

PGDCA SEMESTER – II

DCA-204 : System Analysis & Design

Teaching Scheme (per week)		Examination Scheme					
		INT		EXT		TOTAL	
Th. (hours)	Pr. (hours)	Th. (marks)	Pr. (marks)	Th. (marks)	Pr. (marks)	Th. (marks)	Pr. (marks)
4	--	30	--	70	--	100	--

University Examination Duration : 3 Hours.

UNIT-I **(17 Marks)**

- System definition
- Need for system development
- Types of system
- Types of user
- System development strategies
 - o SDLC
 - o Structured Analysis Development Strategy
 - Physical and Logical DFD
 - Data Dictionary
 - o System Prototype Method
- Role of system analyst
- System investigation:- Fact Finding Techniques
- Tools for Documenting Procedures & Decision
 - o Decision Tree,
 - o Decision Table
 - o Structured English

UNIT-II **(18 Marks)**

- Code design
- Form design
- Input design
- Output design
- Computer Aided system tools

UNIT-III **(17 Marks)**

- System Engineering and Quality Assurance
 - o Design of software
 - o Software design and documentation tools
 - Structure Flowchart
 - HIPO
 - Warnier /Orr Diagrams
 - o Testing
 - o Documentation
- Managing System Implementation
 - o Training
 - o Conversion

UNIT-IV **(18 Marks)**

- **Case Studies**
 - o Financial Accounting System
 - o Payroll System
 - o Library System
 - o Inventory / Stock System
 - o Billing System
(Input, Output, DFD)

Books:

- Analysis & Design of Information Systems - James A. Senn
- System Analysis & Design, 1st Edition, - S.Parthasarthy & B.W.Khalkar
- Introduction To S.A.D. – LEE VOL. 1 & 2

Question Paper Scheme:

University Examination Duration : 3 Hours.

Q.1 - Unit-I (17 Marks)

- A. Objective/ Short Questions.
- B. Descriptive/ Long questions.

Q.2 - Unit-II (18 Marks)

- A. Objective/ Short Questions.
- B. Descriptive/ Long questions

Q.3 - Unit-III (17 Marks)

- A. Objective/ Short Questions.
- B. Descriptive/ Long questions

Q.4 - Unit-IV (18 Marks)

Case study

OR

Q.4 - Unit-I to III (18 Marks)

- A. Objective/ Short Questions.
- B. Descriptive/ Long questions

Note: 1. Options should be given in Q-1 to Q-3.