QUESTION BANK (G SCHEME)

NAME OF SUBJECT: FLUID FLOW OPERATION

SUBJECT CODE: 17426 **UNIT TEST:II**

SEMESTER: FOURTH **COURSE: CH**

Chapter 2 Flow of fluids(12 marks)

3 marks question

1. Draw the diagram of venturimeter and mark the parts
2. What is the difference between velocity obtained from an orificemeter and pitot tube?
3. Give the equation for calculating volumetric flow rate using a venturimeter and explain the terms

4 marks question

4. Explain the construction and working of a pitot tube
5. Water is flowing through an orificemeter at 500cm3/s. what is the pressure difference in the manometer connected across the meter. Co is 0.65. Diameter of the pipe 1s 5.3cm and diameter of the orifice is 2.5cm
6. Find out the mass flow rate of water using a venturimeter if manometer reads 10cm of Hg. Diameter of the pipe is 4cm and diameter of the throat is 2cm.

Chapter 3 Pipe fittings and valves (16marks)

3 marks question

7 .Draw the diagram of any 3 fittings.

8. Why globe valve causes more pressure drop than gate valve?
9. Differentiate gate valve and globe valve based on a) application b) pressure drop

4marks question

10. Draw the diagram of control valve and mark the parts

11 Draw the diagram of gate valve and mark the parts

12. Draw neat diagram of globe valve

Chapter 4 Transportation of fluids(32 marks)

3 marks question

13. Give the classification of pumps
14. Explain priming of centrifugal pump
15. Explain NPSH
16. Explain Cavitation in a pump
17. Explain air binding .

4 marks question

18. Differentiate between single acting and double acting reciprocating pump
19. Draw the diagram of a gear pump and mark the parts
20. Compare centrifugal pump and positive displacement pump based on following points

A) mode of delivery b)priming c)efficiency d) liquids with solids suspended

21 Draw the diagram of a jet ejector and mark the parts

22 Explain the working of a jet ejector

23. Draw the diagram of a centrifugal pump and mark the parts
24. Explain characteristics curve of a centrifugal pump
25. Draw the diagram of diaphragm pump and mark the parts.