Question #1 Write a function get_max() that takes a list of numbers and returns its maximum value.

```python
#Created a function called get_max that will get the highest value in the list
def get_max():

    #Created a list called highestnumber which contains a list a values
    highestnumber = [10, 4, 5, 29, 1, 100, 3]

    # returns the highestnumber in the list
    return max(highestnumber)
#Prints out the highest number in the list.
print("The largest number in the list is: ", get_max())
The largest number in the list is:  100
```

Question #2

Write a function get_unique that takes a list of numbers and returns the number of unique values and a list containing all unique values.

```python
#created a function called get_unique which will take List1 as a parameter value
def get_unique(List1):
    #Created two empty list A, B
    A = []
    B = []
    # this forloop will assign all the list1 values to uniquenumber
    for uniquenumber in List1:
        if uniquenumber not in A: #If the value in the list1 is not already in the
list A
            A.append(uniquenumber) #Append that list value to the list
    print(A) #It will print all the values of List A

    # this forloop will assign all the list1 values to uniquenumber
    for uniquenumber in List1:
        B.append(uniquenumber) #Take the values of uniquenumber and Append it to li
st B

        #Converts the list B into a set. Sets don't allow duplicate values and puts
it in the number_of_unique
        number_of_unique = len(set(B))
```

```
    print(number_of_unique) #Prints the amount of unique values

get_unique([10,4,4,6,1,12,15,10,10,4,24])
[10, 4, 6, 1, 12, 15, 24]
7
```

Homework Question 3

Class Name DataHandler that achieves the *init*() method assigns it to self.list

Uses the following method and returns it values. shape, mean, variance, std

```python
import statistics #Imported the statistcic Library
class DataHandler():
    list2 = [10,4,2,10,2]  #created a class object attribute called list2

    def __init__(self, list2):
        self.list2 = list2

    def get_shape(self, list2):
        return '{}'.format(self.list2)
    print(len(list2)) #returns the length of the list2

    def get_mean(self):
        return '{}'.format(self.list2)
    #print(sum(list2) / len(list2))
    print(statistics.mean(list2)) # returns the mean of  list2

    def get_variance(self):
        return '{}'.format(self.list2)
    statistics.pvariance(list2)
    print(statistics.pvariance(list2)) #returns the variance of list2

    def get_std(self):
        return '{}'.format(self.list2)
    statistics.stdev(list2)
    print(statistics.stdev(list2)) #returns the standard deviation of the list
5
5.6
13.44
4.09878030638384
```