1. What does an empty dictionary's code look like?

**Ans**: An empty dictionary is represented by {}.

1. What is the value of a dictionary value with the key 'foo' and the value 42?

**Ans**: ‘42’

1. What is the most significant distinction between a dictionary and a list?

**Ans**: List is ordered and uses integer indices to access elements, while a dictionary is unordered and uses keys to access values.

1. What happens if you try to access spam['foo'] if spam is {'bar': 100}?

**Ans**: It will raise a KeyError because the key 'foo' does not exist in the dictionary spam.

1. If a dictionary is stored in spam, what is the difference between the expressions 'cat' in spam and 'cat' in spam.keys()?

Ans: Both expressions check if the key 'cat' is present in the dictionary spam. However, 'cat' in spam is a shorthand for checking if 'cat' is among the dictionary keys, so there is no practical difference.

1. If a dictionary is stored in spam, what is the difference between the expressions 'cat' in spam and 'cat' in spam.values()?

**Ans**: 'cat' in spam checks if 'cat' is among the dictionary keys, while 'cat' in spam.values() checks if 'cat' is among the dictionary values.

7. What is a shortcut for the following code?

if 'color' not in spam:

spam['color'] = 'black'

**Ans**: spam.setdefault(‘color’, ‘black’)

1. How do you "pretty print" dictionary values using which module and function?

**Ans**: You can use the pprint module and its pprint() function from the pprint (pretty-print) module:

from pprint import pprint

my\_dict = {'key1': 'value1', 'key2': 'value2'}

pprint(my\_dict)