1. What exactly is []?

Ans: List

2. 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.)

Ans: spam + ['hello']

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

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

Ans: d

4. What is the value of spam[-1]?

Ans: d

5. What is the value of spam[:2]?

Ans: ['a', 'b']

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')?

Ans: 1

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

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

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

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

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

Ans: The operator for list concatenation is +, and the operator for replication is \*

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

Ans: **insert()** function allows us to add a specific element at a specified index of the list and **append()** where we can add the element only at end of the list

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

Ans: remove() , pop()

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

Ans: List & string are sequences & slicing operation is same in list & string

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

Ans: tuples holds elements in ()

List holds elements in []

Tuples are immutable objects the lists are mutable

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

Ans: (42,)

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

Ans: Ex:

List to tuple

l = [1,3,4]

(l) --🡪(1,3,4)

Tuple to List

l = (1,3,4)

[l] --🡪[1,3,4]

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

Ans: Variables will contain references to list values rather than list values themselves

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

Ans:

copy.copy() –If any changes made in copied object, then it replicates into original also

copy.deepcopy()?—Here no change in original element