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

* Reusability of code, we can avoid rewriting the same logic again & again in a program
* We can call python functions anywhere and call multiple times.
* Readability/logic modification of programme easier when working on complex problems.

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

**Ans:** Code inside a function will run:

-when there is zero error in a code

-if functions are parametrised. Right parameters should be passed.

**3. What statement creates a function?**

Ans: **def** keyword used to define a function.

**Ex:**

def fib(n):

l=[ ]

a=1

b=1

for i in range(n):

l.append(a)

a,b=b,a+b

return l

print(fib(5)) output: 1,1,3,5

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

**Ans:** A function is a block of code which only runs when it is called.

Function is called by name of function & passing parameter .it is not mandatory to pass parameters to call function**.**

**Eg:**  def sqr(a):

return a\*a

sqr(5)

result: 25

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

Ans: we can have multiple global and local scopes. Number of local scopes depends on variables used in functions.

Eg : a=’global’

def test():

b=’local’

return b

In this example variable ‘a’ inside global scope where variable ‘b’ inside local scope.

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

Ans: It gives corresponding result when function called.

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

Ans: return keyword retains original data type as it is and it will break the loop.

Yes we can use return value in an expression.

Eg: def add(a,b):

return a+b

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

Ans: Default return value if return statement not used in function is **NONE.**

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

Ans: using global keyword inside the function.

**10. What is the data type of None?**

Ans: ‘Nonetype’

11. What does the sentence import areallyourpetsnamederic do?

Ans: imports all variables ,classes & functions available in module areallyourpetsnamederic

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

Ans: spam.bacon()

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

Ans: error handling can be used to notify that user of why the error occurred. Smoothly exit the process that caused error.

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

Ans: The **try** block lets you test a block of code for errors.

The **except** block lets you handle the error.