

Centre of Excellence

Govt. Degree College, Sanjauli

Program Specific Outcomes (PSOs) and Course Outcomes (COs) 2022-23

Department of Computer Science
Programme: B.Sc. Computer Science

PSO No.	Program Specific Outcomes (PSOs) Upon completion of this programme the student will be able to
PSO1	Academic Competence: (i) Understand various concepts of Computing, Statistics, Mathematics and Electronics appropriately to the discipline. (ii) Recommend computing solutions to solve the problems in different domains
PSO2	Personal and Professional Competence: (iii) Apply the fundamental knowledge for professional software development as well as to acquire new skills. (iv) Develop strong problem solving, analyzing and decision-making abilities. Identify the information and apply their disciplinary knowledge and professional skills to design components , system or processes to meet required specification
PSO3	Research Competence: (v) Apply programming languages, tools and techniques to conduct research and demonstrate appropriate emerging skills to seek solutions to problems in various interdisciplinary fields. (vi) (ii) Integrate Computer Science, Electronics, Mathematical and Statistical knowledge to explore different domains' data for experimental and research purpose
PSO4	Entrepreneurial and Social Competence: (vii) Use the knowledge and skills necessary to support their career in software development, web development, databases and entrepreneurship in recent trends like data analytics, artificial intelligence, Image processing, Networking, Embedded systems etc. (viii) Develop software based solutions for industry as well as research and development and develop skills required for social interaction.

Course Outcomes (COs)

Course Code: COMP101TH

COMP101 PR

Course Title **1. Problem solving using computer**
2. Software lab using Python

L-T-P-C: 4-0-2-6

Course Outcomes (COs): Python is a versatile programming Language that can be used in variety of fields.

CO.1 The course will help the students to understand how to translate a human solved problems i.e. “algorithm” into something a computer can do & finally how to write the specific syntax in computer to do the work.

CO.2 This course provides basic knowledge of Python. It helps the students to write Python scripts. They can do scientific & mathematical computing. Students can make their carrier as a game developers, Web developer, Finance & Trading, Computer Graphics, Data Science & security testing.

Course Code: COMP 102TH
COMP102PR

Course Title: Office Automation Tools
Office Automation Tools Lab

L-T-P-C: 4-0-2-6

Course Outcomes (COs):

CO.1 The course will help the professionally trained students to build their confidence to use the tools provided to them. Having MS office skills will significantly increase their work efficiency & confidence.

CO.2 MS word acquaint the students to navigate & perform basic task in word such as creating, opening, viewing, editing, saving & printing documents.

CO.3 MS. Excel primarily helps the students to enter, edit, format, sort, perform mathematical computation, save, retrieve & print numerical data. They will learn how to create graphs & charts using their data.

CO.4 Power point is the powerful tool which will help the students to communicate complex information in simple & interesting ways to keep the audience engaged. It will also help the students to add pictures, graphics text & video in their PPT. Students can use it for multipurpose such as business, education and household. This will definitely develop self confidence among students who present their presentation. Students will communicate their thoughts & feelings effectively through the knowledge of this course.

Course code: COMP 201TH

Course Title: Computer System Architecture

L-T-P-C: 6-0-0-6

Course Outcomes (COs):

CO 1. The course will make the students able to demonstrate Computer Architecture concepts related to design of modern processors, memories & I/O's. It will also help the students to analyze the performance of commercially available computers.

CO 2. This subject will impart the knowledge to student that how machines are designed, built & operate. This subject answers all the assumptions & confusions regarding what's there inside the Computer & how it works.

The knowledge of this course will help the students to design develop & implement application better, faster, efficient & easy way.

Course code: COMP 202TH

COMP 202PR

Course name: Database Management System (DBMS)

Database Management System (DBMS) Lab

L-T-P-C: 4-0-2-6

Course Outcomes (COs):

CO 1. Discuss database concepts, applications, and data models in the field of computer science along with other areas and develop the design of database.

CO 2. Identify the databases and relationships between them by analyzing the information.

CO 3. Apply the knowledge of database concepts with normalization to write and execute the queries and operations in SQL.

CO 4. Test the queries and operations to detect the errors.

CO 5. Integrate the concepts of queries, joins, and aggregate functions in SQL.

CO 6. Develop the strong ability to use the database concepts for writing queries and operations in SQL.

Students will get the practical knowledge of designing and creating Relational Database System. They will be able to understand various advanced queries execution such as Relational constraints, join operation, aggregate functions, and views and embedded SQL.

Course code: COMP 203TH

Course Title: PHP Programming. (SEC-2)

L-T-P-C: 4-0-0-4

Course Outcomes (COs):

CO 1. The very interesting course will enable the students to write PHP scripts to handle HTML forms.

CO 2. They will learn to write regular expression such as modifiers, operations and meta characters.

CO 3. Students will also be able to create a PHP program that uses various PHP library functions and that manipulate files and directories.

Course code: COMP 301TH

Course Title: Operating System. (DSE-2A)

L-T-P-C: 6-0-0-6

Course Outcomes (COs):

CO 1. Students will be able to understand fundamental Operating System. Abstraction such as processes, Threads, files, semaphores, shared memory regimes etc. They will be able to analyze important algorithms like Process scheduling and memory management algorithms.

CO 2. Students will also be able to use the Computer System conveniently in an efficient manner.

Course code: COMP 302TH

COMP 302PR

Course Title: Data Structure and File Processing

Data Structure and File Processing Lab.

L-T-P-C: 4-0-2-6

Course Outcomes (COs):

CO 1. The foremost outcome of teaching this course is to help the Students to crack Product based Company interviews.

CO 2. Learning Data Structure will help the students in writing optimized code, designing Algorithm and learning advanced skills. They will also get the knowledge of concept of Dynamic Memory Management, Data Types and algorithms.