Code is poetry

Template-based webserver created by
Olle Kvarnström and Maija Vilkina.
A simple-to-use webserver for users who may not
have much experience with HTML.

Installation and maintenance

Linköpings universitet
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System description

myFlaskProject is a template-based webserver created by Olle Kvarnström and Maija Vilkina. Our goal is to provide a simple-to-use webserver for users who may not have much experience with HTML.

This manual contains technical instructions on installation, etc. If you are looking for the user manual, please see the doc folder.

Installation

The system can be run in the most common operating systems: Windows 7, OSX and Linux Ubuntu.

There are two dependencies for myFlaskProject: Python (version 3.3.2 or higher) and Flask.
Since we recommend running Flask inside virtualenv, we've included it in our instructions.

Windows 7

Installation instructions for operating system Windows 7

Installing Python and VirtualEnv
1. Download and install Python from this link.
2. Please install it to C:\Python33 as is the default.
3. Download and extract VirtualEnv, which can be found here: link
4. Open up Command Prompt and navigate to the folder where you extracted VirtualEnv
5. Type the following and press enter: C:\Python33\python.exe setup.py install
6. Now you have installed both Python And VirtualEnv. If you like you can remove the extracted folder.

Fetch the newest myFlaskProject build
1. Download the latest version of myFlaskProject through this link (requires a valid LiU-ID).
2. Extract the contents to a suitable location (choose a location wisely, as moving it later might cause issues).
3. Open up Command Prompt and navigate to the newly extracted folder, then open tdp003. Here we will initialise a virtual environment, so please run the following command:

    ```
    C:\Python33\python.exe -m virtualenv venv
    ```

4. This will create a new virtual environment which you will need to "activate" every time before starting of stopping myFlaskProject.
5. Activating is done by typing this: (please do so now)

    ```
    venv\scripts\activate
    ```

6. Now, the last step is installing Flask, type the following:

    ```
    pip install flask
    ```

Mac OS X

Installation instructions for operating system Mac OS X

Step 1: Installing Python and VirtualEnv
1. Download and install Python from this link.
2. Download and extract VirtualEnv, which can be found here: link
3. Open up a terminal (if you have not already) and navigate to the folder where you extracted VirtualEnv
4. Type the following and press enter
5. sudo python3 setup.py install
6. Now you have installed both Python And VirtualEnv. If you like you can remove the extracted folder.

Step 2: Fetch the newest myFlaskProject build
1. Download the latest version of myFlaskProject through this link (requires a valid LiU-ID).
2. Extract the contents to a suitable location (choose a location wisely, as moving it later might cause issues).
3. Open up a terminal (if you haven't done so already) and move to the extracted folder, then tdp003. Here we will initialise a virtual environment, so please run the following command:

```
virtualenv venv
```

This will create a new virtual environment which you need to "activate" every time before starting or stopping myFlaskProject.
Activating is done by typing this: (please do so now)

```
. venv/bin/activate
```

Now, the last step is installing Flask

```
pip install flask
```

Linux

Installation instructions for operating system Linux

Step 1: Install Python and VirtualEnv

1. If you have Debian/Ubuntu or similar, run this in your terminal:

```
sudo apt-get update && sudo apt-get install -y python3 virtualenv
```

If you have Fedora/RHEL or similar, run this in your terminal:

```
yum install python3 virtualenv
```

If you have Slackware, there are slackbuilds here and here.

Step 2: Fetch the newest myFlaskProject build

1. Download the latest version of myFlaskProject through this link (requires a valid LiU-ID).
2. Extract the contents to a suitable location (choose a location wisely, as moving it later might cause issues).
3. Open up a terminal (if you haven't done so already) and move to the extracted folder, then tdp003. Here we will initialise a virtual environment, so please run the following command:

```
virtualenv venv
```

This will create a new virtual environment which you need to "activate" every time before starting or stopping myFlaskProject.
Activating is done by typing this: (please do so now)

```
. venv/bin/activate
```

Now, the last step is installing Flask

```
pip install flask
```

Managing the application

Most common commands to start and stop the application in various operating systems. Logging and PID.

Starting/Stopping the webserver

In order to start or stop the webserver you will need to open up a terminal and nagivate to the folder where you installed myFlaskProject.
Here you can type in one of the following commands and then press enter:

```
python web/myFlaskProject.py start

python web/myFlaskProject.py stop

(not available to windows)
```

It is possible to choose a different port than the standard (port 80) by adding the port number after start. I.e:

```
python web/myFlaskProject.py start 5000
```

Which will start the server on port 80.

If you receive the following error message **"Unable to import flask"** you probably have forgotten to initialize venv. Run this command and then try again:

```
. venv/bin/activate

(or venv\scripts\activate if using Windows)
```

Process management

If you are using Linux or Mac OS X, the webserver will detach from your shell and run as a background process ("daemon").
This means that you will be able to logout from your account and the webserver will continue running.
However, if you are using Windows, the webserver will run inside your terminal window.
This means that if you close the window or log out, the webserver will shut down as well.

User Manual

Please see the doc folder for a user manual

Logging

The application will create a "log"-file in the tdp003-directory, which will record all access to the webserver.
Please **do not modify the log-file** while myFlaskProject is running, as doing so may cause it to stop logging and/or to shut down.

PID

You may also notice a file named "pid". Please keep your paws off this file as it tracks the running process ID.