1.What exactly is []?

ANS. It is an empty 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[2] = ‘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. It will add the specified value at the end of the list.

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

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

ANS. It will remove the specified value from the list. If there are two same values, it will remove the first one. [3.14, 11, 'cat,' True]

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

ANS. List concatenation = +

list replication = \*

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

ANS. append( ) adds the value at the end of the list while insert( ) can add the value at the specified index.

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

ANS. The pop( ) method and the remove( ) method.

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

ANS. They both can be concatenated, replicated, sliced, can pass index( ), and many more. They both are iterable objects.

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

ANS. The lists are mutable i.e. the values in lists can be changed whereas the tuples are immutable, the values can’t be changed at all.

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

ANS. (42,) , it is necessary to pass comma or the program will treat it as a int object and not tuple.

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

ANS. list value's tuple form = tuple(list)

tuple value's list form = list(tuple)

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

ANS. References to list values.

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

ANS. A copy.copy( ) copies a shallow copy of the list and copy.deepcopy( ) copies deep copy which means it does real copying of the list.