

**B.E. PRINTING ENGINEERING SECOND YEAR FIRST SEMESTER  
SUPPLEMENTARY EXAM – 2024**

**PRINTING TECHNIQUES**

Time : Three hours

Full Marks : 100

Answer from all the groups.

**GROUP – A**

- |                                                                             |       |
|-----------------------------------------------------------------------------|-------|
| 1.a) How can you classify printing?                                         | 5     |
| b) Mention the basic steps in printing process.                             | 5     |
| c) Draw a neat sketch of a hot-metal typeface and identify different parts. | 5     |
|                                                                             |       |
| 2.a) Discuss the nomenclature of type.                                      | 9     |
| b) Define the following items:                                              | 2x3=6 |
| i)     Typesetting                                                          |       |
| ii)    Kerning                                                              |       |
| iii)   Runaround copy                                                       |       |

**GROUP – B**

- |                                                                                                          |        |
|----------------------------------------------------------------------------------------------------------|--------|
| 3. Describe the basic principle of platen type and flat bed letterpress printing with suitable diagrams. | 5+5=10 |
|----------------------------------------------------------------------------------------------------------|--------|

**GROUP – C**

**Answer any *two* questions.**

- |                                                                                               |   |
|-----------------------------------------------------------------------------------------------|---|
| 4.a) Why synthetic fibres are preferred to silk as mesh materials in screen process printing? | 7 |
| b) Make a comparison among different materials used as screen printing frame                  | 8 |
| c) Why polyester meshes are preferred for close registration work?                            | 3 |
| d) Why screen pretreatment is necessary in screen process printing?                           | 2 |

- 5.a) Which type of coating is used in direct photostencil making process? How this photostencil is made? Describe in details. 2+10
- b) How many types of squeegee blade profiles are available? Discuss briefly. 8
- 6.a) Why screen fillers are used and how? 1+4
- b) Which factors should one consider during screen ink formulation? Discuss. 10
- c) What are the basic ingredients of a solvent based screen printing ink? 5

**GROUP – D**

7. Write short notes on any *five* : 4x5=20
- a) Pinholes
  - b) Adhesion failure
  - c) Early stencil breakdown
  - d) Edge curl
  - e) Sawtoothing
  - f) Veiling