**Maximum Marks: 100**

**Time Allowed: 3 Hours**                                    **Minimum Pass Marks: 35**

**Note: Part (A) of each question is compulsory, Attempt any two parts from (B), (C) & (D)**

| Q. No. | | Question | Marks |
|---|---|---|---|
| 1 | A | Why is Python so popular? Give some popular applications which are developed in Python. | 4 |
| | B | What are the various operators available in Python? | 8 |
| | C | Write Python code to reverse a number. | 8 |
| | D | Write Python program to an element in a list using linear search. | 8 |
| 2 | A | What are different types of Data collections available in Python? | 4 |
| | B | What is the difference between List, Tuples, Sets and Dictionaries? | 8 |
| | C | Write Python Program to sort elements of a list. | 8 |
| | D | Write Python Program to demonstrate diamond problem. | 8 |
| 3 | A | What is PIP and its usage and importance. | 4 |
| | B | Explain try-catch-finally block in python. | 8 |
| | C | Explain MVC model. | 8 |
| | D | Write short notes on any 2 modules of python along with its function | 8 |
| 4 | A | Write Django code for URL Mapping | 4 |
| | B | Draw and explain file structure in Django | 8 |
| | C | Illustrate difference between MVC and Django MVT Architecture | 8 |
| | D | Create a Django webpage demonstrating the process of template generation and rendering | 8 |
| 5 | A | Explain about following files:<br>1. Manage.py<br>2. Settings.py | 4 |
| | B | Explain CRUD operations. | 8 |
| | C | Explain about get and post method in HTML | 8 |
| | D | Write short notes on any 4 tags in DTL | 8 |