At a Glance

CONSTRUCTION AND DEMOLITION WASTE

Construction and demolition (C&D) waste is debris or inert waste from construction, renovation, and demolition of structures such as buildings, roads, and bridges.

THE CRISIS

- The booming construction industry, expected to develop about 104 billion sq ft of land by 2030. Add to that waste created by floods and earthquakes.
- The lack of a systematic database and official data creates serious problems for debris collection and treatment.
- The changes to the Bureau of Indian Standards (BIS) regarding codes that permit the use of recycled building components are yet to be implemented.
- Taxes on recycled C&D products increase their cost relative to virgin products.
**THE LAWS**

- **The ‘Construction and Demolition Waste Management Rules, 2016’** issued by the Union Ministry of Environment, Forests and Climate Change defines stakeholder responsibilities, and criteria for processing and recycling facilities.

- **Some cities have their own by-laws.** The Municipal Corporation of Greater Mumbai has issued guidelines as well as set up a helpline for waste collection at a nominal fee.

**GLOBAL BEST PRACTICES**

- **C&D waste management as part of Low Carbon Green Growth Strategies.**

- **Laws** for step-by-step demolition and utilisation of recycled aggregates.

- **Separate building codes** for various recycled aggregates and road pavements.

**LAYING THE FOUNDATION**

- **The BIS is developing standard guidelines for construction project management.**

- **Urban local bodies in Delhi, Pune and Mumbai plan to set up C&D waste recycling facilities.**

- **A school building in Rajkot and the IRRAD building in Gurgaon utilise C&D waste innovatively in their construction.**

**GOING FORWARD**

- **Fast track the formation of BIS codes on recycled material.**

- **Certify** recycled C&D waste products.

**BUILDING THE FUTURE**

- **Reusing and recycling C&D waste:**

  - **Conserves landfill space.**
  
  - **Reduces the carbon footprint of the construction industry.**
  
  - **Reduces the millions of tonnes of aggregate shortage.**

  - **Provides cheaper alternatives to mined and excavated resources.**

- **Promote the use of alternative construction material**

- **Include recycled C&D waste products** in the Central Public Works Department’s (CPWD) Schedule of Rates (SOR)

- **Promote construction management practices** to minimise waste

- **Introduce tax policies** to minimise waste and prevent unsafe disposal.

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**BURIED IN RUBBLE**

- Waste daily in India: 30,000 MT

- Daily in Delhi: 3,000 MT

- Daily in Mumbai: 2,500 MT

- Waste generated by new construction: 40–60 kg/sqm

- By demolition, renovation: 300–500 kg/sqm

- By building repairs: 40–50 kg/sqm

**Standard building construction specifications** that recommend greater use of recycled materials.

**A construction waste charge** on developers to reduce disposal at landfills and subsidise waste recycling centres.

**Standards for Aggregates** that focus on fitness of use and do not discriminate between resources.

Recycling waste concrete, asphalt and sludge for **road construction**, and extensive use of recycled products in **non-structural frameworks**.

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238, Sidhartha Enclave, New Delhi - 110014, India
T: +91-11-46574171/72/73, F: +91-11-46574174
E: info@chintan-india.org