1.How many seconds are in an hour? Use the interactive interpreter as a calculator and multiply the number of seconds in a minute (60) by the number of minutes in an hour (also 60).

sol. 3600 seconds in an hour

2. Assign the result from the previous task (seconds in an hour) to a variable called seconds\_per\_hour.

Answer: seconds\_per\_hour = 3600

3. How many seconds do you think there are in a day? Make use of the variables seconds per hour and minutes per hour.

Answer: seconds\_per\_hour\*minutes\_per\_hour = 3600\*60. There 86400 seconds in a day.

4. Calculate seconds per day again, but this time save the result in a variable called seconds\_per\_day

Answer: seconds\_per\_day = seconds\_per\_hour \*24

5. Divide seconds\_per\_day by seconds\_per\_hour. Use floating-point (/) division.

Answer: seconds\_per\_day/seconds\_per\_hour = 86400/3600 = 24.0

6. Divide seconds\_per\_day by seconds\_per\_hour, using integer (//) division. Did this number agree with the floating-point value from the previous question, aside from the final .0?

Answer : seconds\_per\_day // seconds\_per\_hour = 24. No , this value is of type int. Previous question value was a float

7. Write a generator, genPrimes, that returns the sequence of prime numbers on successive calls to its next() method: 2, 3, 5, 7, 11, ...

Answer:

def evengen(n):

for i in range(n):

if i%2==0:

yield i

even\_list = []

for i in evengen(10):

even\_list.append(i)

print(even\_list,end=' ')