## Chapter 5 -

What are the two types of energy?

Where do we get chemical energy? What type of energy is this?

What is the SI unit for energy? What is the non-SI unit for energy? How do these numbers relate?

Define a system-

Define the surroundings-

Give an example of the two above definitions besides the one in the book-

What two ways do we experience energy in everyday life?

What is heat?

State the fist law of Thermodynamics-

What is internal energy and how do we represent it?

What are the three parts of a thermodynamics quantity? What do they tell us? What does the sign of  $\Delta E$  tell us?

Any change in the system is accompanied with what?

In a reaction, what do the initial and final states of the system refer to?

Give and explain the mathematical expression for the first law of Thermodynamics-

Read the bottom paragraph on page 173 at least ten times!!!

What happens to the internal energy when work is done on the system?

What happens to the internal energy when work is done by the system?

Draw and fill in the table on page 174- Place the words endothermic and exothermic at the top of the appropriate column.

What is an endothermic process? Give an example in your life of one. Explain how melting ice is an endothermic process?

What is an exothermic process? Give an example in your life of one. Explain how burning a match is an exothermic process-

What is a state function? Give an example of a state function in your life-

Do problem 5.25 and 5.27