1. What exactly is []?

Suppose x=[] indicates list.

1. In a list of values stored in a variable called spam, how would you assign the value 'hello' as the third value? (Assume [2, 4, 6, 8, 10] are in spam.)

spam=[2,4,6,8,10]

spam.insert(3,"hello")

spam=[2, 4, 6, 'hello', 8, 10]

Let's pretend the spam includes the list ['a', 'b', 'c', 'd'] for the next three queries.

1. What is the value of spam[int(int('3' \* 2) / 11)]?

spam[int(int("3"\*2)/11)] is ‘d’

4. What is the value of spam[-1]? Is ‘d’

5. What is the value of spam[:2]? Is ‘c’

Let's pretend bacon has the list [3.14, 'cat,' 11, 'cat,' True] for the next three questions.

6. What is the value of bacon.index('cat')? Is 1

7. How does bacon.append(99) change the look of the list value in bacon?

bacon.append(99)

[3.14, 'cat', 11, 'cat', True, 99]​

​

8. How does bacon.remove('cat') change the look of the list in bacon?

[3.14, 11, 'cat', True, 99]

​

9. What are the list concatenation and list replication operators?

The operator for list concatenation is + ,while the operator for replication is \*

10. What is difference between the list methods append() and insert()?

Here append function is used to add the element to end of the list.

Where insert function is used to add the element from our choice of index , value can be given.

11. What are the two methods for removing items from a list?

Remove and Pop are the two methods for removing items in a list.

12. Describe how list values and string values are identical.

Lists are similar to strings , which are ordered collection of characters , except that the elements of a list can have any type .

where as string elements only contains characters that are all of string type.

Lists are mutable but strings are immutable.

13. What's the difference between tuples and lists?

Lists are mutable , tuples are immutable.

Lists consumes more memory where as tuples consumes less memory.

14. How do you type a tuple value that only contains the integer 42?

t=(42, ) here variable t is a tuple and having only int value 42.

15. How do you get a list value's tuple form? How do you get a tuple value's list form?

Suppose l=[1,2,3]

Tuple(l)=(1,2,3)

And t=(4,5,6)

[t]=[(4,5,6)]

16. Variables that "contain" list values are not necessarily lists themselves. Instead, what do they contain?

It may contain integer values , string, tuple , list , set , dictionary

17. How do you distinguish between copy.copy() and copy.deepcopy()?

We can answer later out of syllabus yet not discussed.