

## Python Variable Types - Questions

1. What are the different primitive data types in Python, and provide an example for each.
2. What is the difference between mutable and immutable variables in Python? Provide two examples of each.
3. Explain the difference between local and global variables in Python. How can you modify a global variable inside a function?
4. What is a list in Python, and how is it different from a tuple? When should you use a list over a tuple?
5. What is a dictionary (dict) in Python? How does it differ from other data structures like lists or sets?
6. What are NoneType variables in Python? Provide an example of how and when you would use None.
7. What is the difference between set and list data types in Python? Can a set contain duplicate values?
8. How do you create a variable of a specific type in Python, and how can you change its type later? Provide examples of typecasting.
9. What are the different ways to assign multiple variables at once in Python? Provide an example.
10. What is the difference between shallow copy and deep copy when working with variables in Python? Provide examples.

## Python Variable Assignment and Printing Practice Questions

1. How do you assign a value to a variable in Python? Provide an example.
2. How do you assign values to multiple variables in one line in Python?
3. How do you assign the same value to multiple variables at once?
4. Write a Python code to swap the values of two variables.
5. How can you assign a variable with a string value and print it?
6. Assign an integer and a float value to two variables, then print their sum.
7. How can you use f-string to print a message that includes a variable's value?
8. What is the difference between printing the value of a variable and using a return statement? Write a code example to explain.
9. How do you use the input() function to assign a user-input value to a variable and then print it?
10. Write a Python code that assigns two numbers to variables and prints the result of their multiplication.
11. Assign a string and a number to two variables and print them using a single print() statement.
12. How can you assign a list of numbers to a variable and print the third element?

13. How do you use the `type()` function to check the data type of a variable and print it?
14. Write a Python program to assign a boolean value to a variable and print its value.
15. Create a program that assigns your first name and last name to two variables, then prints them  
as a full name.