

Roll No.

Total Pages : 03

J-FB-22-00205

B. Tech. EXAMINATION, 2022

Semester I (CBCS)

WORKSHOP TECHNOLOGY

ME-103

Time : 2 Hours

Maximum Marks : 40

The candidates shall limit their answers precisely within the answer-book (40 pages) issued to them and no supplementary/continuation sheet will be issued.

Note : Attempt *Four* questions in all, selecting *one* question from each Sections A, B, C and D. Missing data if any can be assumed suitably.

Section A

1. Explain how the various alloying elements affect the properties of steel. 10

2. How and where is Cast Iron produced ? Differentiate between grey and white cast iron. Also give their uses. 10

Section B

3. Define Hot Working and Cold Working. Write properties, advantages, disadvantages and limitations of Hot Working Process. 10
4. What is Press-Work ? Classify the press work process. 10

Section C

5. List the elements of Gating system and explain with a neat sketch. 10
6. Briefly explain composition of moulding sand, and what are the properties moulding sand should possess ? 10

Section D

7. What is the working principle of lathe machine ? Define various operations performed on lathe. 10

8. Explain the following :

- (a) What are different sheet metal joints ?
- (b) Compare AC and DC welding.
- (c) Briefly explain Production System.
- (d) Soldering and Brazing Processes. 4×2½=10