

# BCN: BUILDING CONSTRUCTION

Courses	Credit(s)	Contact	Lab
BCN 1272. CONTSTRUCTION BLUEPRINT READING. CONTSTRUCTION BLUEPRINT READING Study of various types of drawings and documents used in construction industry. Includes such topics as terminology, abbreviations, symbols, notations, scales and dimensions, meaning of lines, drawing history, technical and orthographic projection, types of construction and trade information.	3	3	0
BCN 1303C. BUILDING INFORMATION MODELING (REVIT W/ DYNAMO). BUILDING INFORMATION MODELING (REVIT W/ DYNAMO) Prerequisite: ETD 1103C or ETD 1320C or department approval This course will prepare students with the Building Information Modeling (BIM) skills needed to develop digital designs using REVIT software with Dynamo. Students will learn to create and modify various building elements, envelope systems, and detail features to create a complex model and produce the drawings needed for construction. Emphasis will focus on navigation and analysis of 3D models with Dynamo visual programming tools to expedite the design process. Students will also utilize software tools to discover discrepancies and make changes to ensure a smoother construction process for those performing the work. (Special Fee: \$23.00).	3	2	2
BCN 2405. STATICS AND STRENGTH OF MATERIALS. STATICS AND STRENGTH OF MATERIALS Prerequisite: MTB 2321 or MAC 1114 or higher math or departmental approval. Covers principles of statics, structural mechanics and effects of loads and loading on building elements and frames. Some major areas include materials, stress and deformation, properties of sections, gravity loads, shear and bending in beams, and stresses in columns.	3	4	0
BCN 2563. BUILDING SYSTEMS & MANAGEMENT. BUILDING SYSTEMS & MANAGEMENT It is recommended that students take ETC 1251C before taking this course. Survey of design, installation and management of various plumbing, mechanical and electrical systems used in buildings. Concepts covered include heat loss and heat gain, comfort control, psychrometric charts, water systems, system installation and coordination, illumination and other selected topics.	3	3	0
BCN 2721C. CONSTRUCTION SCHEDULING AND MANAGEMENT. CONSTRUCTION SCHEDULING AND MANAGEMENT Prerequisite: BCT 2770C Survey of important points to be considered in the management and scheduling of construction projects. Covers development of CPM (Critical Path Method) diagram with emphasis on planning, scheduling and managing construction activities, calculating time durations, sequence of operations, follow-up methods, project control and integration of calendar dates to plan. (Special Fee: \$28.00).	3	3	1

BCN 2942. INTERNSHIP IN CONSTRUCTION AND CIVIL ENGINEERING TECHNOLOGY. 1-4 variable

INTERNSHIP IN CONSTRUCTION AND CIVIL ENGINEERING TECHNOLOGY Prerequisites: Satisfactory completion of all mandated courses in Reading, Mathematics, English, and English for Academic Purposes; a minimum 2.0 institutional or overall GPA; and 12 credits, including ETC 1251 and TAR 1120C. The Program Director/Program Chair/Program Coordinator or Internship Placement Office has the discretion to provide override approval as it relates to the waiver of required program/discipline-related courses. This course is a planned work-based experience that provides students with supervised career exploration activities and/ or practical experiences. Each earned credit of internship requires a minimum of 80 clock hours of work. Multiple credit course. May be repeated for credit, but grade forgiveness cannot be applied. (Internship Fee: \$10.00).