

Faculty of Engineering & Technology

Strength and Technology of Materials 2

Information:

Course Code: SCM 312 Level: Undergraduate Course Hours: 3.00- Hours

Department : Department of Structural Engineering & Construction Management

Instructor Information :		
Title	Name	Office hours
Professor	Osama Abdel Ghafour Ahmad Ahmed Hodhod	
Teaching Assistant	Ahmed Taher Abdelhamed Mohamed Yousef	

Description:

Concrete technology: mix design, properties of fresh and hardened concrete, dimensional changes, concrete manufacturing under severe weathering conditions, durability of concrete in aggressive environments, types and repair of cracks, fire resistance, repairing materials, special types.

Mechanics of engineering materials: stress/strain relations, Mohros strain circle, experimental mechanics, mechanisms and theories of failure, strength and behavior of materials under dynamic and repeated loading, high temperature, and creep, Technical Inspection and quality control: technical reports, statistical methods, in-situ testing, non-destructive testing.