

Lecture 2.9: workability, factors affecting workability, Effect of water cement ratio, adj...

Concrete Technology (DI04006011)

Civil Engineering Department

Lecture Agenda

- 1. workability, factors affecting workability, Effect of water cement ratio, adjustments of materials to avoid segregation and bleeding , methods of Measurement of workability as per BIS - slump test, compaction factor test, flow table test, vee bee test .
- 2. Summary and Q&A

2.2 workability, factors affecting workabili...

- Workability: The ease with which concrete can be mixed, transported, placed, and compacted.
- Factors affecting: Water content, mix proportions, aggregate size/shape/texture, use of admixtures.
- Segregation: Separation of coarse aggregate from the mortar. Bleeding: Water rising to the surface.
- Slump Test: Most common field test; measures the subsidence of a concrete cone.
- Compaction Factor & Vee-Bee Test: Used in labs for low workability or stiff concrete mixes.

Summary

- Recap of the specific material properties and methods discussed.
- Always refer back to the standard IS codes for parameter limits.