SYLLABUS 2020-2021

CLASS: 12 **SUBJECT: COMPUTER SCIENCE**

UNIT	CONTENT
1 Function	1.1 Introduction 1.2 Function with respect to Programming language
2 Data Abstraction	2.1 Data Abstraction - Introduction 2.2 Abstract Data Types 2.3 Constructors and Selectors
3 Scoping	3.1 Introduction 3.2 Variable Scope 3.3 LEGB rule 3.4 Types of Variable Scope
4 Algorithmic Strategies	4.1 Introduction to Algorithmic strategies 4.4 Algorithm for Searching Techniques 4.5 Sorting Techniques
5 Python - Variables and Operators	5.1 Introduction 5.2 Key features of Python 5.3 Programming in Python 5.4 Input and Output functions 5.5 Comments in Python 5.6 Indentation 5.7 Tokens
6 Control Structures	6.1 Introduction 6.2 Control structures
7 Python Functions	7.1 Introduction - Types of functions 7.2 Defining functions 7.3 Calling a function 7.4 Passing Parameters 7.6 Anonymous functions 7.7 Return Statement 7.8 Scope of Variables

14 Importing C++ Programs in Python	14.1	Introduction
	14.2	Scripting Language
	14.3	Applications of Scripting Languages
	14.5	Importing C++ Files in Python
	14.6	Python Program to import C++
15 Data Manipulation through SQL	15.1	Introduction
	15.2	SQLite
	15.3	Creating a Database using SQLite
	15.4	SQL Query Using Python
	15.4.1	SELECT Query
	15.6	Querying A Date Column
	15.7	Aggregate Functions
	15.8	Updating A Record
	15.9	Deletion Operation
16 Data Visualization using Pyplot	16.1	Data Visualization Definition
	16.2	Getting Started
	16.3	Special Plot Types

PRACTICALS	
CLASS: 12	**SUBJECT: COMPUTER SCIENCE**
Sl.No	**Topic**
1	PY1(a) Calculate Factorial PY1(b) Sum of Series
2	PY2(a) Odd or Even PY2(b)Reverse the String
3	PY3 Generate values and remove odd numbers
4	PY4 Generate Prime numbers and Set Operations
5	PY5 Display a String elements - Using Class