## 2020-2021 Apprenticeship Program

Plumbing Level 2 Course Outline

This is the second year, of four, in the Registered Plumbing Apprenticeship program. This level is a continuation of Plumbing Level 1 going more in depth in most areas. Safety continues as a critical part of the working trade. Code is studied more in depth and DWV moves into larger systems with more code references. Math and geometry are used for piping layout of various systems and students begin to calculate flow rates and velocity of fluids in the system. Students learn about various hydronic heating systems and the requirements for installation.

This year will specifically cover the following topics:

- Basic Electricity
- Drains
  - Installing Roof, Floor, and Area Drains
- Fixtures
  - o Installation
  - Types of Fixtures
- Heating Systems (PS 2 Heating System Specialist)
  - Fuel Gas & Fuel Oil Systems
  - Hydronic Heat
  - Steam Systems
- Math (Plumbing Math Year 2)
- Piping
  - Drain, Waste & Vent (DWV) Piping
    - ADA Compliance
    - Installation
    - Isometric Drawings
    - Light Commercial Blueprint Drawings
    - Residential Blueprint Drawings
    - Sizing
  - Water Supply Piping
    - Installation
    - Testing
- Reading Commercial Drawings
- Structural Penetrations, Insulation & Fire Stopping
- Valves
  - o Installation
  - Types of Valves
- Water Heaters (PS 1 Water Heater Specialist)
  - o Installation