

938

Register No.:

November 2022

Time - Three hours
(Maximum Marks: 100)

- [N.B.** 1. Answer all questions under Part-A each question carries 3 marks.
2. Answer all the questions either (A) or (B) in Part-B each question carries 14 marks.]

PART - A

1. What are the pattern materials?
2. List out any three essential requirements of a core sand.
3. What is meant by arc welding?
4. Why laser welding is used only for micro-welding applications?
5. State the applications of roll forging.
6. Mention any three quenching medium.
7. Mention the different methods of extrusion.
8. Write the uses of powder metallurgy.
9. List out the parts of centre lathe.
10. Define knurling with a sketch.

[Turn over....

PART - B

11. (a) Describe various materials used for making patterns. What are the merits and demerits?

(Or)

- (b) Explain pressure die casting process.

12. (a) Explain the Metal Inert Gas welding. How does it differ from other metal arc welding processes?

(Or)

- (b) Explain the following welding processes with applications
(i) Friction welding (7) (ii) Ultrasonic welding (7)

13. (a) Write the shorts notes on the following smith forging operations (i) Upsetting (4) (ii) Bending (4) (iii) Punching (6).

(Or)

- (b) Explain the following: (i) Cyaniding (4) (ii) Nitriding (4) Flame hardening (6).

14. (a) Explain the Gas injection moulding.

(Or)

- (b) Explain the Cold pressing with neat sketch.

15. (a) Describe a back geared head stock with a neat sketch.

(Or)

- (b) With a neat sketch explain the principal parts of capstan lathe.
