

## **Data Science Using R Programming**

### **Assignment 1**

**Submit by: 13/12/2021**

1. What is Data Science.?How is it different from Data Analysis and Business Intelligence?(5)
2. What is Data Science process? Explain.(5)
3. List out the applications of Eigen vectors and Eigen values in Data Science?(5)
4. Why Linear Algebra is significant in Data Science?(5)
5. Why Linear Algebra is significant in Data Science? How Linear Algebra is applied in DataScience?(10)
6. Draw and explain the lifecycle of Data Science project.(10)
7. List out the differences between Probability Mass Functions and Probability Density Functions.(5)
8. What is a hypothesis and how it is tested?(5)
9. How random variables are different from traditional variables used in algebra?(5)
10. List out the properties of Probability Mass and Density functions?(5)
11. What is the purpose of sample statistics? Explain the properties of sample statistics?(10)
12. What is statistical hypothesis? Briefly describe the various test statistics?(10)