Reg. No.			,	

III Semester M.B.A (Day) Degree Examination, June/July - 2023

MANAGEMENT

Data Warehousing and Data Mining

(CBCS Scheme 2019 onwards)

Paper: 3.7.3

Time: 3 Hours

Maximum Marks: 70

SECTION-A

Answer any Five questions from the following each question carries 5 marks.

 $(5 \times 5 = 25)$

- 1. Elucidate the differences between data warehouse and data mining.
- 2. Explain the Snowflake Schema of data warehouse with a suitable example.
- 3. Enumerate the basic tasks involved in data transformation.
- 4. With suitable examples explain the emergence of cloud services in data warehousing.
- 5. Explain the data mining applications with respect to financial services.
- 6. Distinguish between data lakes and data ware housing
- 7. Classify the different data mining parameters. Explain any two with examples.

SECTION-B

Answer any Three questions from the following each question carries 10 marks.

 $(3\times10=30)$

- 8. Explain the data warehouse development using the Kimball Lifecycle Diagram.
- 9. List out the different architectures of data warehouse. Explain at least with a block diagram.
- 10. Discuss in detail about Data Loading Techniques.
- 11. Elucidate the differences between OLAP systems and OLTP systems.

SECTION-C

12. Compulsory Case Study:

 $(1\times15=15)$

Harish Company develops LED lighting technology and operates specified lightings to wholesale, retail stores, and individual customers with more than 100 employees working in diverse locations around the world. The company must support a data warehouse that stores hundreds of vendors, products, and personalization for each of their customers. The prime requirement was to generate large volumes of daily sales data.

[P.T.O.



The objective was to reduce this with the presentation and reporting needs to help sales and stock tracking in different locations of warehouses, maintain control over the sales, ordering and distribution process. This would allow the business to rapidly integrate new applications and figure out how to store data for many scenario types including analytical products and forecasting demand. Three requirements for an enterprise-wide data warehouse system were identified to determine its available information;

- i) What data must be accessible?
- ii) How it is transformed and organized?
- iii) How it is aggregated and calculated? Therefore, the client expressed their needs in generational expectations of the data warehouse system to improve the efficiency of their business.
- As a Business Analyst suggest an appropriate architecture for the above defined scenario.
- Depict the suggested architecture and explain the layout as to how it fits the objectives of Harish Company.
- Explain which ETL tool will be suitable for the above case.

