

Roll No.

Total Pages : 02

BT-7/M-20

37175

ADVANCED MANUFACTURING
TECHNOLOGY
ME-429N, Opt. I

Time : Three Hours]

[Maximum Marks : 75

Note There are eight questions in this paper. Attempt
questions in all, selecting at least one question from
each Section. All questions carry 15 mark.

Section A

1. (a) Write a technical note on surface coatings, paint coating and slushing. **7½**
- (b) Explain in detail cutting and joining of composites. Also discuss fabrication of laminates. **7½**
2. (a) Write the various types of composite materials. Also discuss fabrication of particulate composite materials. **8**
- (b) Discuss in detail surface coating for tooling and graphite mould coating. **7**

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Section B

3. (a) Write the various types of plastics. Also discuss in detail properties of plastics. **8**
(b) Write short notes on thread rolling, die threading and tapping. **7**
4. Explain in detail Injection moulding. Also discuss in detail machining and casting of plastics. **15**

Section C

5. Explain in detail Open die forging and power rolling. Also discuss drawing and extrusion with regards to metal forming. **15**
6. (a) Classify metal forming processes. Explain the effect of variables on metal forming processes. **10**
(b) Write a technical note on hot working. **5**

Section D

7. Explain in detail die casting machines. Also describe in brief molten metal injection systems and hot chamber machines. **15**
8. (a) What are the various steps in making cost estimate? Also write the chief factors in cost estimating. **10**
(b) Write short note on cold chamber machines and die casting design. **5**

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