Bachelor of Science in Civil Engineering

Program Student Learning Outcomes

Graduates of the UAA civil engineering program will have an ability to:

• Identify, formulate, and solve complex civil engineering problems by applying principles of engineering, science, and mathematics;

• Apply civil engineering design to produce solutions that meet specified needs with consideration of public health, safety, and welfare, as well as cold regions, global, cultural, social, environmental, and economic factors;

• Communicate effectively with a range of audiences;

• Recognize ethical and professional responsibilities in engineering situations and make informed judgments, which must consider the impact of engineering solutions in global, economic, environmental, and societal contexts;

• Function effectively on a team whose members together provide leadership, create a collaborative and inclusive environment, establish goals, plan tasks, and meet objectives;

• Develop and conduct appropriate experimentation, analyze and interpret data, and use engineering judgment to draw conclusions; and

• Acquire and apply new knowledge as needed, using appropriate learning strategies.