

## Term 1 Final Revision

### Chapter 1 Final Questions

#### Multiple Choice

1. The Celsius temperature at absolute zero is equal to\_\_\_\_\_.  
A-  $-100^{\circ}\text{C}$   
B-  $100^{\circ}\text{C}$   
C-  $273^{\circ}\text{C}$   
D-  $-273^{\circ}\text{C}$
2. In general, when a solid is heated, it\_\_\_\_\_.  
A- expands with increasing temperature  
B- contracts with increasing temperature  
C- expands with decreasing temperature  
D- contracts with decreasing temperature
3. Which of the following statement(s) is/are true?  
I. Every substance contains heat.  
II. For heat to flow between two substances, they must be at different temperatures.  
III. The internal energy of a substance is equal to the kinetic energy of the molecules in the substance.  
A- I and II only  
B- II and III only  
C- II only
4. A value of  $25^{\circ}\text{C}$  is a measurement of\_\_\_\_\_.  
A- density.  
B- distance.  
C- mass.  
D- Temperature.

5. Potential energy is sometimes called\_\_\_\_\_energy.

- A- stored
- B- moving
- C- still

6. Heat transfer in a swimming pool is\_\_\_\_\_.

- A- Conduction
- B- Convection
- C- Radiation
- D- expansion

7. what can travel through a vacuum.

- A- Sound
- B- Light

8. Which of the following is a measure of the average kinetic energy of the particles in a sample of matter?

- A- chemical kinetics
- B- thermochemistry
- C- reaction rate
- D- temperature

9. Why do hot air balloons rise?

- A- Thermal contraction
- B- Thermal conduction
- C- Thermal radiation
- D- Thermal expansion

10. A heating appliance\_\_\_\_\_.

- A- Converts heat energy into electrical energy
- B- Converts electrical energy into heat energy
- C- Converts electrical energy into mechanical energy
- D- Converts mechanical energy into electrical energy

11. A thermostat is used for\_\_\_\_\_.

- A- Produce heat
- B- Conduct heat
- C- Regulate temperature
- D- Relocate temperature

12. A bimetallic coil is made from how many types of coils?

- A- 1
- B- 2
- C- 3
- D- 4

13. Heat transfer through space is\_\_\_\_\_.

- A- Conduction
- B- Convection
- C- Radiation
- D- expansion

14. Cool air flows\_\_\_\_\_.

- A- Upwards
- B- Downwards
- C- Sideways

15. What turns thermal energy into mechanical energy?

- A- Refrigerator
- B- Heater
- C- Heat engine
- D- Air conditioning

16. Approximately how much of an automobile engine is converted to wasted energy?

- A- 20%
- B- 40%
- C- 60%
- D- 80%

**17.** Thermal energy is the sum of\_\_\_\_\_.

- A- Kinetic energy and gravitational energy
- B- Kinetic energy and potential energy**
- C- Kinetic energy and light energy
- D- Kinetic energy and electrical energy

**18.** Which is the highest temperature?

- A- 0 °C
- B- 53 °F
- C- 200 K
- D- 100 °C**

**19.** A balloon is placed in a cold room. What process takes place inside the balloon?

- A- Thermal contraction**
- B- Thermal conduction
- C- Thermal radiation
- D- Thermal expansion

**20.** Heat transfer between 2 solids touching each other is\_\_\_\_\_.

- A- Conduction**
- B- Convection
- C- Radiation
- D- expansion

