

# High Strength Valorized Paver Blocks Using Granite Waste

## Technology in Brief:

Valorized paver blocks incorporating granite waste are engineered concrete paving units wherein granite cutting, polishing, or crushing residues (such as powder, sludge, or crusher dust) are utilized as partial replacements or complete substitutes for conventional fine and coarse aggregates. These materials can be designed to attain compressive strengths corresponding to M25–M50 grade performance, offering a balance of structural integrity, abrasion resistance, and low water absorption. Optimized mix proportions enable their application in pedestrian zones, light- to Very heavy-traffic pavements, industrial yards, and landscaping works. Empirical studies have demonstrated that controlled incorporation of granite waste significantly enhances mechanical strength and durability properties while reducing production costs and environmental impacts through effective waste valorization and resource conservation.

## Salient Features/Advantages:

- High volume utilization of Waste
- Enhanced Durability and Performance
- Optimized Composite Mix Design
- Innovation in Sustainable Construction
- Employment Generation



<b>Properties &amp; Standards</b>	<b>IS: 15658</b>
<b>End Product(s)</b>	High Strength Valorized Paver Blocks
<b>License/Commercialization</b>	Technical know-how is ready for commercialization.
<b>TRL</b>	TRL 7
<b>Environmental Impact</b>	<ul style="list-style-type: none"> <li>• Employment Generation</li> <li>• Sustainable Construction</li> <li>• Waste utilization</li> </ul>