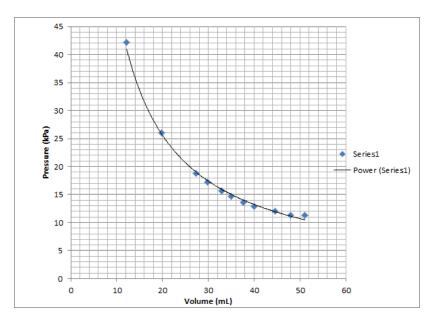
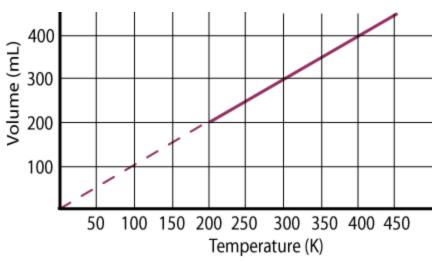
## Review sheet for Fluids, Gas and Pressure quiz

- 1) What is the formula for Pressure?
- 2) What is the Si unit for pressure?
- 3) If you weigh yourself in pounds and measure an area where you're standing in inches, what will be the unit of pressure for this calculation?
- 4) What is the pressure of an Aluminum block with a length of 3.4m and a width of 1.5m and a weight of 673N?
- 5) What is the area of a slab of concrete that exerts a Force of 2400N and a Pressure of 1500Pa on a sidewalk?
- 6) How much Force is exerted by a person pushing a sled of wood with a Pressure of 15000Pa on an area of 30m<sup>2</sup>?
- 7) How many Pa are in 6.5kPa?
- 8) At a constant temperature, if the volume of a gas decreases, its pressure:
- 9) At constant pressure, if the temperature of a gas is increased, the volume:



- 10) What law does this graph show?
- 11) What is the relationship shown in the graph?
- 12) What is the pressure of this gas when the volume is 42mL?

- 13) If the Pressure of this gas 30kPa, what would its volume be?
- 14) Predict the volume of the gas when its Pressure is 10 kPa.
- 15) Use Charles's Law to explain what happens if you heated up the gas inside a balloon.



16) What type of relationship does the graph indicate about gases?

- 17) According to Archimedes principle, if a mass is floating the amount of water displaced will be equal to:
- 18) Explain what a buoyant force is.
- 19) If you step into the ocean, what happens to the water level?
- 20) What law actually describes this phenomena?
- 21) What causes a plane to lift off the ground?
- 22) Fast moving fluids have \_\_\_\_\_ pressure than slower moving fluids.
- 23) The best way to avoid falling through thin ice is to...