Seat No.: _____ Enrolment No._____

GUJARAT TECHNOLOGICAL UNIVERSITY

MCA Integrated - SEMESTER–VIII • EXAMINATION – SUMMER - 2017

Subject Code: 4480602 **Date: 01/05/ 2017**

Subject Name: Data Analytics with R

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.**

Q.1	**(a)**	What is data analytics? Explain the general categories of data analytics that are distinguished by the results they produce.	**07**
	(b)	Explain the following (i) packages (ii)Accessing built in datasets	**07**
Q.2	**(a)**	Explain data type in detail with example.	**07**
	(b)	Explain classification of data in detail.	**07**
		OR	
	(b)	What is data frame? Explain the functionally of data frame with example.	**07**
Q.3	**(a)**	i. What is variable? How to assign a value to a variable and removing variable in R?	**04**
		ii. Explain list operation in brief.	**03**
	(b)	What is Object? How to convert one object form to another object form?	**07**
		OR	
Q.3	**(a)**	Explain control statements with example.	**07**
	(b)	Explain the following (i) Vector (ii) Matrix	**07**
Q.4	**(a)**	What is Graph? Explain graphical elements in detail.	**07**
	(b)	Explain decision tree with example.	**07**
		OR	
Q.4	**(a)**	What is prediction? Differentiate random forest and decision tree. Which decision model is best for decision making?	**07**
	(b)	What is binomial distribution? Explain functions used to execute binomial distribution with example.	**07**
Q.5	**(a)**	Explain linear models with example.	**07**
	(b)	Explain the following with arguments (i) Histogram (ii) pie (iii) boxplot	**07**
		OR	
Q.5	**(a)**	How to read data from excel and database? Explain in detail	**07**
	(b)	What is Prescriptive Analytics? How to Creating data for analytics through designed experiments?	**07**

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