

APPT 135B: P-301B PLUMBING CODES

Foothill College Course Outline of Record

Heading	Value
Effective Term:	Summer 2021
Units:	4.5
Hours:	54 lecture per quarter (54 total per quarter)
Prerequisite:	Per California Code of Regulations, this course is limited to students admitted to the Plumbing Technology Apprenticeship Program.
Advisory:	Not open to students with credit in APPR 119.
Degree & Credit Status:	Degree-Applicable Credit Course
Foothill GE:	Non-GE
Transferable:	None
Grade Type:	Letter Grade (Request for Pass/No Pass)
Repeatability:	Not Repeatable

Student Learning Outcomes

- A successful student will be able to define the term as it pertains to the UPC.
- A successful student will be able to define the term "fixture unit".
- A successful student will be able to demonstrate knowledge of code requirements for clean-outs.

Description

Learn and demonstrate the procedures for coordinating the testing and inspection of plumbing systems and applicable codes that a plumbing systems test must meet. Knowledge of general regulations, including accessibility and ADA requirements, will also be discussed.

Course Objectives

The student will be able to:

- Define terms used in the Uniform Plumbing Code.
- Demonstrate ability to locate and apply applicable code sections.
- Demonstrate ability to properly size drain/waste/vent potable water and fuel gas systems.

Course Content

- Define terms used in Uniform Plumbing Code
 - National, state and local standards and codes
 - Administration and definition of terms
 - Various types of plumbing system tests
 - Testing and inspection of plumbing systems
- Demonstrate ability to locate and apply applicable code sections
 - UPC, Chapter 1, Administration
 - UPC, Chapter 2, Definitions
 - UPC, Chapter 3, General Regulations
 - UPC, Chapter 4, Plumbing Fixtures and Fixture Fittings, ADA requirements

- UPC, Chapter 5, Water Heaters as presented in Chapter 5 of the UPC
 - UPC, Chapter 6, Water Supply and Distribution
 - UPC, Chapter 7, Sanitary Drainage
 - UPC, Chapter 8, Indirect Wastes
 - UPC, Chapter 9, Vents
 - UPC, Chapter 10, Traps and Interceptors
 - UPC, Chapter 11, Storm Drainage
 - UPC, Chapter 12, Fuel Piping
 - UPC, Chapter 13, Health Care Facilities
 - UPC, Chapter 14, Referenced Standards
 - UPC, Chapter 15, Firestop Protection
- C. Demonstrate ability to properly size drain/waste and vent, potable water and fuel gas piping systems
- Calculate sanitary drainage pipe sizing
 - Calculate sanitary vent pipe sizing
 - Methods and procedures for potable water pipe sizing
 - Methods and procedures for sizing fuel gas piping

Lab Content

Not applicable.

Special Facilities and/or Equipment

Laboratory with plumbing and piping equipment.

Method(s) of Evaluation

Results of written exercises and final examination
Satisfactory completion of hands-on projects
Maintenance of a student's workbook with questions drawn from text

Method(s) of Instruction

Lecture
Group Discussion
Demonstration

Representative Text(s) and Other Materials

International Association of Plumbing and Mechanical Officials. [Uniform Plumbing Code](#). 2015.

International Association of Plumbing and Mechanical Officials. [Uniform Plumbing Code Study Guide](#). 2015.

NOTE: We will adopt the next edition of each text, as it is published.

Types and/or Examples of Required Reading, Writing, and Outside of Class Assignments

- Readings from assigned textbook, [Uniform Plumbing Code](#), Chapter 3
 - General Regulations, Section 301.0, Materials - Standards and Alternates
- Writing assignments
 - Make a schematic drawing of a basic natural gas piping system
 - Describe properties and indicate pipe size of each point in the system

Discipline(s)

Plumbing