



**V SEMESTER B.TECH. (MEDIA TECHNOLOGY)**  
**END SEMESTER ONLINE PROCTORED EXAMINATIONS, MARCH 2021**  
**SUBJECT: INDUSTRIAL BOOK BINDING AND PRINT FINISHING [MED 3152]**  
**REVISED CREDIT SYSTEM**  
**(27/3/2021)**

Time: 3 Hours

MAX. MARKS: 50

**Answer ALL the questions. Missing data may be suitably assumed.**

**1A.** A4 size sheets are to be folded for creating double parallel folds using buckle folding unit consisting of 4 folding modules, where, **1** and **3** are upward modules and **2** and **4** are the downward modules. Answer the following questions related to the above job order.

- i. Describe the double parallel fold.
- ii. What is the position of buckle stop to be set in each module and mention the module to be isolated using deflector.
- iii. What should be the roller gap for the feed rollers and folding rollers for the modules in use

**[ 04 ]**

**1B.** A book containing **176** pages in **6** gathered sections need to be tipped with additional **4** plates facing the pages **16, 17, 88, 89, 128, 160** and **176**. Define the sections of the book naming them from **A** to **F** and mention the kinds of plates used with the required method of attachments for each plate

**[ 03 ]**

**1C.** Explain the parts of the sewing machine and its working principle.

**[ 03 ]**

**2A.** Describe in detail how the following operations are carried out with neat diagram:

- i. Pasting down the end papers in a book binding line.
- ii. Trimming the book edges using 3 knife trimmer.

**[ 04 ]**

**2B.** A job of 120cm X 160 cm to be folded into for accordeon fold. Total no. of copies required by the customer is 60,000. Which type of feeder can be used with the buckle folder for such jobs? Justify your answer. Explain the principle of this feeder with diagram. What is the limitation of this feeder?

**[ 04 ]**

**2C.** Mention the uses of the following in book binding department:

- i. Buckram
- ii. Cord
- iii. Mallet
- iv. Mull cloth

[ 02 ]

**3A.** Books containing **12** sections of **64** pages to be adhesive bound using hard case. Customer demands the books to be of lay flat and has long shelf life. Describe the different operations to be carried out on perfect binding machine along with the type of materials/consumables/treatments needed for each operation to process this job as per the customer demands.

[ 04 ]

**3B.** A print order for **18** pages brochure to be soft bound using 4 page printed paperback cover. Printer decides to insert sections using sheet work imposition. Help the printer to decide the no. of sections and draw the imposition for each section and the cover showing the positioning of pages.

[ 03 ]

**3C.** Describe the warehousing practices followed in a printing industry.

[ 03 ]

**4A.** Suggest the method of binding along with necessary materials and finishing operations needed for the following applications and justify your answer:

- i. Soft bound high volume Text book with easy of opening the book to 180°
- ii. Ticket receipts three to view bound 150 per book with duplicates .
- iii. 1200 page Dictionary book with good strength for long term usage
- iv. A 60 page mini project report to be submitted to the institution.

[ 04 ]

**4B.** A printing industry receives an order to print and bind **10,000** books of **160** pages. The manager plans to issue ISO **RA3** size papers to print using sheet work imposition. If **50,000** sheets are required for printing (excluding waste sheets), what is the no. of pages are planned for each section? If the printer is provided with **3% overs**, what is the no. of waste sheets used by the printer? What is the the **trim size** of the books produced?

[ 03 ]

**4C.** Describe poly bagging, its importance and the process with two advantages and disadvantages

[ 03 ]

**5A.** A order for books containing **15** sections of **32** pages to be prepared. The job order contains the following information: Strong half bound hard case binding which allows easy opening of the book. Covering material is rexine and should be wrinkleless when bound. Title of the book and author name on the cover to be raised and colored. Books should be bound with flush cut edge turned in. Books edges to be decorated with gold /silver. Suggest suitable securing method, forwarding operations to be carried out on the book block with required type of materials, type of end paper to be used and the finishing operations to be carried out to process the above order. Justify your answers.

**[ 05 ]**

**5B.** Describe the following with their features:

- i. Stabbed work
- ii. Edge decoration
- iii. Tipping

**[ 03 ]**

**5C.** Brief on different ways of indexing the books.

**[ 02 ]**