

Write Scala programs to solve the following problems. Do not use Spark. Try to use appropriate data structures and avoid using traditional Java-style loops if possible.

Q1[10]. The program reads a file full of integers and computes the number of integers that are divisible by 3.

Q2[10]. The program reads a file that contains the date and a temperature that is measured for this day. There can be multiple temperatures that are measured each day. The program should print to the screen the highest temperature for each day.

Q3[10]. Consider an input file with the following example input.

```
John Back, 23, B, CSC366
Bob Wilson, 11, B, CS201
John Back, 23, A, CSC369
```

In general, the input file will contain the student name, the student ID number, grade, and course. The program should print the student name, student id, and the list of classes for that student. The output should be **sorted by** name and then sorted by grade for each name. Here is example output.

```
Bob Wilson, 11, (B, CS201)
John Back, 23, (A, CSC369), (B, CSC366)
// sorted by name and then by grade
```