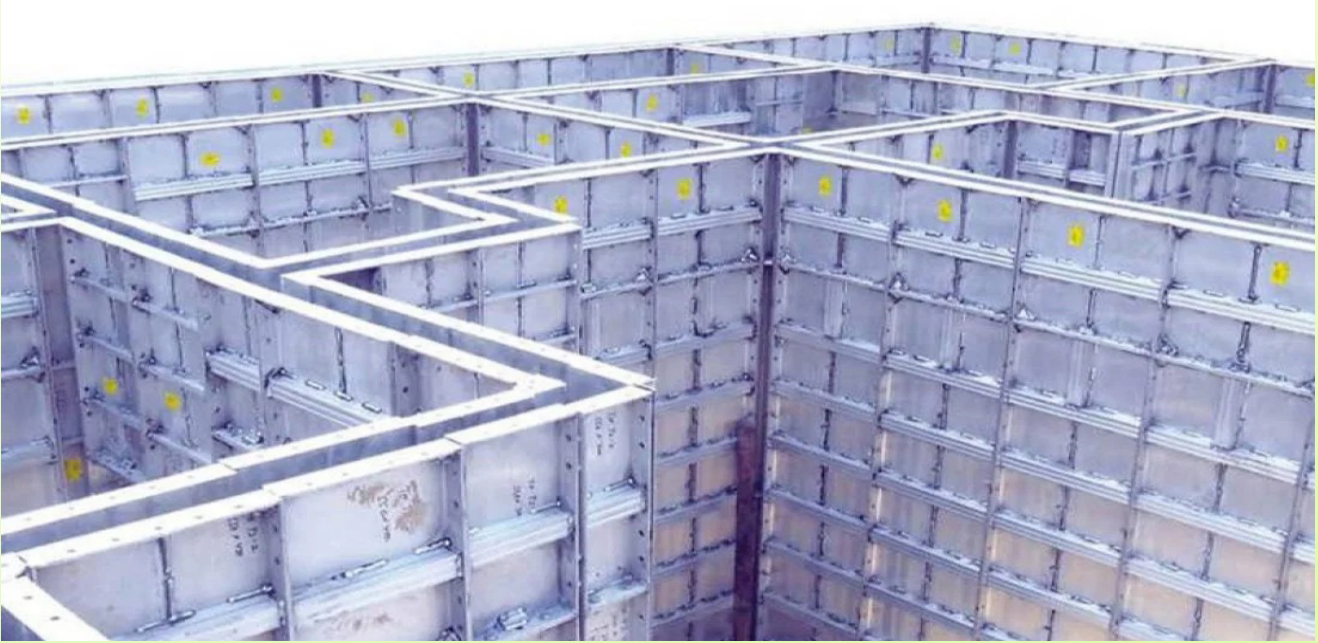
- The speed of construction using Mivan reduces the energy consumed during the building process. Additionally, the buildings constructed with Mivan have better thermal insulation properties, leading to reduced energy consumption for heating and cooling.

### 3. Lower Carbon Footprint:

- The use of prefabricated components and a reduction in on-site construction activities help in lowering the carbon footprint of a project. The reduced need for transportation of materials and waste management also contributes to this.

### 4. Longer Lifespan and Durability:

- Mivan structures are more durable and have a longer lifespan compared to conventional methods. This reduces the



need for frequent repairs and renovations, which in turn lowers the resource consumption and environmental impact over the building's life cycle.

### 5. Resource Optimization:

- By using aluminium formwork, Mivan construction optimizes the use of materials like wood, steel, and concrete, which are more resource-intensive. The efficient use of resources aligns with sustainability goals by conserving natural resources and reducing environmental degradation.

### 6. Water Conservation:

- The controlled use of water in Mivan construction, compared to traditional methods, is another sustainability benefit. Since the process is streamlined and requires less water for curing and plastering, it contributes to water conservation efforts.

Another key benefit of Mivan construction is improved safety. The accuracy and consistency of the building process reduce the likelihood of structural defects, which can have serious environmental and safety repercussions. This technology ensures that buildings are constructed to high standards, contributing to safer, more resilient communities.

Mivan construction can also be integrated with other sustainable practices, such as using eco-friendly materials and energy-efficient designs. This integration enables developers to create structures that meet the demands of modern urbanization while aligning with global sustainability goals.

### Challenges and Considerations:

Aluminium formwork is expensive and on smaller scales, this material isn't always desirable because of its high price tag. Thus, Mivan construction can be a cost-effective option only for large projects with uniform layouts. Also, the process requires an experienced workforce who are able to pour concrete properly and in time, which makes it favourable only when considering these aspects at first glance. Moreover, transporting precast elements and coordinating their delivery and assembly on-site require meticulous planning and management to avoid delays and ensure seamless construction progress. And also integrating Mivan Technology within existing regulatory frameworks requires careful navigation to meet safety, structural, and quality standards.

In conclusion, Mivan construction is a practical solution to the challenges of contemporary construction, particularly in urban areas where speed, efficiency, and sustainability are critical. By minimizing waste, optimizing resource use, and enhancing long-term durability, Mivan technology plays a vital role in promoting sustainable building practices.



# Environmental Consciousness – Lessons from Jainism

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Jain ecology is rooted in spirituality and equality, emphasizing the inherent value of every life form, be it plant or animal, and the need for their respect. In Jainism, this ecological consciousness is reflected in the concept of **Sarvodayavada**—the concern for uplifting all life forms. It presents a distinctive philosophy on the relationship between humans and nature. It posits that every soul, whether in a human or a single-sensed organism, is autonomous and independent. Jainism acknowledges the presence of the soul not only in living beings like humans, animals, and insects but also in what others might deem inanimate, such as water, air, fire, and earth. These are termed **Sthavar Jeev** (immobile) in Jain literature.

**“One who neglects or disregards the existence of earth, air, fire, water and vegetation disregards his own existence which is entwined with them.” Jain cosmology recognizes the fundamental natural phenomenon of symbiosis or mutual dependence, which forms the basis of modern day science of ecology.**

Jain texts emphasize that the wise neither inflict pain on living beings nor encourage others to do so. The religion teaches that the existence of souls is universal. Mahavira, a key figure in Jainism, explained that indulgence in desires leads to ignorance and violence against various life forms, including those of the earth, water, fire, and plants. These beings possess consciousness.

Nonviolence extends beyond physical acts to the mental realm, and Jains believe that true Ahimsa requires compassion and concern for all life, including in thought and emotion. Along with nonviolence, other important tenets, like vegetarianism, a restrained lifestyle, and **Aparigraha** (non-possessiveness), offer guidance for environmental conservation.

Environmental consciousness is deeply ingrained in Jainism, primarily due to its emphasis on

non-violence (Ahimsa) and respect for all forms of life. Jainism’s philosophical and ethical framework encourages environmental stewardship through principles that advocate for harmony with nature.

## Key Principles of Environmental Consciousness in Jainism:

### 1. Ahimsa (Non-violence):

Ahimsa is the foundational principle of Jainism. It teaches that one should avoid harming any living beings, including animals, plants, and even microorganisms. This extends to the natural environment, advocating for minimal harm to the ecosystems that sustain life. For example, Jains avoid activities like deforestation or pollution because they cause harm to life forms.

### 2. Aparigraha (Non-possessiveness):

Aparigraha encourages minimalism and non-attachment to material possessions. By reducing consumption and waste, Jains aim to live more sustainably and lessen their ecological footprint. This principle aligns with modern environmental values of conservation and resource management.

### 3. Anuvrat (Small vows):

Jains take various small vows that promote ecological awareness. These can include commitments like reducing water and energy usage, consuming less, and being mindful of waste production. These personal vows reflect a broader understanding of ecological balance and the importance of living within natural limits.

### 4. Vegetarianism and Veganism:

A vegetarian or vegan lifestyle is a core aspect of Jainism, driven by the principle of non-violence. Jains believe that killing animals for

food is unnecessary and harmful, not only to the animals but also to the environment. The emphasis on plant-based diets reduces the ecological damage associated with animal agriculture.

## 5. Respect for All Forms of Life:

Jains practice reverence for all living beings, from the smallest microorganisms to the largest animals. This respect promotes biodiversity and the preservation of ecosystems. They believe that all life forms have an inherent value, and human beings have no right to exploit or destroy them unnecessarily.

## 6. Loka (Universe):

Jain cosmology teaches that the universe, or "Loka," is interconnected, and humans are just one small part of it. This belief fosters an understanding of the intrinsic value of nature and encourages living in harmony with the environment. The idea of interconnectedness promotes environmental mindfulness.

## Practical Examples of Environmental Practices in Jainism:

### • Water Conservation:

Jains avoid wasting water, recognizing that water bodies are home to numerous life

forms. In traditional Jain homes and temples, water usage is carefully regulated.

### • Animal Welfare:

Jains support shelters for stray or injured animals, known as "Panjarapoles." These shelters reflect their commitment to the protection and care of animals.

### • Air and Soil Conservation:

Jains take care to avoid disturbing even microorganisms found in air, water, and soil. Many Jains walk carefully, sweep paths, and avoid night travel to minimize harm to unseen organisms.

### • Temple Architecture:

Jain temples often incorporate environmentally conscious designs, using sustainable materials and integrating natural elements into their construction.

In summary, Jainism promotes a lifestyle that aligns with the principles of sustainability, environmental conservation, and respect for all living beings. These ancient practices are closely aligned with modern environmental ethics, making Jainism a unique spiritual path in promoting ecological balance.



## CONGRATULATIONS !!!



The Sustainability Standards Board congratulates CMA Venkateswaran Ramakrishnan on his elevation as General Manager in Securities and Exchange Board of India (SEBI). CMA Venkateswaran is a member of Sustainability Standards Board (SEBI Nominee). He is currently working in the Inter-Regulatory Interface Group in the Department of Economic and Policy Analysis of SEBI.

CMA Venkateswaran earned his Masters in Public Administration with specialisation in Economic Policy Management from Columbia University in the City of New York. He is also a Fellow Member of the Institute of

Cost Accountants of India (ICMAI), a Masters in Economics, a Post Graduate Diploma Holder in Securities Laws and a Post Graduate Diploma Holder in Goods and Services Taxation.

In SEBI, he has worked in the Office of the Chairman, Integrated Surveillance Department and Department of Economic and Policy Analysis and was an Adjudicating Officer. He had been on deputation to the Financial Stability and Development Council, housed in the Ministry of Finance, for two years.

Sustainability Standards Board wishes him all the very best in his new role.

## Part V – Experiencing the Joy of Writing

### Introduction

Writing is an art, perhaps a science too, that touches the root of the human existence. The need to express one's thoughts and ideas and share it with others is a primal instinct. When a person expresses his thoughts, it is a reflection of the internal constructs of his mind. Writing could be for various purposes – to communicate or to inform someone of something specific, to share one's ideas and understanding on a topic with a wide audience, to elicit an action or a response or even to evoke emotions.

Words could inspire the noblest of deeds and the mightiest of feats. Words are what make the law; words are what form promises and agreements; words are what form prayers and hymns and songs. There could not be a more powerful weapon to inspire, console, comfort, calm, bend, break or fatigue the human mind than a string of words. The author Edward Bulwer Lytton famously said, "The pen is mightier than the sword."

In this article, which is the last of this series, we contemplate on how to explore, experience and enjoy writing and thereby enhance our writing. Because when one enjoys the act of writing, the chance that the writing engages the readers is more.

### Learning and reflection – Brings confidence and meaning to writing

Learning is an essential ingredient to writing – and it is not just collecting data about the subject matter but also letting ourselves immerse in what the facts or ideas that we are learning make us feel. It is about looking at the information, making sense of it for ourselves, reflecting on what it means to ourselves, and if they are concepts or information to be remembered, trying to recollect them as accurately as possible. Reflecting on one's understanding commits it to memory. Reflection also helps solidify one's own thoughts

and ideas on the subject matter, which makes us more confident and ready to share our learning with a wider audience.

Learning can be from various sources and can take various forms – we can learn about concepts from books or any online sources; we can learn about the recent happenings from newspapers or social media; we can vicariously experience life's joys and pains from poems, short stories; we can escape into entirely different worlds in novels, movies and see life through different lenses; we can learn from observing people during travels; we can learn from striking a conversation with those around us and those we meet every day.

Very often, the learnings and experiences of a person leave indelible footprints in the shores of the mind. When we pay attention to these footprints and give them shape in the form of words, they become clues to understand better the workings of the world in a way that resonates with us. There is no one perfect way to understand the world; there is no perfect way to live. When we share with the world

We may, after all, be a speck in this universe. However, each life brings with it a different dimension to the world. The world is enriched with the thoughts and ideas of each one of us. Holding this perception in mind that our opinions and ideas matter can bring in the confidence to express our thoughts and add more meaning to our words. Franz Kafka said, "Don't bend; don't water it down; don't try to make it logical; don't edit your own soul according to the fashion. Rather, follow your most intense obsessions mercilessly."

### Brevity is the soul of wit

A piece of writing, especially articles, is aimed to inform rather than impress. Hence, writers must aim at being brief and simple. Albert Einstein said, "If you can't explain your ideas and goals to a six-year-old, then you probably don't understand



it yourself." And Shakespeare agreed long back, "Brevity is the soul of wit."

When one writes, it is said that the first draft is often just a conversation with oneself – it is the very process during which the writer's understanding takes form and shape. So often, verbosity and convolution in expression is likely to be present in the first draft. On a second read, as thoughts become more refined, the writing could be simplified and made more concise. Very often, the shorter the article, the expression of concepts becomes more refined and distilled.

### Incorporating technology in writing

We might have come across impeccable hand-written documents – like hand-written letters and articles or even answer sheets in exams, certificates, or minutes of meetings of yesteryears. It requires immense skill, awareness and presence of mind to be able to write on paper while putting the thoughts to paper and presenting beautifully. It is the real test of skill, memory and confidence. These days, it could seem like a daunting task to write something without having the need to hit the backspace a million times and having to rearrange sentences. It may perhaps seem that technology is chipping away at the need for becoming a better writer.

However, word processing software like Microsoft Word helps us in the journey of writing better than we might have by allowing us to edit our thoughts on the go, by enhancing our vocabulary with the thesaurus, and by letting us format things with ease. In the previous edition of this series, we

discussed the use of artificial intelligence (AI) in the process of writing (vis-à-vis using it for writing). AI tools can fact-check and verify our logic. We must exercise abundant caution and discretion while engaging with AI. However, despite this, AI has the capacity to make us better and more informed writers by enhancing and clarifying our thought processes. The key here is not to ask it to draft anything, which it can do exceptionally well, but restricting ourselves to asking it for specific opinion or information, which will preserve our right and duty to use our own words to express our thoughts.

When we are more present with the process, there is a good chance that technology makes us better writers. And what more, it makes for good company.

### Conclusion

When writing is seen as an expression of the soul, there arises meaning, joy and a sense of release in the process. When writing is imbued with a sense of purpose, it helps both the writer and the reader, understand a bit more about the world that we live in. One word at a time.

In every endeavour and creation, there is room for growth. It is the acceptance of this space that helps us continue to learn and grow together. With gratitude and humility, a Kshama Prarthana is submitted seeking forgiveness for the imperfections in this endeavour:

यदक्षरपदभ्रष्टं मात्राहीनं तु यद्भवेत् ।

तत्सर्वं क्षम्यतां देव नारायण नमोऽस्तु ते ।।

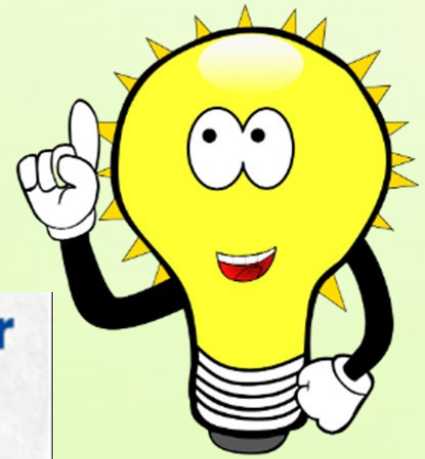
विसर्गबिन्दुमात्राणि पदपादाक्षराणि च ।

न्यूनानि चातिरिक्तानि क्षमस्व पुरुषोत्तम ।।

(Seeking forgiveness from the Divine for the errors in letters, words, intonation, punctuations or other aberrations that have occurred in this endeavour.)

As infinite possibilities await us all, the series comes to an end, with gratitude to the readers.

**Reproduced with suitable modifications from the personal writings and posts of Ms. Usha Ganapathy Subramanian.**



### Kerala Man Innovates **Rainwater Syringe** by Accident, Restores 300 Cr Litres in 30 Years!



One fine day, while watering his garden in his village, Chellanam, Kerala, K J Antoji found his eureka moment!

The heavy hose slipped from his hand, and the high water pressure accidentally drilled a hole in the ground, creating a small natural pool. This 'accidental water syringe' sparked a game-changing idea in Antoji's mind: could rainwater be stored underground to prevent salination?

The accidental water syringe that he had created that day, some thirty years ago, wasn't deep. It was just a few centimetres in the surface, but he started experimenting so that it could help him store water in the ground and ensure that it doesn't become saline. Thus, the Rainwater Harvesting Syringe was born. This ingenious system captures rainwater from rooftops and channels it into underground storage tanks, positioned well below sea level to ensure that freshwater remains usable. A simple motor pump draws water from below the earth's surface to the overhead tank for consumption.

Affordable and easy to install, Antoji's syringe offers households and communities a sustainable way to harness monsoon blessings for year-round water needs.

Over three decades, these Syringes restored over 300 crore litres of water into Kerala's ground.

*We are in pursuit of constant improvement and are keen to know your views.  
Please write to us at [ssb.newsletters@icmai.in](mailto:ssb.newsletters@icmai.in)*

1. COP-29 is scheduled to be held at \_\_\_\_\_
2. Working towards Sustainability, it is necessary to \_\_\_\_\_ ESG risks into the entity's risk management system.
3. Life Cycle Assessment (LCA) is key to make \_\_\_\_\_ , otherwise an abstract concept, concrete and actionable
4. PEF which stands for \_\_\_\_\_ is a common way of measuring environmental performance as per EU Commission Recommendation 2021/2279).
5. According to a report on circular economy, only \_\_\_\_\_ % of the world is circular.

| WINNER  |                        |
|---------|------------------------|
| Sl. No. | Name                   |
| 1.      | CMA (Dr.) K. Nagarajan |

## *Congratulations to the Winner*

### CORRECT ANSWERS OF PREVIOUS QUIZ

|        |        |                |          |                |
|--------|--------|----------------|----------|----------------|
| 1. 56% | 2. 20% | 3. Regenerated | 4. White | 5. Materiality |
|--------|--------|----------------|----------|----------------|

*The names of first 5 participants giving correct responses will be declared in the ensuing newsletter.*

**The responses may be sent to [ssb.newsletters@icmai.in](mailto:ssb.newsletters@icmai.in)**

## Call for articles

*Sukhinobhavantu is inviting articles on the theme ESG/ Sustainability or related themes for publishing in October'2024 edition. The articles should be relevant and original. The article should clearly cover/depict the scope, opportunity and potential for cost accountants. It should not exceed 2200 words and references/ sources are to be given wherever required. It should reach us latest by October 14, 2024, by email to [ssb.newsletters@icmai.in](mailto:ssb.newsletters@icmai.in) The right for selection of articles vests with SSB. Decision of SSB will be final and binding.*

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