## INTRO TO PYTHON FOR DATA SCIENCE COURSE SCHEDULE

WEEK	COVERAGE	BREAKDOWN
WEEK 1	Introduction to python and installation of python and other necessary tools.	<ul> <li>Basic programming terms</li> <li>Brief introduction of python and its interpreter</li> <li>Areas of application of python programming language</li> <li>Installation of necessary tools</li> <li>First python code</li> </ul>
WEEK 2	Python variables, types, operators and operations.	<ul> <li>Python syntax</li> <li>Variable assignment</li> <li>Simple operation</li> <li>DataTypes and types conversion</li> <li>Intro and usage of popular python functions</li> <li>Assignment</li> </ul>
WEEK 3	Conditional and control structures	<ul> <li>Use of IF/ELSE/ELIF statements</li> <li>For/while loop statement</li> <li>Assignment</li> </ul>
WEEK 4	Python data structures	<ul> <li>List and list operations         (creating, replace, slicing,         delete, list of list)</li> <li>Dictionary and common         operations</li> <li>Assignment</li> </ul>
WEEK 5	Python functions and methods	<ul> <li>Function declearation and calling</li> <li>Return statement</li> <li>Function arguments</li> <li>String methods</li> <li>Integer methods</li> <li>Assignment</li> </ul>

WEEK 6	Python Class/packages/modules	<ul> <li>Brief introduction OOP</li> <li>Brief introduction to python class</li> <li>Importation of modules</li> <li>Intro to Database mgt (MySql)</li> <li>Assignment</li> </ul>
WEEK 7	Python Libraries - NumPy	<ul> <li>Intro to Data Science</li> <li>Numpy arrays</li> <li>2D Numpy arrays</li> <li>Numpy basic statistics</li> <li>Assignment</li> <li>Project</li> </ul>
WEEK 8	Python Libraries – Matplotlib	<ul> <li>Data visualization</li> <li>Basic statistics         visualization with         matplotlib</li> <li>Project</li> </ul>