



Architecture & Construction

Principles of Architecture

TSDS PEIMS Code: 13004210 (PRINARC)

Grade Placement: 9–12

Credit: 1

Prerequisite: None.

Principles of Architecture provides an overview to the various fields of architecture, interior design, and construction management. Achieving proficiency in decision making and problem solving is an essential skill for career planning and lifelong learning. Students use self-knowledge, education, and career information to set and achieve realistic career and educational goals. Job specific training can be provided through training modules that identify career goals in trade and industry areas. Classroom studies include topics such as safety, work ethics, communication, information technology applications, systems, health, environment, leadership, teamwork, ethical and legal responsibility, employability, and career development and include skills such as problem solving, critical thinking, and reading technical drawings.

Architectural Design I

TSDS PEIMS Code: 13004600 (ARCHDSN1)

Grade Placement: 10–12

Credit: 1

Prerequisites: Algebra I and English I.

Recommended Prerequisites: Geometry, Principles of Architecture, and Principles of Construction.

In Architectural Design I, students will gain knowledge and skills needed to enter a career in architecture or construction or prepare a foundation toward a post-secondary degree in architecture, construction science, drafting, interior design, or landscape architecture. Architectural Design I includes the knowledge of the design, design history, techniques, and tools related to the production of drawings, renderings, and scaled models for nonresidential or residential architectural purposes.

Architectural Design II

TSDS PEIMS Code: 13004700 (ARCHDSN2)

Grade Placement: 11–12

Credit: 2

Prerequisites: Architectural Design I or Advanced Interior Design and Geometry.

Recommended Prerequisites: Principles of Architecture and Principles of Construction.

In Architectural Design II, students will gain advanced knowledge and skills needed to enter a career in architecture or construction or prepare a foundation toward a postsecondary degree in architecture, construction science, drafting, interior design, or landscape architecture.

Architectural Design II includes the advanced knowledge of the design, design history, techniques, and tools related to the production of drawings, renderings, and scaled models for nonresidential or residential architectural purposes

Practicum in Architectural Design

TSDS PEIMS Code: 13004800 (First Time Taken) (PRACADS1)

13004810 (Second Time Taken) (PRACADS2)

Grade Placement: 12 Credit: 2

Prerequisite: Architectural Design II.

Practicum in Architectural Design is an occupationally specific course designed to provide technical instruction in architectural design. Safety and career opportunities are included in addition to work ethics and architectural design study.

Principles of Construction

TSDS PEIMS Code: 13004220 (PRINCON)

Grade Placement: 9–12

Credit: 1

Prerequisite: None.

Principles of Construction is intended to provide an introduction and lay a solid foundation for those students entering the construction or craft skilled areas. The course provides a strong knowledge of construction safety, construction mathematics, and common hand and power tools. For safety and liability considerations, limiting course enrollment to 15 students is recommended. This course also provides communication and occupation skills to assist the student in obtaining and maintaining employment.

Construction Technology I

TSDS PEIMS Code: 13005100 (CONTECH1)

Grade Placement: 10–12

Credit: 2

Prerequisite: None.

Recommended Prerequisite: Principles of Construction or Principles of Architecture.

In Construction Technology I, students will gain knowledge and skills needed to enter the workforce as carpenters or building maintenance supervisors or to prepare for a postsecondary degree in construction management, architecture, or engineering. Students will acquire knowledge and skills in safety, tool usage, building materials, codes, and framing. For safety and liability considerations, limiting course enrollment to 15 students is recommended.

Construction Technology II

TSDS PEIMS Code: 13005200 (CONTECH2)

Grade Placement: 11–12

Credit: 2

Prerequisite: Construction Technology I.

In Construction Technology II, students will gain advanced knowledge and skills needed to enter the workforce as carpenters, building maintenance technicians, or supervisors or to prepare for a postsecondary degree in construction management, architecture, or engineering. Students will build on the knowledge base from Construction Technology I and are introduced to exterior and interior finish out skills. For safety and liability considerations, limiting course enrollment to 15 students is recommended.

Practicum in Construction Technology

TSDS PEIMS Code: 13005250 (First Time Taken) (PRACCT1)

Grade Placement: 12 Credit: 2

Prerequisite: Construction Technology II; Building Maintenance Technology II; Electrical Technology II; Heating, Ventilation, and Air Conditioning (HVAC) and Refrigeration Technology II; Plumbing Technology I; or Mill and Cabinetmaking Technology.

In Practicum in Construction Technology, students will be challenged with the application of knowledge and skills gained in previous construction-related coursework. In many cases students will be allowed to work at a job (paid or unpaid) outside of school or be involved in local projects the school has approved for this class.