

1. Why are functions advantageous to have in your programs?

**Ans-** Advantages of functions

a)**Reusability**- by allowing to encapsulate a block of code that performs a specific task

b)**Modularity**- by breaking down code in smaller pieces

c)**Readability**-by making code more readable and self explanatory

d)**Scalability**-by allowing to add new features

2. When does the code in a function run: when it's specified or when it's called?

**Ans-** Code inside a function runs when the function is called

3. What statement creates a function?

**Ans-** Def statement is used to define a function . E.g.

```
def function_name(parameters):
```

```
    # Function body (code to be executed)
```

```
    # ...
```

4. What is the difference between a function and a function call?

**Ans-** Function is a block of code that performs specific code when invoked.

Function Call is the act of invoking a function that perform its defined task.

5. How many global scopes are there in a Python program? How many local scopes?

**Ans-** In Python, there is 1 Global Scope and Multiple Local Scope.

6. What happens to variables in a local scope when the function call returns?

**Ans-** When a function call returns in Python, the local variable defined within the functions's scope are destroyed and memory associated with them is released.

7. What is the concept of a return value? Is it possible to have a return value in an expression?

**Ans-** Return value in a programming refers to a value that a function provides as its result when it is executed.

Yes, it is possible to have return value in an expression.

8. If a function does not have a return statement, what is the return value of a call to that function?

**Ans-** Without return statement in a function , the function will automatically return a special value called None.

9. How do you make a function variable refer to the global variable?

**Ans-** By using 'global' keyword.

10. What is the data type of None?

**Ans-** "None Type" is the data type of None.

11. What does the sentence `import areallyourpetsnamederic` do?

**Ans-** "areallyourpetsnamederic" is not a valid Python function, hence it would result in error.

12. If you had a `bacon()` feature in a `spam` module, what would you call it after importing `spam`?

**Ans-** `import spam` # Import the spam module

# Call the `bacon()` function from the `spam` module

`spam.bacon()`

13. What can you do to save a programme from crashing if it encounters an error?

**Ans-** 'try' and 'except' error handling techniques can be used when error is encountered.

14. What is the purpose of the try clause? What is the purpose of the except clause?

**Ans-** Try Clause is used to enclose a block of code that might raise an error during its execution.

Except Clause is used to specify how a program should respond when a specific type of error occurs within a try block.