DESIGN AND CONSTRUCTION OF EXCAVATION SUPPORT SYSTEMS

Code	Credit Hours
MinE-813	3-0

Course Descriptions.

Introduction to Support of Excavation (SOE), Types of SOE, Planning Consideration and Selection of SOE, Design Consideration and parameters of SOE, Risk Management in SOE, Construction Management with respect to SOE

Textbooks:

1. Alan Macnab, (2002), Earth Retention Systems Handbook

References Books:

1. Robert Ratay, (2012) Temporary Structures in Construction, Third Edition

Pre-Requisites:

Nil

ASSESSMENT SYSTEM FOR THEORY

Quizzes	15%
Assignment	5%
Mid Terms	30%
ESE	50%

Teaching Plan

Week No	Topics	Learning Outcomes
1	Introduction	CourseOutline,objectives,teachingplan,assessmentmethod, conceptsreview.
2-3	Introduction to Support of Excavation (SOE)	Introduction to various support system applicable in underground mine excavation and tunneling.
4-6	Types of Support of Excavation (SOE)	Various types of support excavation techniques.
6-8	Planning Consideration and	Various import factors to be considered during planning phase of SOE and selection of appropriate SOE in particular

	Selection of SOE	case.
9	**MID TERM EXAM**	
10-12	Design Consideration and parameters of SOE	A detail description of various consideration during designing of SOE,
13-15	Risk Management in SOE	Risk Management in SOE
15-17	Construction Management with respect to SOE	Construction Management with respect to SOE
18	**END SEMESTER EXAM**	