EU-India Matchmaking Event

Mr. Dinesh Chand Sharma
Director – Standards & Public Policy (SESEI)

Agenda

- **Project SESEI**
- **World of Standardization**
- **EU Policies/Regulations/Directives in support of sustainability**
  - Implications of regulations such as ESPR, EUDR and CBAM for businesses
- **EU/EFTA-India Relations**
  - EU-India key Partnerships in Clean Energy
- **Standards and compliance**
- **Cluster collaboration**
- **Cross-border value chains**

SESEI: Local Representative of EU Standardisation Bodies in India

SESEI (**S**econded **E**uropean **S**tandardization **E**xpert in **I**ndia) ***is a local face for the European standardization community in India: Dinesh Chand Sharma***

Launched in Jan'13, currently in its sixth phase (Aug'24 to July'27)

Priority Sectors/topics: Aligned with EU-INDIA TTC & Connectivity Partnership

Digitization: Strategic technologies, digital governance, and digital connectivity

- Smart Cities, ITS, Quantum Technologies, Smart Grid/Meter, AI, 5G/6G, Open RAN, M2M/IoT, DECT, Data Privacy, Satellite Communication, Blockchain, Digital Signature, Smart Manufacturing, e-Accessibility, cybersecurity, digital skills and R&I etc.

Green & Clean Technologies:

- Clean Energy, Energy Efficiency (Green ICT), Environment, Circular Economy including Resource Efficiency, Waste Management, Energy storage technologies, **Electric mobility**, Green Hydrogen, Advanced biofuels including R&I etc.

Market access & Other topics of mutual interests:

- Rail, Ropeways, Machinery Safety etc.

www.sesei.eu , www.sesei.in , Monthly Newsletter Subscribe – Europe & India, 5th Indo European Conference on 15th-16th Feb'27 in New Delhi

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World of Standardization

Objective - Avoid duplication of work at Indian, European and International levels with an aim for a identical worldwide standards

"Vienna Agreement" with

Chemistry, Material, Energy, Environment, Transport, Construction, Services, eMobility etc

"Frankfurt Agreement" with

Electricity, Electro-technical

Founding member of ISO and working with IEC since 1911

MoU for telecommunications sector (ITU-T), Agreement on radio-communication sector (ITU-R)

Information & Communication Technologies (ICT)

DoT/TEC are member of ITU-T and WPC for ITU-R

Founding Partner to 3GPP & oneM2M

Organisational Partner of 3GPP and Partner Type 1 of oneM2M

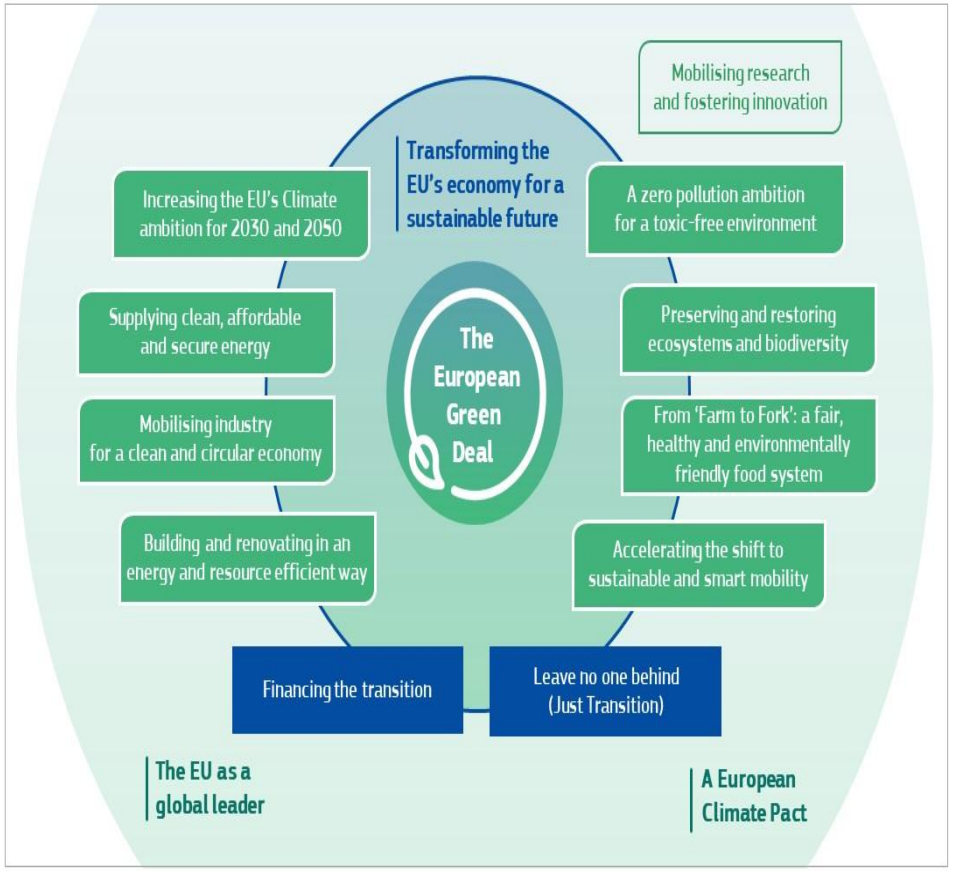
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EU Policies/Regulations/Directives in support of sustainability

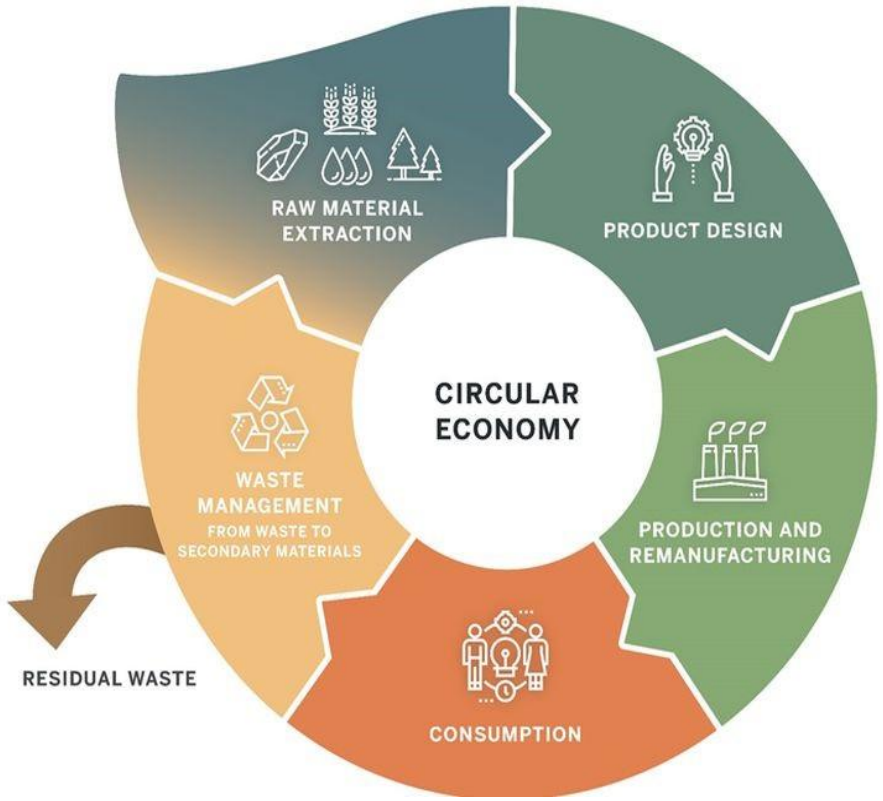
A European Green Deal (EGD)

- In December 2019, European Commission unveiled its European Green Deal (EGD), an ambitious plan to transform the EU's economy into a fair, **sustainable**, and prosperous one.
  - no net emissions of greenhouse gases by 2050
  - economic growth decoupled from resource use
  - no person and no place left behind
- EGD provides an action plan, to boost efficient use of resources by moving to a clean, circular economy and to restore biodiversity and cut pollution.
  - It outlines investments needed and financing tools available and explains how to ensure a just and inclusive transition.
  - It covers all sectors of economy, notably transport, energy, agriculture, buildings, and industries such as steel, cement, ICT, textiles and chemicals.
- It sets important policy goals to further advance the **sustainable transition** of packaging value chain, which include:
  - Ensuring that all packaging in EU market is reusable or recyclable in an economically viable manner by 2030.
  - Defining measures to reduce packaging waste.
  - Promoting a robust Single Market for secondary raw material to increase recycling.
- Commission has estimated that achieving 2030 climate and energy targets will require EUR 260 billion of additional annual investment, about 1.5% of 2018 GDP.



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Circular economy action plan (CEAP)



- European Commission released its new Circular Economy Action Plan (CEAP) in support of **European Green Deal** on 11 March 2020.
  - One of main building blocks of European Green Deal, Europe's new agenda for **sustainable** growth.
- 35 actions along the entire life cycle of products, to:
  - make **sustainable products** the norm in the EU
  - **empower** consumers and public buyers
  - **focus also on key product value chains**: electronics and ICT, batteries and vehicles, **packaging, plastics**, textiles, construction and buildings, food, water and nutrients
  - ensure **less waste**
  - make circularity work for **people, regions** and **cities**
  - **lead global efforts** on circular economy
- In 2023, Commission revised circular economy monitoring framework
  - It supports EU's circular economy and climate neutrality ambitions under European Green Deal.

Ecodesign for Sustainable Products Regulation [ESPR]

- Ecodesign for Sustainable Products Regulation (ESPR), came into force on 18 July 2024, is cornerstone of Commission's approach to more **environmentally sustainable and circular products**.

- ESPR is part of a package of measures that are central to achieving the objectives of 2020 Circular Economy Action Plan.
    - They will contribute to helping the EU reach its environmental and climate goals, doubling its circularity rate of material use and to achieving its energy efficiency targets by 2030.

- **Key features:**
    - Scope extension beyond energy-related products (with some exceptions, such as food and feed, as defined in Regulation 178/2002),
    - New requirements (track substances of concern)
    - Allows for 'horizontal' ecodesign requirements (e.g. electronic boards in appliances)
    - Increased focus on product information (**digital product passport** developed via standards)
    - Incentivising best performing products (ESPR labels – by delegated act for products not having energy label)
    - Development of standards by international and European standardisation organisations, including on the material efficiency of energy-related products.

More information>>

What is already clear

ESPR is a framework; obligations become product-specific through measures and delegated acts.

Ecodesign for Sustainable Products and Energy Labelling Working Plan 2025-2030

Priority groups include steel, aluminium, textiles, furniture, tyres, detergents, paints, lubricants, chemicals and energy-related / ICT products.

European Product Registry for Energy Labelling (EPREL)

A website providing public information on products covered by energy labels

Business action

Map the product portfolio to EU measures; assign data owners; design a DPP-compatible evidence process.

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DPP: Milestones

- The EU Harmonized standards by CEN-CENELEC adopted in July 2026
- DPP registry launched in July 2026
- Certain types of big batteries are the first product category for which DPP becomes mandatory in February 2027
- Secondary DPP legislation on DPP service providers, DPP digital credentials and Unique identifiers planned for 2027
- DPP introduced for a wide range of other products, specified in ESPR Work Programme or standalone legislation, from the end of 2027 onwards
- The opportunity to integrate horizontal DPP provisions in the revision of the Europe Product Act is being analysed. A Commission proposal is planned by end of 2026

Carbon Border Adjustment Mechanism (CBAM)

- EU's carbon-pricing mechanism for imported goods
- Prevent carbon leakage and promote cleaner industrial production by aligning the carbon cost of imports with EU climate policies
- Transitional phase (2023-2025): As of 1 January 2026, CBAM is applicable under its definitive regime.
- **Covered sectors:** Cement, Iron and steel, Aluminium, Fertilisers, Electricity and hydrogen
- **Compliance requirements**: EU importers must meet applicable authorisation and reporting obligations, with CBAM certificates required for embedded emissions under the definitive regime.
- **CBAM Registry** supports the submission of declarations, the management of certificates, and the monitoring of compliance by competent authorities.
- Price of **CBAM certificates** is calculated based on **EU Emissions Trading System (EU ETS)** allowance auction prices and is published regularly in accordance with the applicable rules.

Implications for Indian businesses: Greater emphasis on measuring, documenting and verifying product-level greenhouse gas emissions; potential cost and competitiveness implications for affected exports.

Opportunities: Low-carbon manufacturing, renewable energy adoption, emissions transparency and improved carbon-data management can strengthen export competitiveness.

CBAM makes carbon emissions an increasingly important factor in EU market access and the competitiveness of Indian exporters.

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EU Deforestation Regulation (EUDR)

- Regulation on deforestation-free products entered into force on 29 June 2023.
  - Ensure that relevant products placed on or exported from the EU market do not contribute to deforestation or forest degradation and comply with relevant laws in the country of production
  - **Covered commodities**: palm oil, cattle, soy, coffee, cocoa, timber and rubber as well as derived products (such as beef, furniture, or chocolate).
  - Operators are required to **trace the products** they sell back to the plot of land where they were produced and declare that they have exercised due diligence.
  - Regulation sets a **cut-off date of 31 December 2020**, meaning that only products that have been produced on land that has not been subject to deforestation or forest degradation after 31 December 2020 can be placed or made available on the EU market or exported from the EU.
  - **Timelines:**
    - Large and medium operators: 30 December 2026
    - Micro and small operators: 30 June 2027
    - Micro and small operators already covered by the EU Timber Regulation (EUTR): 30 December 2026

Business implications for Indian exporters

- Map supply chain and sourcing
- Gather reliable origin/geolocation and legality evidence
- Engage suppliers and EU importers early

Opportunities:

- Traceable sustainable sourcing
- Stronger supplier collaboration
- Forest-positive production
- Trusted market access

EU/EFTA - India Relations

- **New Strategic EU-India Agenda towards 2030**

  - ✓ Building on the EU's Joint Communication in 2025 'New Strategic EU-India Agenda', Cooperation on research and innovation is a cross-cutting and integral part of Joint EU-India Comprehensive Strategic Agenda Towards 2030, adopted on 27 January 2026 at 16th EU-India Summit
    - Agenda will strengthen the cooperation on sustainability, technology and innovation, security and defence, connectivity, global issues, and people-to-people cooperation.

- During the summit, India and European Commission have signed and exchanged an **Administrative Arrangement on Advanced Electronic Signatures and Seals.**

- India and European Union concluded negotiations for a comprehensive **Free Trade Agreement (FTA)** on January 27, 2026
  - Expected by early 2027, FTA will reduce or eliminate tariffs on 99.5% of EU tariff lines and 92.1% of India's, covering 97.5% of trade value.

- **Trade Technology Council (TTC)** set up in February 2023

  - ✓ **Strategic Technologies** : Quantum and High-performance Computing, Trustworthy Artificial Intelligence, Semiconductor sector, Digital skills, 5G , IoT and enhance interoperability of respective digital public infrastructure.
  - ✓ **Green & Clean Energy Technologies**: Waste-water management, Recycling of Batteries for Electrical Vehicles, Standards in the Research Domain (Waste to Green Hydrogen, Marine Plastic Litter and Wastewater, E-Mobility – Circularity aspects of batteries & interoperability of Charging Infrastructure)
  - ✓ **Trade Investment and Resilient Value Chains**: Resilient Value Chains, resolve bilateral market access issues, exchange information on mechanism for FDI screening, address global and multilateral trade issues

- India-EFTA trade talks > Trade and Economic Partnership Agreement (TEPA) signed in March 2024

- At G20 held in India, creation of the India-Middle East-Europe- Economic Corridor was launched: Sep'23
  - EU-India Connectivity Partnership aligned with EU's Global Gateway

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EU-India key Partnerships in Clean Energy

From policy dialogue to technology, investment and market collaboration

- **Overarching frameworks**
  - **EU-India Clean Energy & Climate Partnership (CECP)** established in 2016, Phase III (2026-28); renewable hydrogen, offshore/nearshore wind, regional connectivity, smart grids, energy efficiency, energy diplomacy
  - **EU-India Trade and Technology Council (TTC):** Working Group on Green & Clean Energy Technologies: research, innovation, investment and standards.
- **Green Hydrogen:**
  - **EU-India Task Force on Green Hydrogen**, welcomed at 2026 Summit: cooperation on production, storage, distribution and decarbonising hard-to-abate sectors
  - **India National Green Hydrogen Mission**: domestic scale-up and manufacturing ecosystem
- **Renewables & Wind:**
  - **EU-India Wind Business Summit took place in Sept. 2026**: technology exchange, auction design, investment, R&D and demonstration
  - Cooperation on offshore wind, solar and renewable integration.
- **Circular Economy**
  - India-EU Joint Working Group on Circular Economy
- **Energy Storage & Smart Grids**
  - Prioritise storage, smart grid, electricity markets and regional connectivity.
  - Opportunities in battery energy storage, grid flexibility, integration and standards
- **Finance, Standards & Industry**
  - EU Global Gateway and Team Europe: clean energy investment and technical assistance
  - **TTC** collaboration on standards, research, resilient value chains and business partnerships
  - Potential for EU-India cluster collaboration, pilots and technology transfer

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Where EU–India clean-tech value chains can deepen

Solar & wind

- Modules, inverters and power electronics
- Wind components and offshore supply chains
- Grid integration and power conversion

Cooperation: testing, reliability, recyclability and supplier qualification.

Batteries & storage

- Cells, packs, BMS and thermal management
- Stationary storage and second-life systems
- Critical-material recovery and recycling

Cooperation: safety, performance, lifecycle data and circular design.

Hydrogen & industrial inputs

- Electrolysers, fuel cells and balance-of-plant
- Green hydrogen derivatives and steel value chains
- Low-carbon aluminium and industrial components

Cooperation: emissions measurement, safety and interoperability.

Winning model: combine Indian manufacturing scale and engineering capability with European technology, standards expertise, testing infrastructure and market access.

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Standards and compliance: where friction appears

Product requirements

- Safety
- Performance
- Ecodesign
- Chemical restrictions and
- sector-specific rules

Testing & certification

- Accredited labs
- Rrepeat testing
- Factory audits
- Certification routes and accepted evidence

Data & traceability

- Bills of materials
- Supplier declarations
- Carbon data
- Origin records and
- DPP-related information

Market surveillance

- Correct marking
- Technical file
- Importer responsibilities
- Post-market monitoring and change control.

A certificate is not a universal passport: confirm the applicable EU legislation, harmonised standards, conformity route and the role of each economic operator.

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Clean technologies: shared challenges, practical standards needs

SOLAR + WIND

- Performance and reliability
- Grid connection
- Components
- Installation and maintenance

BATTERIES + STORAGE

- Safety
- Durability and performance
- Transport and end-of-life
- Traceability

HYDROGEN + ELECTRIFICATION

- Equipment safety
- Measurement
- Interfaces
- System integration and operational protocols

POWER ELECTRONICS + GRIDS

- Interoperability
- Power quality
- Cybersecurity
- Testing under real operating conditions

CIRCULARITY + MATERIALS

- Recycled content data
- Product information
- Resource efficiency
- Responsible supply chains

DIGITAL ENABLERS

- Data exchange
- AI assurance where relevant
- Industrial IoT
- Digital product information

Clusters can turn compliance into a shared service

Clusters reduce the cost of learning and help smaller firms move from uncertainty to a repeatable export process.

Regulatory desk

Alerts, scope checks, rule interpretation

Supplier network

Traceability, carbon data, qualified suppliers

EU–India Cluster Hub

Test & certification

Lab access, pre-compliance, shared test plans

Market connections

Buyer briefings, pilot projects, partner search

Clusters should not replace regulators or notified bodies—they should make requirements understandable and access to credible expertise easier.

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A new European mindset for new markets

FROM THIS…

“How do we enter this market?”

↓

TO THIS…

“How do we build this market together?”



Dinesh Chand Sharma

(Seconded European Standardization Expert in India)

Director – Standardization & Public Policy

AltF, 2ND Floor (TR-211 && 214), 101

Ishwar Nagar, Okhla, New Delhi 110044

Mobile: +91 9810079461

dinesh.chand.sharma@sesei.eu

www.sesei.eu ⇔ www.sesei.in

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