

GUJARAT TECHNOLOGICAL UNIVERSITY
BE - SEMESTER-VII (NEW) EXAMINATION – WINTER 2023

Subject Code:3172911**Date:12-12-2023****Subject Name:Knitting Technology****Time:10:30 AM TO 01:00 PM****Total Marks:70****Instructions:**

1. Attempt all questions.
2. Make suitable assumptions wherever necessary.
3. Figures to the right indicate full marks.
4. Simple and non-programmable scientific calculators are allowed.

		MARKS
Q.1	(a) Describe important characteristics of single jersey fabric with neat sketch.	03
	(b) Describe function of knitting cam and sinker with suitable sketch.	04
	(c) Give comparison of Warp & Weft Knitting.	07
Q.2	(a) Give features and properties of Rib fabric.	03
	(b) Give classification of Warp knitting machines.	04
	(c) With suitable sketch explain steps followed in knitting cycle of Tricot warp knitting machine.	07
	OR	
	(c) Explain how patterns can be produced by using a “Pattern Wheel” mechanism on the Circular weft knitting machine with a neat sketch.	07
Q.3	(a) Explain in brief the types of motion of Guide bar.	03
	(b) Discuss function of Sinker in Weft knitting.	04
	(c) Explain with neat diagrams, the production of interlock structures on Circular interlock knitting machine.	07
	OR	
Q.3	(a) Enlist the common uses of Tricot fabric.	03
	(b) Draw thread diagram and graphical representation of the Locknit structure.	04
	(c) Explain Purl knit structure with neat diagram.	07
Q.4	(a) Explain briefly Plating used in Weft knitting.	03
	(b) Discuss the effect of Tuck stitch on fabric properties.	04
	(c) What are the possible reasons for Barreness in knitted fabrics?	07
	OR	
Q.4	(a) What is Barreness in knitted fabrics?	03
	(b) Draw liner and non liner needle movement on cam with neat sketch.	04
	(c) Describe the cycle of operation using a fall plate on Raschel.	07
Q.5	(a) What are the reasons for the growth of the Indian knit garment industry.	03
	(b) Discuss in brief about important yarn properties required for warp knitting.	04
	(c) Discuss in detail manufacturing of Net fabric.	07
	OR	
Q.5	(a) Draw neat labeled diagram of spring beard needle and state function of important parts.	03
	(b) Enlist disadvantages of Raschel machine.	04
	(c) With a suitable sketch, describe flat bed knitting machine and its important parts.	07
