# **PyPrototype Documentation**

Release 0.0.2

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## CHAPTER 1

Overview

PyPrototype is a model layout for a Python project in a GitHub repository. It is planned that the project will be made available through the Python Packaging Index (PyPI) and the documentation published at ReadTheDocs.org.

Contents:

#### **README: PyPrototype**

prototype repository of a Python project

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docs http://PyPrototype.readthedocs.org

git https://github.com/prjemian/PyPrototype.git

**PyPI** https://pypi.python.org/pypi/PyPrototype

**TODO list** https://github.com/prjemian/PyPrototype/issues

### How to Install PyPrototype

The basic installation procedure:

- 1. install Python 2.7
- 2. install PyPrototype

#### **Background**

This program requires Python 2.7 (not ready for Python 3 yet) and several additional packages. Most of the package dependencies are met by using a Python distribution (provides Python, the basic package suite, and other popular packages).

The major package requirements are:

• PyQt4: provides the graphical user interface widgets

#### **Python**

It is suggested to use the Anaconda Python 2.7 distribution<sup>1</sup> as it contains most of the packages used by this program.

- 1. use a web browser and visit: https://www.continuum.io/downloads
- 2. select the distribution for your operating system
- 3. make sure to follow links for Python 2.7
- 4. download the installer file
- 5. follow the instructions to install on your computer

#### **PyPrototype**

Install this program from the Python Package Index (PyPI) using the *pip* command:

```
pip install pyRestTable
pip install --no-deps PyPrototype
```

The -no-deps option tells pip not to download and attempt to build newer versions of other required packages such as lxml.

It *may* be necessary to install the *lxml* package if your distribution does not already have it installed. You can view all the installed packages using this command:

```
pip list
```

The list may have dozens or more items. To install *lxml*:

```
pip install lxml
```

#### Updating PyPrototype

To update to a newer version of *PyPrototype*, use this command:

```
pip install -U --no-deps PyPrototype
```

The -U option tells *pip* to search for and install the latest package update.

<sup>&</sup>lt;sup>1</sup> Anaconda Python 2.7: https://www.continuum.io

#### **Alternative Installation steps**

It is possible to install **PyPrototype** using steps common to Python developers, such as:

```
pip install https://github.com/prjemian/PyPrototype
```

or:

```
git clone install https://github.com/prjemian/PyPrototype.git
cd pyprototype
python ./setup.py install
```

Working from a GitHub clone is not recommended for regular use.

#### module: main

Main code runs the command-line program.

usage:

```
python main.py [input_file]

PyPrototype.main.main()
    start the program

PyPrototype.main.process_command_line()
    support command-line options such as `--help` and `--version`
```

#### module: main\_gui

main\_gui.Main code runs the GUI.

usage:

```
python main_gui.py [input_file]

PyPrototype.main_gui.main()
    start the program

PyPrototype.main_gui.process_command_line()
```

#### **History of Source Code Changes**

support command-line options such as `--help` and `--version`

```
0.0.2 initial setup0.0.1 concept verbalized
```

1.3. module: main 5

#### **Source Code License**

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```

## CHAPTER 2

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