POST-GRADUATE COURSE

Term End Examination — June, 2022/December, 2022

MASTER OF LIBRARY & INFORMATION SCIENCE

Paper-VI : INFORMATION TECHNOLOGY : APPLICATIONS

Time : 4 hours]

[Full Marks : 100

Weightage of Marks : 80%

Special credit will be given for precise and correct answer. Marks will be deducted for spelling mistakes, untidiness and illegible handwriting. The figures in the margin indicate full marks.

GROUP – A

Answer any **two** of the following questions : 18 × 2 = 36

1. a) What do you mean by POSIX ? Enumerate the major features of Ubuntu as a product of Linux distribution. 1 + 5

   b) Write command(s) with an example to perform the following tasks in any Unix-like OS : 2 × 6

   i) to rename a file

   ii) to give only read permission to all for a given file

   iii) to know IP address of the computer you are using

   iv) to copy a file from one directory to another

   v) to display calendar of the year 2023.

2. a) What is library automation ? What are the benefits of Library Automation ? 2 + 4

   b) Discuss the workflow of a Computerized Acquisition subsystem.

   12

3. a) MARC is an important Bibliographic Standard. Discuss. 4

   b) Describe briefly the purposes of the components of MARC 21 family of standards. 10

   c) The item is a report published by Organizing Committee of XXI Commonwealth Games held in Gold Coast, Queensland, Australia, between 4 and 15 April, 2018. 4

   (Designate contents of the appropriate 1xx tag with indicator positions)

| **PG/TE-2139** | [Turn over

4. a) What is relational data modeling ? How does it differ from network data modeling ?   4 + 5

   b) What are the major characteristics of a RDBMS ? Make a comparative study of MySQL and PostgrSQL as RBMSs.   3 + 6

GROUP – B

Answer any *three* of the following questions :   12 × 3 = 36

5. What are the broad objectives of INFLIBNET ?   12

6. Comment on any *two* of the following features of CDS/ISIS as a bibliographic DBMS :   6 + 6

   a) Print format in CDS/ISIS

   b) Free text indexing in CDS/ISIS

   c) Search operators in CDS/ISIS.

7. Make a comparative study of any *two* of the following concept trios :

                                   6 + 6

   a) Assemblers and Interpreters

   b) 'Twisted copper pair', 'Coaxial cable' and 'Optical Fibre' (as transmission media)

   c) Linker and Loader.

8. Categorize high-level programming languages. Give one example for each category.

9. Comment on any *three* of the following standards :   4 × 3

   a) ISO 2709   b) Z39.50   c) ISBD   d) ANSI.

GROUP – C

Write short notes on any *four* of the following :   7 × 4 = 28

10. Any *two* of the following search operators : $3\frac{1}{2} \times 2$

    a) Boolean operators   b) Relational operators

    c) Positional operators   d) Fuzzy search operators.

11. Libsys

12. Bootstrap process

13. Packet switching

14. AGRIS

15. Data Networks

16. Retrospective conversion— Benefits

17. Barcode

18. Tree topology.