Seat No.: _____ Enrolment No._____

GUJARAT TECHNOLOGICAL UNIVERSITY

BE- VIIth SEMESTER–EXAMINATION – MAY/JUNE- 2012

Subject code: 172904 **Date: 09/06/2012**

Subject Name: Process & Quality Control in Spinning

Time: 02:30 pm – 05:00 pm **Total Marks: 70**

Instructions:

1. **Attempt all questions.**
2. **Make suitable assumptions wherever necessary.**
3. **Figures to the right indicate full marks.**

Q.1	**(a)**	Discuss why process control is required in Spinning.	**07**
	(b)	Write on High Volume Instrumentation.	**07**
Q.2	**(a)**	Discuss the contribution of B.R., Card and Comber in generation of neps.	**07**
	(b)	Discuss the factors affecting PI of a mill.	**07**
		OR	
	(b)	Explain the reasons for occurrence of thick places in yarns and discuss the remedial measures.	**07**
Q.3	**(a)**	Describe the methods to formulate mixing in terms of lea strength of yarn. What are their limitations?	**07**
	(b)	Discuss the various measures to control comber waste.	**07**
		OR	
Q.3	**(a)**	Discuss the measures to control variation in yarn quality in terms of strength.	**07**
	(b)	Name the faults occurring in yarn and discuss any one in detail.	**07**
Q.4	**(a)**	Discuss the factors causing between bobbin count variations.	**07**
	(b)	Discuss the reasons for occurrence of periodic irregularity and the ways to minimize it.	**07**
		OR	
Q.4	**(a)**	Write on Snap study.	**07**
	(b)	Discuss the measures to optimize Quality and Quantity with respect to cost of yarn.	**07**
Q.5	**(a)**	Write on the use of modern instruments in process control.	**07**
	(b)	Write a short note on Package defects.	**07**
		OR	
Q.5	**(a)**	Write a short note on Machinery Audit.	**07**
	(b)	Discuss the factors influencing successful implementation of process control in spinning.	**07**

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