Feb5 DSA Day1

February 6, 2021

```
[1]: 3 + 5
 [1]: 8
 [2]: 2 ** 8
 [2]: 256
 [3]: 2 * 3
 [3]: 6
 [6]: a = b = c = 10
      print(a, end = " ")
      print(b, end = " ")
      print(c)
     10 10 10
 [7]: a = b = c = 10
      print(a, b, c)
     10 10 10
     x = 20 \text{ print}(type(x)) \text{ print}(id(x))Dynamically typed language}
[11]: x = 'hello'
      print(type(x))
      <class 'str'>
[12]: a, b, c = 10, 20, 30
      print(a, b, c)
     10 20 30
[13]: a, b = 10, 20
```

```
temp = a
      a = b
      b = temp
      print(a, b)
     20 10
[15]: a, b = 10, 20
      a, b = b, a
      print(a, b)
     20 10
[17]: a = b = c = 10
      print(id(a))
      print(id(b))
      print(id(c))
      b = 20
      print(b)
      print(id(a))
      print(id(b))
      print(id(c))
     1650550080
     1650550080
     1650550080
     20
     1650550080
     1650550240
     1650550080
[18]: print(a, b, c)
     10 20 10
[19]: b = 10
      print(id(b))
     1650550080
```

1 Input in Python

```
[20]: x = input('Enter a value: ')
      print(x)
     Enter a value: 25
     25
[24]: x = input('Enter val 1: ')
      y = input('Enter val 2: ')
      print(type(x), type(y))
      print(x + y)
     Enter val 1: 25
     Enter val 2: 12
     <class 'str'> <class 'str'>
     2512
[23]: print('hello ' + 'coders')
     hello coders
[25]: x = int(input('Enter val 1: '))
      y = int(input('Enter val 2: '))
      print(type(x), type(y))
      print(x + y)
     Enter val 1: 25
     Enter val 2: 12
     <class 'int'> <class 'int'>
     37
[27]: a = 'hello'
      b = int(a)
      print(type(b))
             ValueError
                                                        Traceback (most recent call_
      →last)
             <ipython-input-27-5da4789ed966> in <module>
```

```
5 print(type(b))
            ValueError: invalid literal for int() with base 10: 'hello'
[31]: x = input('Enter values: ').split()
     print(x)
     1 = []
     for i in x:
         1.append(int(i))
     print(1)
     Enter values: 10 20 30 40 50
     ['10', '20', '30', '40', '50']
     <class 'list'>
     [10, 20, 30, 40, 50]
[32]: x = [int(i) for i in input('Enter values: ').split()]
     print(x)
     Enter values: 10 20 30 40 50
     [10, 20, 30, 40, 50]
[33]: a = int(input('Enter values: '))
     print(a)
     Enter values: 10 20 30 40 50
                     -----
            ValueError
                                                   Traceback (most recent call_
      →last)
            <ipython-input-33-7ea439596117> in <module>
        ----> 1 a = int(input('Enter values: '))
              2 print(a)
```

1 a = 'hello'

---> 3 b = int(a)

ValueError: invalid literal for int() with base 10: '10 20 30 40 50'

```
[34]: 1 = [10, 20, 30]
1.append(40)
print(1)

[10, 20, 30, 40]

[36]: x = 'a'
print(ord(x))

97

[39]: x = 122
print(chr(x))
z

[]:
```