Q1.What is Python? Why is it so popular?

# A.Python is an interpreted high-level general purpose programming language .Its design philosophy emphasizes code reusability with its use of significient indentation.The following are the reasons why python is popular:

\*Easy & Efficient .

\*Rich library Ecosystem.

\*Flexibility.

\*Simple & Consistent.

\*Platform Independent .

\* Huge community & Popularity .

Q2.What are the key features of Python?

# A.The following are the features of Python :

## \* Easy to code & Learn.

## \* Object Oriented & Portable .

## \* GUI Programming Support .

## \* High-Level Language .

## \* Integrated,Interpreted & Extensible .

## \* Large Standard Library .

## \* Dynamically Typed Language

Q3.What type of language is Python? Programming or Scripting?

# A.Python can be considered as a scripting language as scripted language is the language that does not require any compilation ,it is directly interpreted .

Q4.What is PEP 8?

# A.PEP 8 is a document that provides guidelines and best practices on how to write Python code.This document describes the new features proposed for Python and document aspects of Python,like design and style ,for the community.

Q5.Python an interpreted language .Explain?

# A.Python is called the interpreted language as it converts source code written by the programmer into intermediate language which is again translated into the native language or machine language that is executed .Python is processed at runtime by the interpreter.

Q6.How is memory managed in Python?

# A.Memory Management in Python involves a private heap containing all python objects and data structures .The management of this private heap is ensured internally by the Python memory manager .

Q7.What is namespace in Python?

# A.A namespace is a system that has a unique name for each and every object in Python.An object might be a variable or a method .Python itself maintains a namespace in the form of a Python Dictionary .