



CS 112 - Intro to Computer Science II - Java Homework Exercises (5 - 10 points each)

Chapter 10 - Programming Projects Handout #2

Project 1:

1. Write a program that reads a file of numbers of type **int** and outputs all the numbers to another file, but without any duplicate numbers. Assume that the input file is sorted from smallest first to largest last. After the program is run, the new file will contain all the numbers in the original file, but no number will appear more than once in the file. The numbers in the output file should also be sorted from smallest to largest. Your program should obtain both file names from the user. Use a text file that stores one number per line.

Project 2:

1. Write a program that allows you to write and read records of type `PetRecord` (available on the K: drive) to a file. The program asks the user to choose between reading and writing from a file. In either case, the program next asks for the file name. If the user asked to write to a file, they can enter as many records as desired. If the user asked to read from a file, they are shown all of the records in the file. Be sure that the records do not scroll by so quickly that the user cannot read them. Redefine the class `PetRecord` so that it is serializable.
2. Write a program that reads records of type `PetRecord` from the file created in step 1 and outputs the following information to the screen: the name and weight of the largest pet, the name and weight of the smallest pet, the name and age of the youngest pet, and the name and age of the oldest pet. Could there be pets with the same name, weight and age?

