

IST 256
Lab Week 14, Part 1 – April 20, 2009

1. Extending a Program with Hierarchical Record Structures

Use the program that you used in the last two labs:

- a. Go to the C: drive and make a folder at the top level with your name or userid, something like: C:\njmccrac
- b. Copy your StudentRecords project from the H: drive to the C: drive.
- c. Open Visual Studio and go to create a open project/solution When this Dialog box opens, pick the version of the StudentRecords on the C: drive.

Since we are modifying the StudentRecords program from last week’s lab, make sure that you have finished those and printed them before you modify it for today.

- d. Use the data file “students.txt” from your project in the **C:\name\StudentRecords\bin\Debug** in your C: drive folder as you modified it last time. Each line looks something like:

Alex, M, 20, 73, 3.06, Dellplain, 326

Check your file that each line has 7 items, separated by 6 commas.

- e. Extend the form that we did last time by adding another button to search for a dorm (given in a textbox) and a label to display all the students in that dorm. The form will look something like:

|__Read Student Records__| Status (label)

|__Number__| Number of Females (label) Number of Males (label)

|__Find Oldest Student__| |_____| (textbox for result)

|__Type Student Name for Search:__| |_____| (textbox for input)

Student Result: (Label)

|__Type Dorm for Search:__| |_____| (textbox for input)

Students in Dorm: (Label)

|_Close_|

- f. Click on the new button to add its procedure heading to the program.

g. Now go to the program and change the button procedure for the student name search so that it will search for wild card matches.

First go to the very top of the program, even before the Public Class line, and put
Option Compare Text

Next change the comparison of the students name from using the “=” operator to using the “Like” operator.

h. Finally, write code for the new button. It should read the dorm name from the new TextBox. It should then have a loop that goes through the student array and finds any array element with that dorm name and display that student’s information. All students that are in that dorm should be displayed by appending each student result to the label.

Test your program.

Print and hand in the new version of the StudentRecords program and hand in the program for lab along with Wednesday’s lab.

***** **At the end of lab** *****

Go to the C: drive where you put your folder with your name. Copy and paste this entire folder to the H: drive under your IST256 projects.

***** **Don’t forget to save your work!** *****