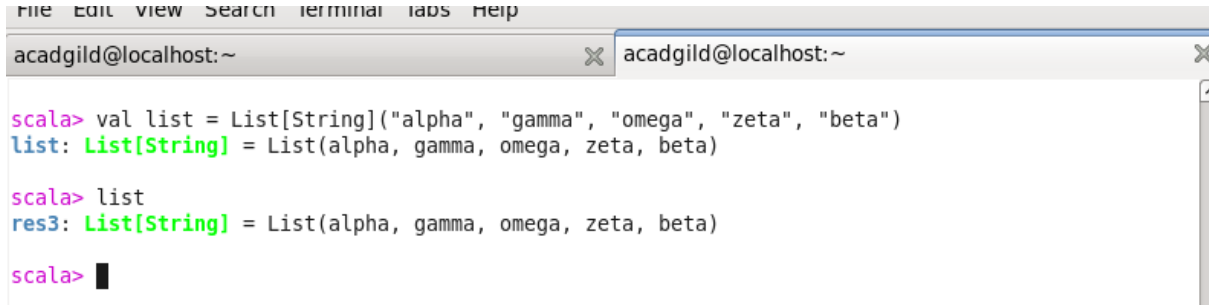


Assignment-14

Task 1

Given a list of strings - List[String] ("alpha", "gamma", "omega", "zeta", "beta")

Created the list of strings as given in the question.



```
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acadgild@localhost:~
acadgild@localhost:~

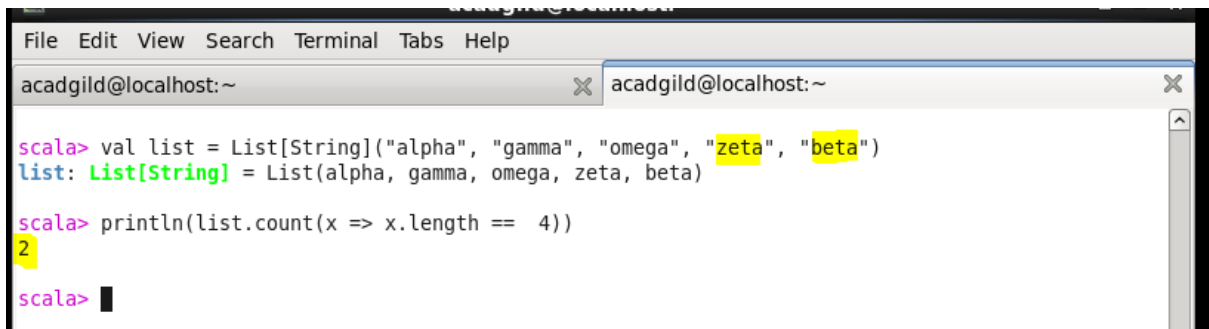
scala> val list = List[String]("alpha", "gamma", "omega", "zeta", "beta")
list: List[String] = List(alpha, gamma, omega, zeta, beta)

scala> list
res3: List[String] = List(alpha, gamma, omega, zeta, beta)

scala> █
```

➤ Find count of all strings with length 4.

Count of all strings in the list with length equal to 4 has been printed using the command shown in the screenshot.



```
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acadgild@localhost:~

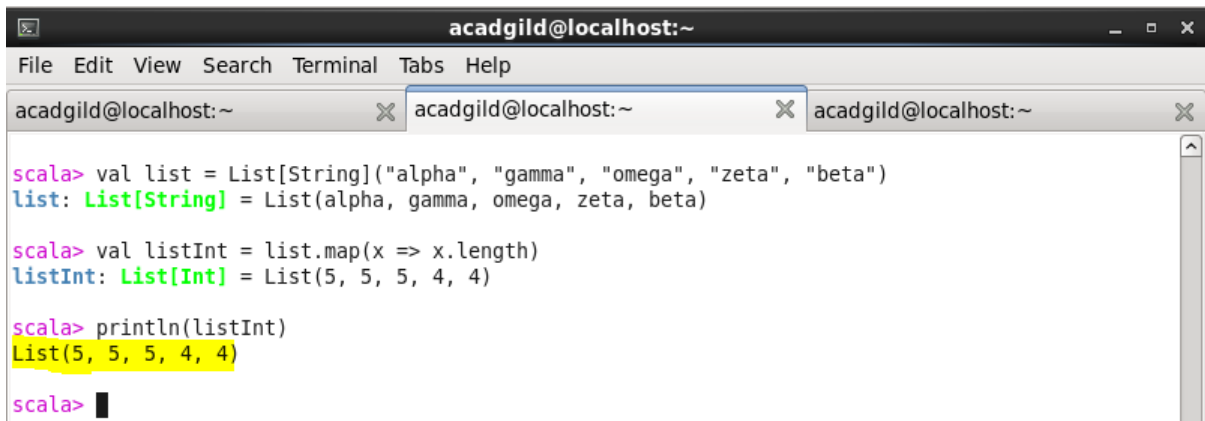
scala> val list = List[String]("alpha", "gamma", "omega", "zeta", "beta")
list: List[String] = List(alpha, gamma, omega, zeta, beta)

scala> println(list.count(x => x.length == 4))
2

scala> █
```

➤ **Convert the list of string to a list of integers, where each string is mapped to its corresponding length.**

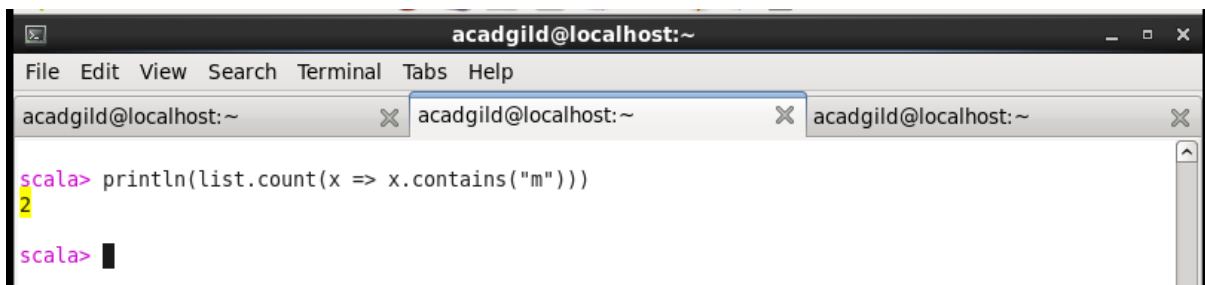
Converted the list of string into list of integers using “**map**” as shown in the below screenshot.



```
acadgild@localhost:~  
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acadgild@localhost:~ acadgild@localhost:~ acadgild@localhost:~  
  
scala> val list = List[String]("alpha", "gamma", "omega", "zeta", "beta")  
list: List[String] = List(alpha, gamma, omega, zeta, beta)  
  
scala> val listInt = list.map(x => x.length)  
listInt: List[Int] = List(5, 5, 5, 4, 4)  
  
scala> println(listInt)  
List(5, 5, 5, 4, 4)  
  
scala> █
```

➤ **Find count of all strings which contain alphabet ‘m’.**

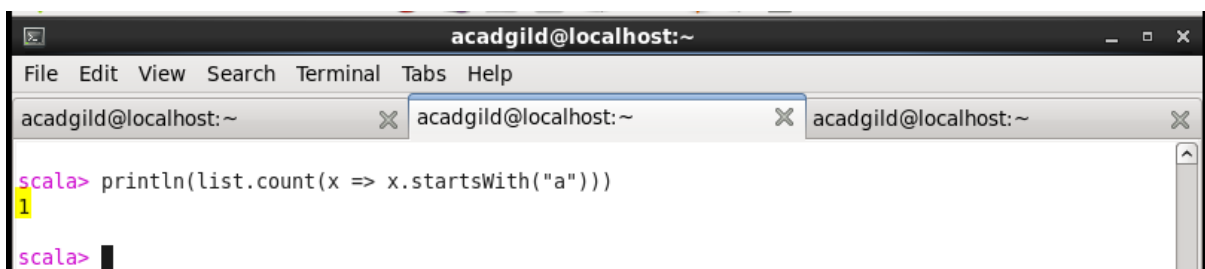
Count of all strings which contain alphabet ‘m’ has been found as shown in the below screenshot.



```
acadgild@localhost:~  
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acadgild@localhost:~ acadgild@localhost:~ acadgild@localhost:~  
  
scala> println(list.count(x => x.contains("m")))  
2  
  
scala> █
```

➤ **Find the count of all strings which start with the alphabet ‘a’.**

Count of all strings which starts with ‘a’ has been found as shown in the below screenshot.

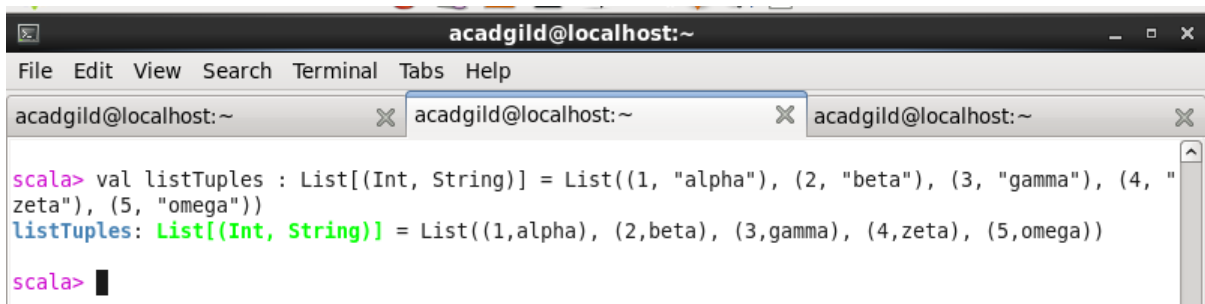


```
acadgild@localhost:~  
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acadgild@localhost:~ acadgild@localhost:~ acadgild@localhost:~  
  
scala> println(list.count(x => x.startsWith("a")))  
1  
  
scala> █
```

Task 2:

Create a list of tuples, where the 1st element of the tuple is an int and the second element is a string.

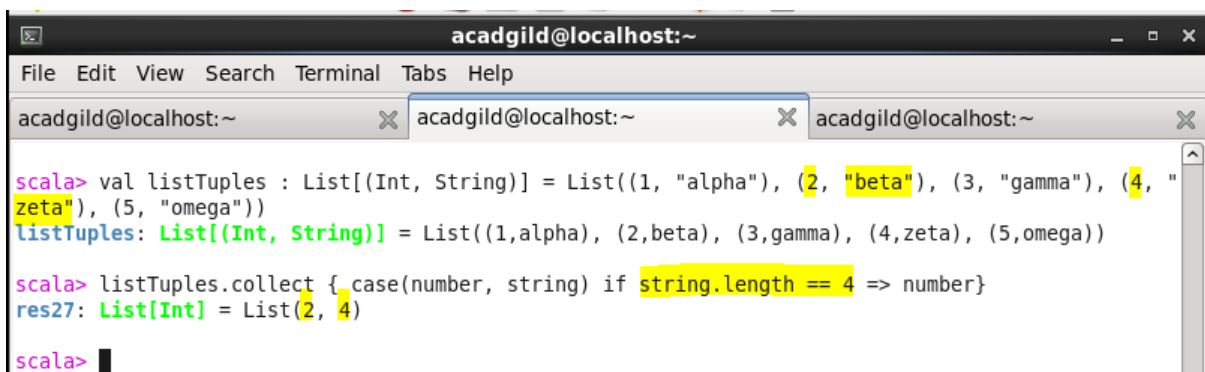
Created the list of tuples as per the question.



```
acadgild@localhost:~  
File Edit View Search Terminal Tabs Help  
acadgild@localhost:~ acadgild@localhost:~ acadgild@localhost:~  
scala> val listTuples : List[(Int, String)] = List((1, "alpha"), (2, "beta"), (3, "gamma"), (4, "zeta"), (5, "omega"))  
listTuples: List[(Int, String)] = List((1,alpha), (2,beta), (3,gamma), (4,zeta), (5,omega))  
scala> █
```

➤ For the above list, print the numbers where the corresponding string length is 4.

Printed the numbers where the corresponding string length equal to 4 as shown in the below screenshot.

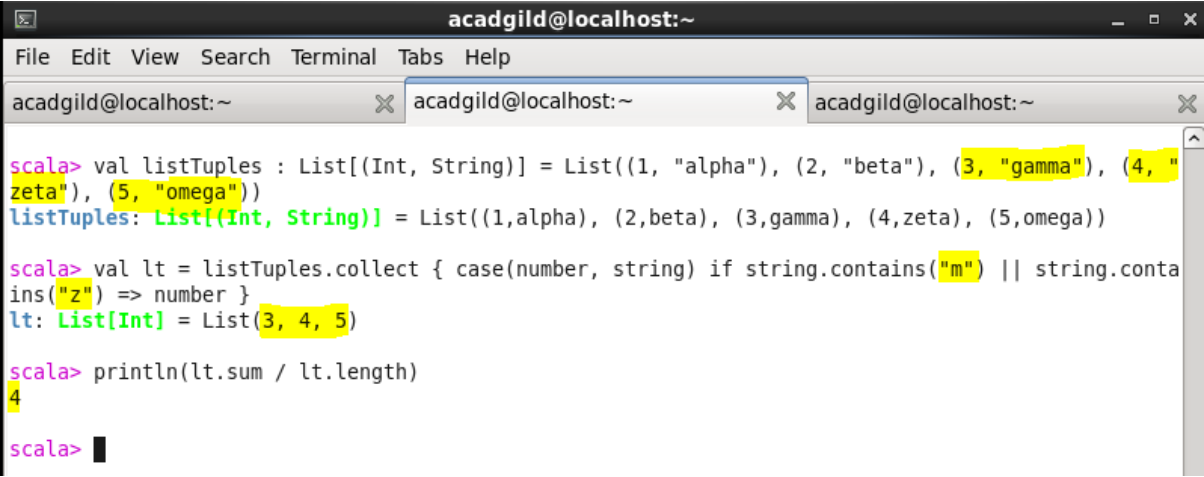


```
acadgild@localhost:~  
File Edit View Search Terminal Tabs Help  
acadgild@localhost:~ acadgild@localhost:~ acadgild@localhost:~  
scala> val listTuples : List[(Int, String)] = List((1, "alpha"), (2, "beta"), (3, "gamma"), (4, "zeta"), (5, "omega"))  
listTuples: List[(Int, String)] = List((1,alpha), (2,beta), (3,gamma), (4,zeta), (5,omega))  
scala> listTuples.collect { case(number, string) if string.length == 4 => number}  
res27: List[Int] = List(2, 4)  
scala> █
```

- Find the average of all numbers, where the corresponding string contains alphabet 'm' or alphabet 'z'.

The average of all the numbers where the corresponding string contains alphabet 'm' or 'z' as shown in the below screenshot.

First the numbers corresponding to alphabets 'm' or 'z' has been found and there after it is averaged.



```
acadgild@localhost:~
File Edit View Search Terminal Tabs Help
acadgild@localhost:~ acadgild@localhost:~ acadgild@localhost:~
scala> val listTuples : List[(Int, String)] = List((1, "alpha"), (2, "beta"), (3, "gamma"), (4, "zeta"), (5, "omega"))
listTuples: List[(Int, String)] = List((1,alpha), (2,beta), (3,gamma), (4,zeta), (5,omega))
scala> val lt = listTuples.collect { case(number, string) if string.contains("m") || string.contains("z") => number }
lt: List[Int] = List(3, 4, 5)
scala> println(lt.sum / lt.length)
4
scala> 
```