

OALCF Tasks for the Apprenticeship Goal Path: Prepared for the Project, *Developing Best Practices for Increasing, Supporting and Retaining Apprentices in Northern Ontario (2014)*

OALCF Task Cover Sheet

Task Title: Understand and Locate Plumbing Information

Learner Name:	
Date Started:	Date Completed:
Successful Completion: Yes___ No___	
Goal Path: Employment___ Apprenticeship <input checked="" type="checkbox"/> Secondary School___ Post Secondary___ Independence___	
Task Description: Understand and locate information about various plumbing parts.	
Competency: A: Find and Use Information B: Communicate Ideas and Information D: Digital Technology	Task Group(s): A1: Read continuous text B2: Write continuous text D2: Digital Technology
Level Indicators: A1.2: Read texts to locate and connect ideas and information B2.2: Write texts to explain and describe information and ideas D.2: Perform well-defined, multi-step digital tasks	
Performance Descriptors: see chart on last page	
Materials Required: <ul style="list-style-type: none"> • Pen and Paper • Computer with Internet access • Attached document - Types of Household Plumbing Pipes 	

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Learner Information and Tasks

Plumbers need to understand the uses of various pipes when building or replacing existing plumbing fixtures. Read the document **Types of Household Plumbing Pipes**.

Task 1: List two types of pipes that are used for both water supply and drainage.

Task 2: Which type of pipe is not used in residential because of the cost?

Task 3: The following pipes are usually referred to by their acronyms. Use the internet to locate and list their full names.

- a. ABS
- b. PVC
- c. CPVC
- d. PEX

Task 4: Explain the purpose of the DWV – Drain-waste-vent system. Use the internet to locate this information.

Task 5: Explain what is meant by the durability of PVC. Use the internet to locate this information.

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Types of Household Plumbing Pipes

It is important to understand that there are pipes used for different purposes. These include pipes used for drainage and pipes used for water supply. Below is a list of the pipes used for both.

Water Supply	Drainage
<ul style="list-style-type: none"> • Copper pipe • PVC • CPVC • PEX • Galvanized Pipe 	<ul style="list-style-type: none"> • ABS • PVC • Cast Iron • Galvanized Pipe • Copper Pipe DWV

Copper pipe - Used for decades as the most common water supply pipe. Copper pipe and tubing comes in a variety of sizes and types.

PVC (Water Supply) - Used as a cold water supply pipe in many countries around the world because of the price but lacks long term durability.

PVC (Drainage) - A hard walled white plastic drain pipe used throughout the world.

CPVC - Used as a hot/cold water supply pipe in many countries around the world because of the price but lacks long term durability.

PEX - Is cross-linked polyethylene tubing and has become the standard in new home construction. PEX comes in a variety of colors and is used for plumbing and heating purposes.

Galvanized pipe (Water Supply) - May still be found in many homes but is seldom used anymore because of water discoloration, cost and difficult repairs.

Galvanized pipe (Drainage) - Common in many older homes and prone to maintenance. Easily discernible by the silver to whitish color and threaded fittings.

ABS - - A hard walled black plastic drain pipe used extensively in North America.

Cast Iron - A very common drain pipe in older homes but is no longer used in residential plumbing.

Copper Pipe DWV - A hard walled copper drain, waste and vent pipe (DWV) that was commonly used in older homes. Still commonly used in commercial and industrial construction, but too pricey for residential.

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Answer Sheet

Plumbers need to understand the uses of various pipes when building or replacing existing plumbing fixtures.

Task 1: List two types of pipes that are used for both water supply and drainage.

PVC and Galvanized Pipe

Task 2: Which type of pipe is not used in residential because of the cost?

Copper pipe DWV

Task 3: Use the internet to locate the names of the following pipes commonly referred to using their acronyms.

ABS - Acrylonitrile butadiene styrene

PVC - Polyvinyl chloride

CPVC - Chlorinated polyvinyl chloride

PEX - Cross-linked polyethylene

Task 4: In your own words explain the purpose of DWV - Drain, Waste and Vent in plumbing. Use the internet to locate the information.

The Drain-waste-vent is part of the system that removes sewage and greywater from a building and regulates air pressure in the waste system pipes, this ensures that flow occurs.
Information has been sourced through Wikipedia

Task 5: Explain what is meant by the durability of PVC. Use the internet to locate this information.
PVC's greatest advantage is that it's easy to work with and can be installed quickly. It does not conduct electricity, and it doesn't lose hot water heat as easily as copper does. Unlike copper or galvanized pipes, it will not corrode when exposed to aggressive water, making PVC extremely durable for long-term use.

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Task Title: Understand and Locate Plumbing Information

Performance Descriptors		Needs Work	Completes task with support from practitioner	Completes task independently
A1.2	<ul style="list-style-type: none"> scans text to locate information 			
	<ul style="list-style-type: none"> locates multiple pieces of information in simple texts 			
	<ul style="list-style-type: none"> makes low-level inferences 			
	<ul style="list-style-type: none"> makes connections between sentences and between paragraphs in a single text 			
	<ul style="list-style-type: none"> reads more complex texts to locate a single piece of information 			
B2.2	<ul style="list-style-type: none"> writes texts to explain and describe 			
	<ul style="list-style-type: none"> conveys intended meaning on familiar topics for a limited range of purposes and audiences 			
	<ul style="list-style-type: none"> uses limited range of vocabulary and punctuation appropriate to the task 			
	<ul style="list-style-type: none"> begins to select words and tone appropriate to the task 			
	<ul style="list-style-type: none"> begins to organize writing to communicate effectively 			
D.2	<ul style="list-style-type: none"> selects and follows appropriate steps to complete tasks 			
	<ul style="list-style-type: none"> locates and recognizes functions and commands 			
	<ul style="list-style-type: none"> performs simple searches using keywords (e.g. internet, software help menu) 			

This task: was successfully completed ___ needs to be tried again ___

Learner Comments

Instructor (print)

Learner Signature