

Class: XII

Project Guidelines

Areas to be covered in the project

- Problem Solving
- Data Structure
- Object Oriented Programming concept
- Data File Handling

Contents of the project

- Defining Data structure/Class
- Choosing files for storage of data
- Types of Processing(updation/deletion/inserting/sorting)
- Queries(information displayed on a particular query)
- Output Required at each stage

Types of Project

Projects can be of two types

- ☐ Information System
- ☐ Processing System

GUIDELINES FOR DEVELOPING PROJECTS BASED ON INFORMATION SYSTEM

- ❖ *Systematic ways of representing information about various fields .*
- ❖ *A Information System is a system for creating, storing, analyzing and managing spatial data and associated attributes.*
- ❖ *it is a computer system capable of integrating, storing, editing, analyzing, sharing, and displaying information.*

Examples:

- *Galaxies*
- *Zodiac signs*
- *Famous personalities*
- *Chemical Compounds*
- *Tourism Guide*
- *Enquiries on railways/Airways/Roadways*

GUIDELINES FOR DEVELOPING PROJECTS BASED ON PROCESSING SYSTEM

- Online/offline transactions on data files (Making changes in the data file whenever the transaction occurs.)

Examples :

Database management

- Banking (The balance amt should be updated when ever the customer credits/debits in his account.)
- Reservations (Airways/Railways/Roadways)
- Library management (status of the book should be changed whenever the book is issued /returned).
- Inventory management

The following steps have to be kept in mind in both the type of projects

1. MAINTAINENCE

- Designing data structure using class. (*Defining Data by declaring data of various types*)
- Functions Definition (*Defining the suitable functions for storing and updating the information time to time.*)

Functions to be used

- ❖ Creating a file to store the basic data required for providing information
- ❖ Updating files
- ❖ Adding new record(s)
- ❖ Deleting record(s)
- ❖ Modifying records
- ❖ Sorting based on different fields.

2. QUERIES

- ❖ Different ways of representing information to the user based on criteria .

3. OUTPUT

- ❖ Displaying information in proper layout
 - Consolidated way of representing information .
(Providing output from the single source /multiple sources)
 - Providing statistical information
 - Providing Sorted information

PROJECT TOPICS

1. QBank
2. Tourism
3. Any Science Topics about Planets, Molecules, Chemical salts etc.
4. Foreign Universities – Database giving information about different university – admission procedure, fee structure, scholarship etc.
5. Quiz program on any topics – different levels
6. Information about Popular People
7. Hospital managements
8. Hotel Management
9. Club/Resort management
10. Library management (Books / Cassettes / Cds)
11. CET Seat allotment
12. Real Estate management
13. Automobiles management
14. Flight / Train /Bus Reservations /cancellations
15. Developing word processing software using C++
16. Stores management
17. Banking / Transactions
18. School Management
19. Office Management - Managing employees , products etc..
20. Web - Shopping
21. Departmental stores billing, maintaining
22. Super selector - Cricket / Football etc.. ranking
23. Inventory - whole Sales management
24. Consultancy - services
25. Air Cargo department
26. Report Card Generation
27. Vehicle Management system
