COURSE TITLE : YARN MANUFACTURE II – PRACTICAL

COURSE CODE : 365
COURSE CATEGORY : B
PERIODS/WEEK : 4
PERIODS/SEMESTER : 72
CREDITS : 2

OBJECTIVES

On Completion of the course student should be able to

1.0 DRAW FRAME

- 1.1 Draw the gearing plan of draw frame.
- 1.2 Calculate the break draft constant.
- 1.3 Calculate main draft constant. Change the break draft wheel and main draft wheel for Different feed hanks and different delivery hanks.
- 1.4 Set the drafting rollers for the staple length of fiber being processed.
- 1.5 Calculate production efficiency and hank of sliver delivered.

2.0 LAP FORMERS

- 2.1 Draw the gearing plan of sliver lap former.
- 2.2 Find out the draft constant.
- 2.3 Change the draft wheel for required hank of lap.
- 2.4 Set the drafting rollers to suit the staple length of fiber being processed.
- 2.5 Calculate production and efficiency.
- 2.6 Calculate hank of lap from hank of silver fed.
- 2.7 Draw the gearing diagram of ribbbon lap former.
- 2.8 Calculate the draft constant, draft wheel required for different hanks.

3.0 COMBER

- 3.1 Calculate the production and efficiency of the comber.
- 3.2 Dismantle and assemble nipper, top comb and detaching roller.
- 3.3 Set the comber for different rate of waste extraction.
- 3.4 Operate the comber.
- 3.5 Identify combing defects and suggest preventive measures.

4.0 SPEED FRAME

- 4.1 Draw the gearing diagram of speed frame and mark the change places
- 4.2 Calculate the break draft constant, Main draft constant and Twist constant.
- 4.3 Find out the break draft wheel, Main draft wheel and twist wheel for different sliver hanks and roving hanks and change wheels
- 4.4 Set the drafting rollers for the staple length of fiber being processed.
- 4.5 Practise threading of roving through the flyer
- 4.6 Practise doffing process and set the frame for restarting.

LIST OF EXPERIMENTS

1.0 DRAW FRAME

- 1.1 Draw the gearing plan of draw frame and calculate break draft constant and main draft constant.
- 1.2 Find out the Break Draft Wheel and Main Draft Wheel for different feed hank and delivery Hanks and change the wheels.
- 1.3 Set the drafting rollers for different staple of fiber.
- 1.4 Calculate production efficiency and hank of delivered sliver.

2.0 LAP FORMERS

- 2.1 Draw the gearing plan of sliver lap formers
- 2.2 Find out the draft constant and change the draft wheels for different hank of laps.
- 2.3 Set the drafting rollers for different staple length.
- 2.4 Calculate production efficiency and hank of lap.
- 2.5 Draw the gearing plan of ribbon lap formers

3.0 COMBER

- 3.1 Calculate production and efficiency of comber.
- 3.2 Dismantle and assemble nipper, top comb and detaching rollers.
- 3.3 Set the comber for different rate of waste extraction.
- 3.4 Operate the comber.

4.0 SPEED FRAME

- 4.1 Draw the gearing diagram of speed frame and calculate break draft constant, main draft constant and twist constant.
- 4.2 Find out the break draft wheel, main draft wheel and twist wheel for different sliver hanks and roving hanks and change the wheels.
- 4.3 Set the drafting rollers for different fiber length.
- 4.4 Perform threading of roving through the flyer.
- 4.5 Perform doffing and set the frame for restarting.

LIST OF EQUIPMENTS / MACHINERIES

- 1. Draw Frame
- 2. Lap Former
- 3. Sliver Lap M/C.
- 4. Comber.
- 5. Simplex