

## == Other Plugins ==

I am aware of 3 other Eiffel Eclipse plugins.

[1] EfE. A simple interface to the SmartEiffel compiler. It places buttons in the toolbar to run SmartEiffel commands (eg compile, short). However it does not create an eclipse builder, so compilation cannot be manually run. The buttons cannot be removed, so if one is using eclipse on non-eiffel projects/files those buttons are still there. It includes a simple syntax highlighter.

[2] EDT <<http://sourceforge.net/projects/edt>>

Hadn't been updated in 2 years, so didn't work on modern eclipse. It had recently been revived, but was restarted from scratch. The new plugin interfaces with an eiffel compiler in a very platform specific way. Few other features are implemented.

[3] EEDT <<http://sourceforge.net/projects/eedt>>

This plugin is quite large but requires other packages to be install and ran in order to install. It is quite unstable. However the compiler interface is not yet implemented. I was not able to fully evaluate this as it is difficult to install and is unstable.

## == My Plugin and Future Work ==

By using some of the example eclipse plugins I was able to write a simple eiffel plugin. It interfaces with the SmartEiffel compiler in a platform independent way, can parse it's error messages and has simple syntax highlighting.

The plugin I wrote could be extended to add more features. A more likely option would be if the code was used by other plugins. With this in mind I wrote a document describing how the plugin works. It goes through how the builder works, including any 'gotchas' that I discovered. That should make it easier for other developers to use that code. It's called 'hacking.txt' and is in the top level of the plugin. I was investigating using SmartEiffel new 'Visitor' features to parse eiffel files. This would make writing an outline view or refactorer possible. However there is not a lot of documentation on using that feature.

## == Comparison with original project specifications ==

The original project proposal required a more fully featured plugin that what I finally delivered. Learning the eclipse platform took some of my time. Since most of the other eiffel plugins are still in alpha status and not very stable, I spent longer than expected trying to evaluate them. Many features for an IDE (like syntax indentation, refactoring, outline view), require a parser for that language. Although this is a common requirement for programming language based IDEs, eclipse does not provide this functionality. One must write one oneself. The SmartEiffel compiler team had written an eiffel parser (in eiffel), however I was hindered by the lack of documentation, which further delayed me. I believe this problems and the short (10 week) length, were the main reasons for not meeting all the requirements.