

BACHELOR OF TECHNOLOGY (C.B.C.S.) (2021-COURSE)  
B. Tech. Sem - II MECHANICAL :SUMMER- 2022  
SUBJECT : COMPUTER AIDED MACHINE DRAWING

Day : Friday

Time : 10:00 AM-02:00 PM

Date : 5/8/2022

S-24068-2022

Max. Marks : 60

**N.B.**

- 1) All questions are **COMPULSORY**.
- 2) Figures to the right indicate **FULL** marks.
- 3) Draw neat labelled diagrams **WHEREVER** necessary.
- 4) Use of non - programmable scientific calculator is **ALLOWED**.

- Q.1** Explain the following with neat sketch **(10)**
- i) Parallel dimensioning
  - ii) Chain dimensioning
  - iii) Dimensioning by co – ordinate

**OR**

- Q.1** Draw conventional representation of the following: **(10)**
- i) Rag foundation bolt
  - ii) Elbow pipe joint
  - iii) Leaf spring
  - iv) Sprocket wheel
  - v) Counter sunk

- Q.2 a)** The shaft size is given as  $40^{+0.02}$  and hole size is  $40^{-0.04}$  Determine type of fit **(05)**  
between them.

- b)** Draw the symbols for following features which are controlled in geometrical **(05)**  
tolerances.
- i) Angularity
  - ii) Perpendicularity
  - iii) straightness
  - iv) Concentricity
  - v) Profile of any line

**OR**

- Q.2** Explain the following drawings with neat sketch **(10)**
- i) Machine drawing
  - ii) Production drawing
  - iii) Design assembly drawing

**P.T.O.**

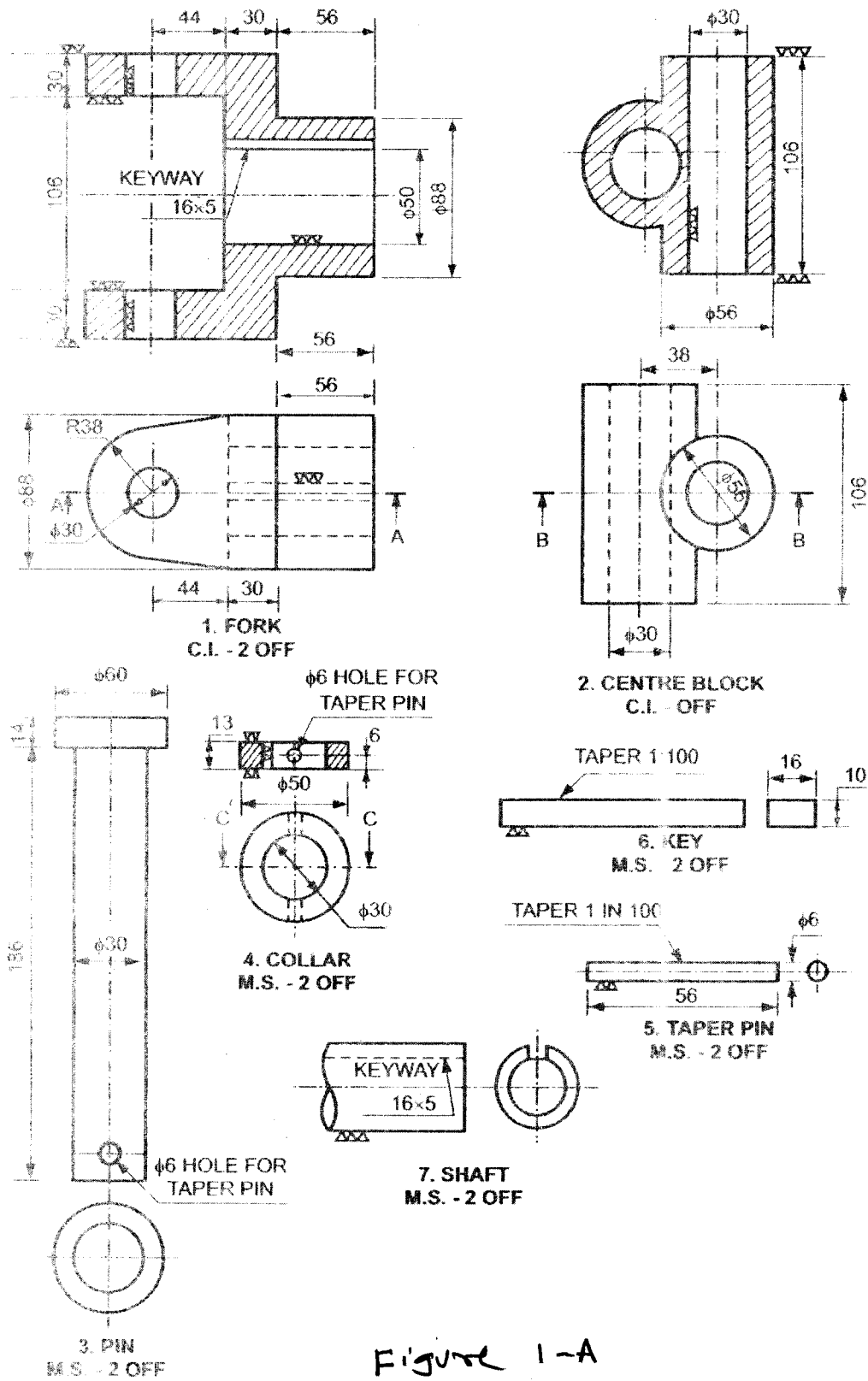
Q.3

Figure 1 – A shows the details of 'UNIVERSAL COUPLING' Draw the following views of the assembly

(20)

- i) Sectional front view
- ii) Top view

Give overall dimensions



P.T.O.

OR

Q.3

Fig 1 – B Shows the details of LATHE TOOL POST' . Draw sectional front view and Top view of assembly. Prepare bill of material. (20)

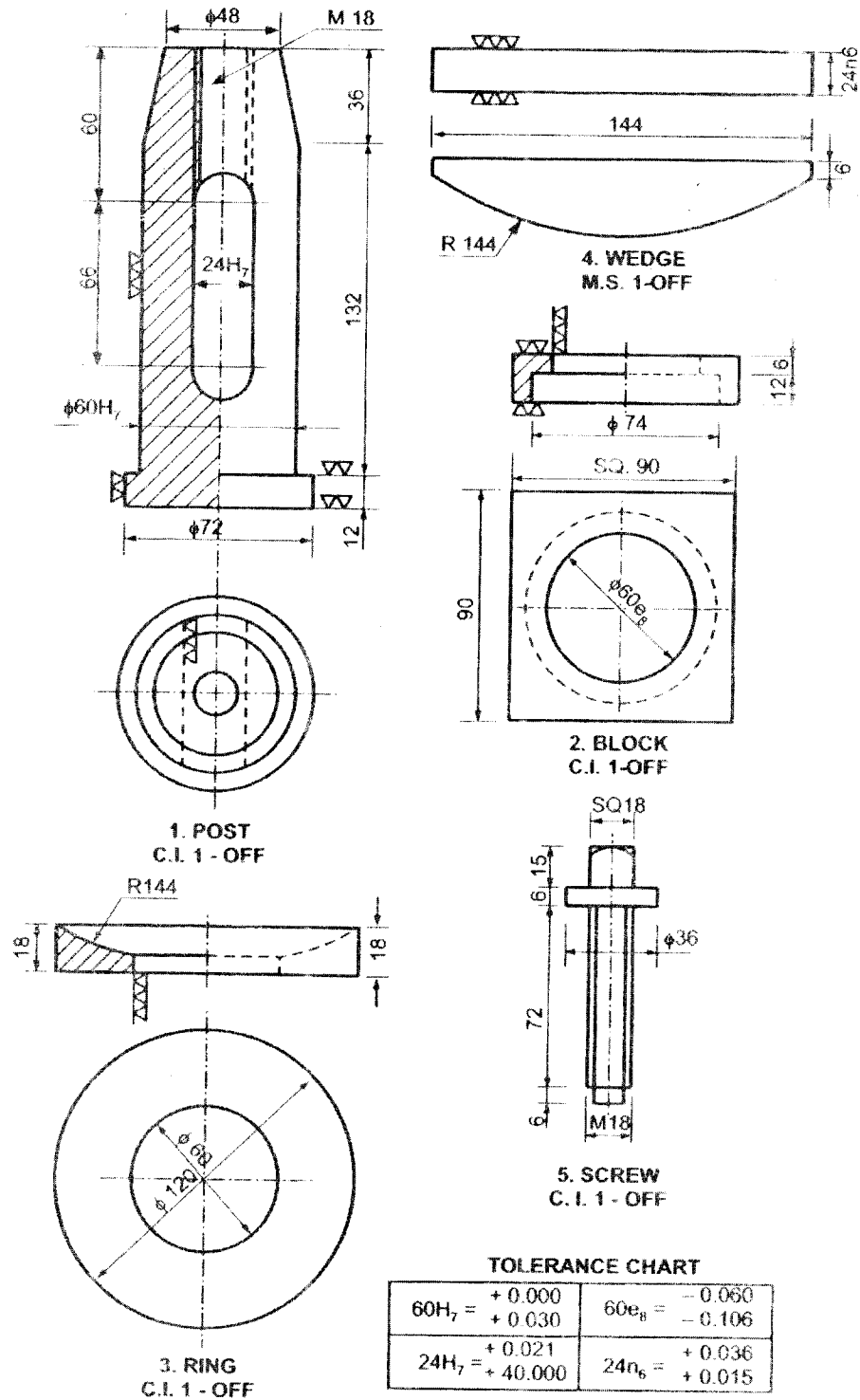


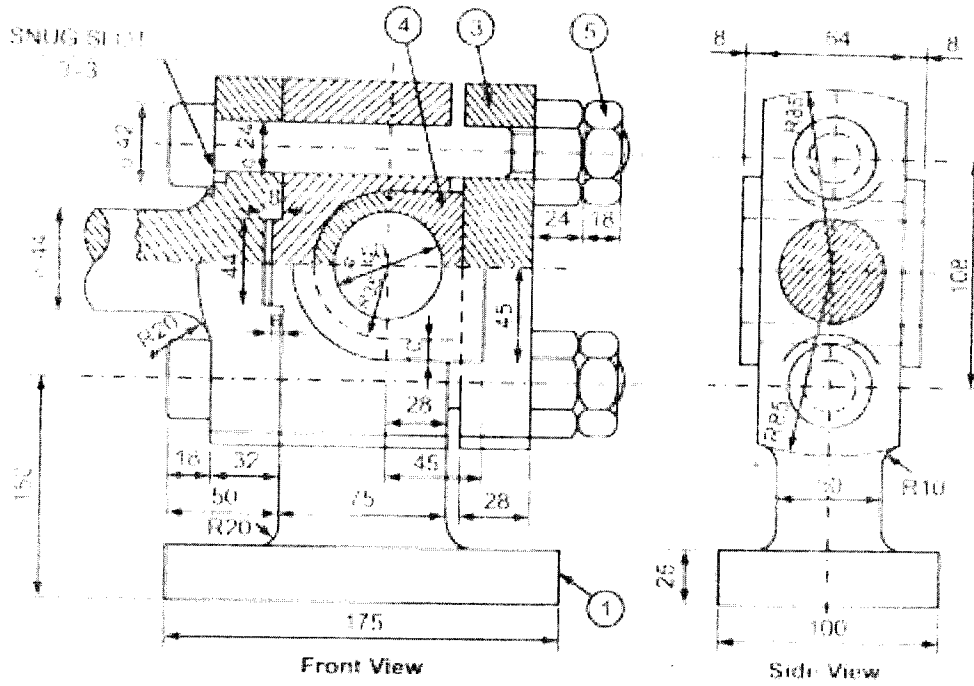
Figure 1-B

P.T.O.

Q.4

Figure 2 – A shows the assembly of steam engine 'CROSS HEAD' Draw the two views of each part. Give overall dimensions

(20)



PART LIST

PART NO.	PART NAME	MATERIAL	QUANTITY
1.	CROSS BODY	C.I.	1
2.	PISTON ROD END	C.I.	1
3.	CAP	C.I.	1
4.	BRASS (TWO HALVES)	G.M.	1
5.	ROUND HEAD NUT AND BOLT	M.S.	2

Figure 2-A

P.T.O.

OR

Q.4

Figure 2 – B shows the assembly of 'NON RETURN VALVE' Draw the two views of each part.  
Give overall dimensions

(20)

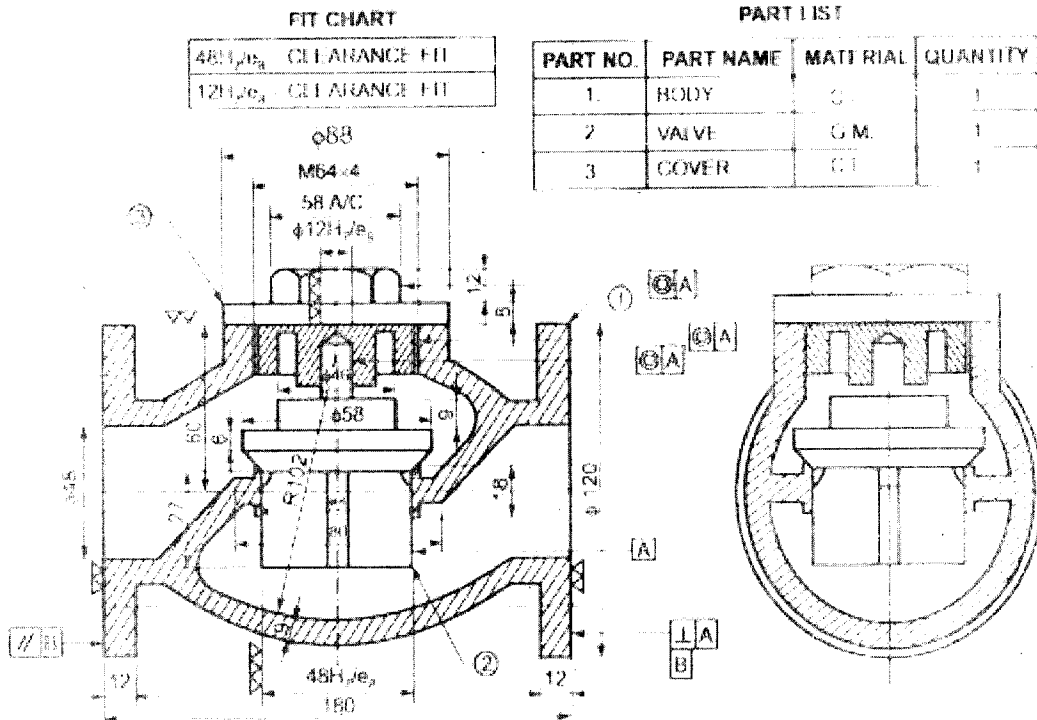


Figure 2-B

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