Guru Tegh Bahadur Institute of Technology, New Delhi
Department of Computer Science & Engineering
Lecture Plan for 6th Semester

Subject: Prog. in Python

Class:6th Sem. (CSE)   **Subject Code: CIE-332T**
Total Lecture classes available: 36

S.No.	TOPICS TO BE COVERED	No. of Lectures
1	Introduction to Python, entering expressions into the Interactive Shell, the integer, and the floating-point.	2
2	String Data Types, String concatenation and replication	1
3	Storing values in variables, dissecting your program and flow control	2
4	Boolean Values, Comparison operators, Boolean operators, mixing boolean and comparison Ooerators.	2
5	Elements of flow control, program execution, flow control statements, importing modules	2
6	Ending a program early with sys.exit()	1
7	Functions: def Statements with parameters, return values and returnsStatements	2
8	The None Value, Keyword Arguments and print(), local and global scope, The global statement	2
9	Exception Handling, Lists: The List data type, working with Lists	2
10	Augmented Assignment operators and methods	1
11	Dictionaries and Structuring Data, Dictionary Data Type, Pretty Printing, using Data Structures to model Real-World things	2
12	Manipulating Strings - working with strings, useful string methods.	1
	Total Hours	20hrs
	2nd TERM END	
13	Reading and Writing Files: files and file paths	2
14	The os.path module, The file reading/writing Process, saving variables with the shelve module	2
15	Saving variables with the pprint.pformat() Function	1
16	Organizing Files: The shutil Module, walking a Directory Tree,	2
17	Compressing Files with the zipfile Module.	2
18	Web Scraping: Project: MAPIT.PY with the web browser module	2
19	Downloading Files from the Web with the requests Module	2
20	Saving Downloaded Files to the Hard Drive, HTML.	3
	Total Hours	16 hrs

Textbook(s):
1. Al Sweigart, "Automate the Boring Stuff with Python", William Pollock, 2015, ISBN: 978-1593275990.

References:
1. Allen B. Downey, "Think Python: How to Think Like a Computer Scientist", 2nd Edition, Green Tea Press, 2015, ISBN: 978-9352134755.
2. Charles Dierbach, "Introduction to Computer Science Using Python", 1st Edition, Wiley India Pvt Ltd. ISBN-13:978-8126556014.
3. Wesley J Chun, "Core Python Applications Programming", 3rd Edition, Pearson Education India, 2015. ISBN-13: 978-9332555365.