

**MS (LIS) 2021-2023**  
**1<sup>st</sup> Semester: Paper – 5**  
**Foundations of Information and Communication Technology (ICT)**

Answer any **FIVE** questions  
All questions carry equal marks

Date: 7<sup>th</sup> January 2022  
Duration: 3 Hours

Total Marks: 100

1. Discuss the development of computers highlighting landmark contributions of different persons and their implications in modern computing devices.
2. What is an operating system? Explain the characteristics of UNIX operating systems and illustrate its directory structure.
3. State the key areas of developments in communication technology? Delineate the Network topologies and which topology matches with LAN Network.
4. Write short notes on any TWO of the following
  - a) Comparative differences in HTML and XML
  - b) Data structure in DBMS models
  - c) Computer Display and Graphic Devices
5. Examine the stages of development of information society impacted with ICT. Highlight the key social and ethical issues emerged from the IT developments.
6. Discuss the following:
  - a) Different number systems
  - b) Need for CSS highlight it with XSL
7. What is a Search engine and their modes of search method? Highlight the features of Yahoo and Google.
8. Explain different search methods illustrate them with examples in relation to a Web search engine.
9. Write short notes on any TWO of the following:
  - a) Web-2.0 Concepts
  - b) Social Network Sites
  - c) Web Servers and their relationships with OS