# Assignment #7

### CIT1156 - Programming II

## **Objective:**

Developing skills implementing C# syntax, including:

-GUI events -creation of a custom class -event handlers -defining class attributes -control properties -define class properties

#### **Overview:**

For this assignment we will be adding some more features to the last application created. While still tracking some details on a sports team, we will utilize some very useful features that are available in the graphical design environment. In particular we will use a list component that stores a large number of objects. We will also implement an interface to allow the sorting of the data objects and define a method to allow these data objects to be displayed as a string. Additional, any application that deals with data will also need to store and retrieve the data from a file.

### **Steps:**

- 1. Define the custom class that will be used to store the data for each player entered into this application. The attributes/properties that are required are player's name, jersey number and goals scored.
- 2. Ensure that the IComparable interface is implemented to allow the sorting of these object. Devise a method to allow the method to compare any of the properties of the class.
- 3. Create a method that can be used to create a string that represents objects of this data type.
- 4. Design the form to have the appropriate number of text boxes for the information that is required for one player and a listbox to hold all the player. Label the text boxes so the user will know how to enter the data and add a button to the form that will add the object to the listbox.
- 5. A sorted display would be really nice for the user. Add appropriate radio buttons to allow the user to select the sort field (i.e. alphabetically, by jersey number, goals) and a check box to allow the user to reverse to sorted order.
- 6. Add a double click event on the list box that will allow the user to edit the object clicked on. Take the data from the object and populate the individual fields with the information. Have an update button store this new data back into the listbox. You can either update the existing object or perhaps you might find it easier to delete the old object and insert the new one back into the original place.
- 7. Create a menuStrip that will have three options namely: Load file, Save file and Close. The file routines can be done in any way you would like but you are required to use the Load and Save dialog components that are available in visual Studio.