**Type A: Multiple Choice Questions (MCQ)**

a. (c) Electronic device

b. (c) Information

c. (b) CU

d. (a) Input unit

e. (c) Input Þ Process Þ Output

f. (b) Speed

g. (c) Learning power

h. (d) None of these

i. (b) Information technology

**Type B: State Whether the Following Statements are True or False**

a. True

b. True

c. False

d. False

e. True

C. **Fill in the Blanks**

a. Electronic , information

b. CPU

c. ALU

d. speed, accuracy

e. Garbage In Garbage out

f. Binary

D. **Very Short Answer Type Questions**

a. It has mainly four functions to perform are Input, Processing, Output and Storage.

b. Computer works on the principle of Input Þ Process Þ Output, i.e., IPO cycle.

c. ALU component of the CPU performs all types of processing jobs.

d. Storage unit of the computer system, processed and unprocessed data are stored.

e. Data in the memory unit are stored in binary form.

f. Processing means manipulates data as per instructions.

g. Major advantages of computer system are:

* High data processing speed
* 100% accuracy
* High storage capacity
* Diligence
* Versatility

Major disadvantages of computer system are:

* Zero IQ
* Lack of decision making power
* No learning power

h. Computers are effectively used as teaching aids in classrooms to explain the experiments which cannot be carried out in a laboratory using CBT (Computer Based Teaching) programs.Students can undergo online courses offered by the various universities while sitting at their homes.

i. Convergence refers to interlinking of different technologies to use them in many different contexts.

**E. Short answer type question**

a. A Computer is an electronic device which processes user data as per the instructions to produce the desired output.

b. The term data is used for the raw facts which is processed by the computer whereas information is the processed form of ‘data’ i.e., the output produced by the computer.

c. IPO cycle means input, Process and output

 d. d. ALU( Arithmetic Logic Unit) is responsible to perform arithmetic(addition, subtraction, multiplication, division etc.) where CU is responsible to controls all the parts of CPU.

Output

Process

Input

e. 1. IQ power 2. Learning power 3. Decision making power.

.f. In Bank computer can be use for making the transaction, To keep record of the customer, to provide information, for printing the reports etc.

g. convergence means to combine two or more than two technologies together which leads to a nee technology is called convergence of technology eg. T.V. In advance television it provide a variety of functions to connect mobile, internet, wi-fi, music player, pen drive etc.. that means many technology is combined in one device.

Take another example of mobile phone, we can use mobile phone for various purpose.

h. It has mainly four functions to perform:

**Input:** Accepts data and instructions.

**Processing:** Manipulates data as per instructions.

**Output:** Produces desired output/information.

**Storage:** Stores data, instructions and information.

F. **Long Answer Type Questions**

a The basic structure of the computer system consists of various components to perform these operations. During the first stage it reads the data and instructions using input device and stores these into the main memory of the system, which is processed by ALU during the second stage. The results produced by the ALU are stored back into the memory unit. During the third stage, results are received on the output unit. The data flow in the computer system is controlled by the CU with the help of control signals sent by it to the various components of the computer system.

b. The various characteristics of computer as follows:

1. **Speed:** The processing speed of the computer is very high as it can process millions of instructions per second. The speed of a computer is measured in Megahertz (MHz) and Gigahertz (GHz). It means that a job which can take days if performed manually can be finished within a few seconds in the computer.

2. **Accuracy:** In addition to its high speed, the accuracy of this machine is consistently high. If the data and instructions given by the user are error free and the hardware does not malfunction, it always gives 100% accurate results. This principle is known as GIGO (Garbage In Garbage Out), i.e., wrong inputs will produce wrong outputs.

3. **Diligence:** Computer, being a machine does not suffer from tiredness or lack of

concentration and can work continuously for hours without making any mistake. It can carry out each instruction precisely with same accuracy and speed everytime. Thus, it is more reliable than human being.

**Solutions**

4. **High Storage Capacity:** Computer can store a large amount of information in a very limited space. The stored information can be retrieved very quickly when needed without failure.

5. **Versatility:** It can be used to perform various types of jobs very efficiently ranging from complex scientific research to flying an aircraft or driving a robot. It can be used in hotels for making reservations or to generate bills in a shopping mall. It can process and store different types of data like text, sound, graphics, videos, etc.

c. In the field of education computer can be used to prepare presentation, to get information from the internet, for CBT(Computer Based Teaching), online examination, online classes etc.