

Structure Programming Dr. Heba El Hadidi

Exercise-3:

What is the output if $num1=4$, $num2=3$, $num3=2$

- a) `num1 += num2 + num3
print(num1)`
- b) `num1 = num1 ** (num2 + num3)
print(num1)`
- c) `num1 **= num2 +
num3 print(num1)`
- d) `num1 = '5' +
'5'
print(num1)`

1) Write a program that take as input: Name, Age, Height, Weight
-Then, display all these information.

2) Modify the example 27 to convert miles to kilometers using the
following formula. **kilometers = miles / conv_fac**

3) Create variables first name and last name2, then combine it to full
name3

Print the name4

Calculate the length of characters for full name, taking input from user

4) Write a program that taking input for: Name, Age, Height, Weight
Then display all the information

5) Write a Python program which accepts the radius of a circle from the
user and compute the area.

6) Which data type will be used to represent the following data values
and why?

- a) Number of months in a year
- b) President of USA or not

- c) Mobile number
- d) Pocket money
- e) Volume of a sphere
- f) Perimeter of a square
- g) Name of the student
- h) Address of the student

- 7) Write a program to calculate in how many days a work will be completed by three persons A, B and C together. A, B, C take x days, y days and z days respectively to do the job alone. The formula to calculate the number of days if they work together is $xyz/(xy + yz + xz)$ days where x, y, and z are given as input to the program.
- 8) Write a program to repeat the string “GOOD MORNING” n times. Here ‘n’ is an integer entered by the user.
- 9) The formula $E = mc^2$ states that the equivalent energy (E) can be calculated as the mass (m) multiplied by the speed of light (c = about 3×10^8 m/s) squared. Write a program that accepts the mass of an object and determines its energy.