





Max.Mark:100

B.E/B.Tech (Full-Time) DEGREE END SEMESTER EXAMINATIONS, NOV/DEC2013 MECHANICAL ENGINEERING BRANCH THIRD SEMSTER-REGULATIONS 2004/2008

ME272/ME9201 MANUFACTURING TECHNOLOGY-I

Time: 3Hr

Answer ALL Questions

Part –A (10x2=20 Marks)

- 1. Why shrinkage allowance is provided on the patterns?
- 2. What is "Misrun" and how such a defect can be avoided?
- 3. Write short notes on: Carburising Flame.
- 4. List down some of the applications of Brazing.
- 5. What do you mean by recrystallisation temperature?
- 6. What is swaging operation?
- 7. What do you mean by Notching?
- 8. What is superplastic forming operation?
- 9. List down some of the characteristics of thermoplastics.
- 10. Write short notes on: Thermoforming.

Part – B (5x16 = 80 Marks)

- 11 With the help of neat diagrams explain the following various hot and cold 16 extrusion techniques
- 12a With the help of neat diagrams explain the working principle of the following 16 moulding machines:
 - (i) Jolt Machine(8 Marks)
 - (ii) Squeezing Machine(8 Marks)

(OR)

- 12b Explain Shell moulding process with suitable sketches. Mention any two 16 applications of this process.
- 13a Define Resistance welding and explain any two resistance welding 16 techniques.

(OR)

- 13b With the help of a neat diagram explain Electron beam welding process. Mention some of its advantages and limitations.
- 14a Explain any one stretch forming operation. Mention some of its applications. 16 (OR)
- 14b Describe Explosive forming process with a neat sketch. State the precautions 16 to be adopted while using this process.

15a With the help of neat diagram explain the following techniques (i)Injection Moulding(8 Marks) (ii)Compression Moulding(8 Marks)

(OR)

15b .With the help of neat diagram explain the following techniques

 (i)Blow Moulding(8 Marks)
 (II)Rotational Moulding(8 Marks)

16