

Mission of the Department of Mining Engineering

“To produce highly qualified, well rounded mining professionals leading the mining industry for development of society through knowledge based economy and extending innovation and research competitiveness at national and international levels”.

B.Sc. Mining Engineering PEOs

Mining Engineering program at the University of Engineering and Technology Peshawar aims to produce graduates who possess/exhibit the following capabilities after four years of graduation.

PEO 1: Demonstrate skills to solve problems of Mining and Mineral based industries

PEO 2: Perform in Management and Leadership roles for Growth in Mining and Mineral industry.

PEO 3: Apply Engineering Knowledge and Skills for Development of Society

PEO 4: Pursue Higher Studies, Demonstrating actively involvement in life-long learning

Graduate Attribute Profiles (GAs)/ Program Learning Outcomes (PLOs)

GA1 Engineering Knowledge

An ability to apply knowledge of mathematics, science, engineering fundamentals and an engineering specialization to the solution of complex engineering problems.

GA2 Problem Analysis

An ability to identify, formulate, research literature, and analyze complex engineering problems reaching substantiated conclusions using first principles of mathematics, natural sciences and engineering sciences.

GA3 Design / Development of Solutions

An ability to design solutions for complex engineering problems and design systems, components or processes that meet specified needs with appropriate consideration for public health and safety, cultural, societal, and environmental considerations.

GA4 Investigation

An ability to investigate complex engineering problems in a methodical way including literature survey, design and conduct of experiments, analysis and interpretation of experimental data, and synthesis of information to derive valid conclusions.

GA5 Modern Tool Usage

An ability to create, select and apply appropriate techniques, resources, and modern engineering and IT tools, including prediction and modelling, to complex engineering activities, with an understanding of the limitations.

GA6 The Engineer and Society

An ability to apply reasoning informed by contextual knowledge to assess societal, health, safety, legal and cultural issues and the consequent responsibilities relevant to professional engineering practice and solution to complex engineering problems.

GA7 Environment and Sustainability

An ability to understand the impact of professional engineering solutions in societal and environmental contexts and demonstrate knowledge of and need for sustainable development.

GA8 Ethics

Apply ethical principles and commit to professional ethics and responsibilities and norms of engineering practice.

GA9 Individual and Teamwork

An ability to work effectively, as an individual or in a team, on multifaceted and /or multidisciplinary settings.

GA10 Communication

An ability to communicate effectively, orally as well as in writing, on complex engineering activities with the engineering community and with society at large, such as being able to comprehend and write effective reports and design documentation, make effective presentations, and give and receive clear instructions.

GA11 Project Management

An ability to demonstrate management skills and apply engineering principles to one's own work, as a member and/or leader in a team, to manage projects in a multidisciplinary environment.

GA12 Lifelong Learning

An ability to recognize importance of and pursue lifelong learning in the broader context of innovation and technological developments.