Setup Guide

For Caesar Cai’s 2012 Computer Science Senior Capstone Project “Text Recognition”

1. **Hook Up and Install**

Unzip the zip file, cut and paste the whole Final Program folder to the root of C driver. Make sure the tessnet2\_32.dll and its language folder, tessdata, is set under “~\bin\Debug” folder. The configuration file is also required for run the program in .NET Framework 4.

1. **Compile and Link**

Visual Studio 2010 and .NET Framework 4 are required for compiling this project. If your computer has not installed them, you can download them in the Document Download Center in my website.

If you have them installed, double click TextRecognition.csproj to load the project into Visual Studio 2010. Then, you should be able to compile and link the program.

1. **Initialize**

There is no special requirement of Initialization for this project.

1. **Use**

The user should first load a picture by clicking the Start button on the top.

If it is a nice and clear text picture, the user can click "Quick Recognition" button on the right, then the program will finish the recognition automatically. However, the Quick Recognition can only handle black text, and it can be less accurate.

Otherwise, the user may click "Full Process" button on the left for more complex pictures, the full process of recognition should be more accurate, but take more steps and time.

1. **Detailed**
2. In my experience, a picture with bold font texts has better result than the slim font text picture, especially for the quick process.
3. While the user selects the text area in the first step of full process, the user should try to avoid the invalid part.
4. When picking a color of text, don't pick a color seems too dark or too light than the rest of the text color, an average one will be nice.
5. In team of denoising block size, 10-20 for bold font and 2-6 for slim font are suggested. However, the user may enter 1, if the picture seems clear enough to be recognized.
6. **Hints on Operation**

There are users’ hints in the right side text window for each step. The users should be able to follow it easily.