

Facebook apps using Python+Django+GAE

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Part II: Google App Engine

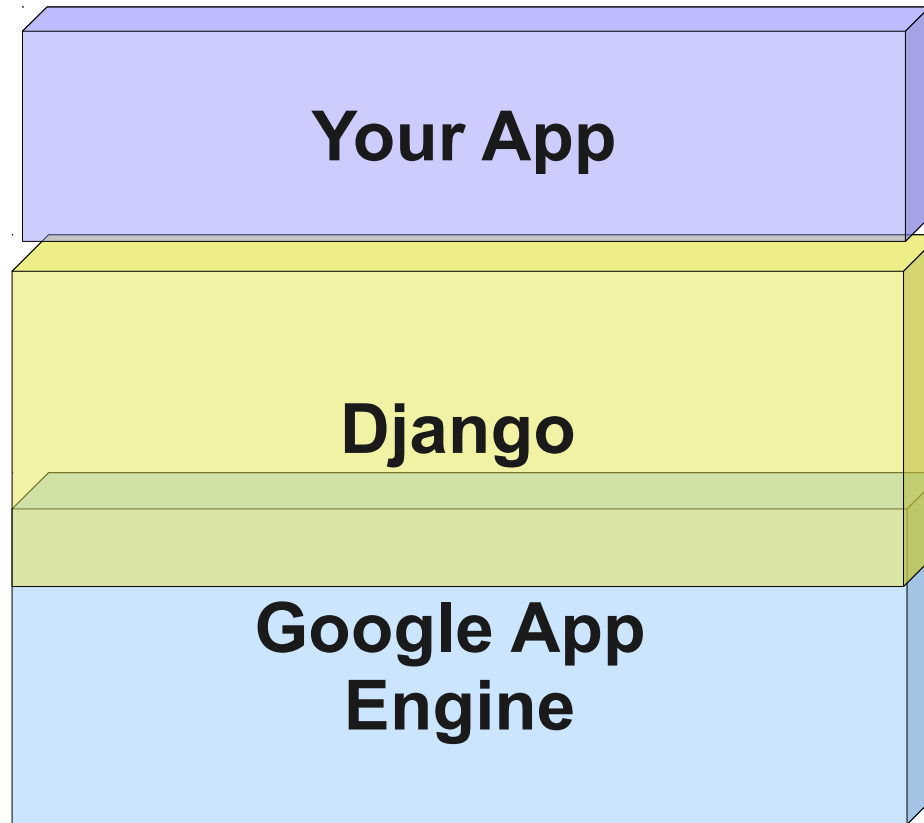
What's django

- <http://www.djangoproject.com/>
- “Django is a high-level Python Web framework that encourages rapid development and clean, pragmatic design.”
- DRY (Don't Repeat Yourself)
<http://c2.com/cgi/wiki?DontRepeatYourself>
- ORM (Object Relational Mapping) + Templates (for views) + Forms + Much more

Stripping down Django

- For GAE we cannot use the full framework
- We use BigTable!
- Google modified some of its components. So be aware that not everything you found on Internet for Django will work on GAE

Framework



Ingredients

- Python <http://www.python.org/download/>
- Google App Engine
<http://code.google.com/appengine/downloads.html>
- Django <http://www.djangoproject.com/download/>
- GAE Django helper
<http://code.google.com/p/google-app-engine-django/>
- Eclipse + pydev (Optional)
<http://www.eclipse.org/downloads/>
<http://pydev.org/>

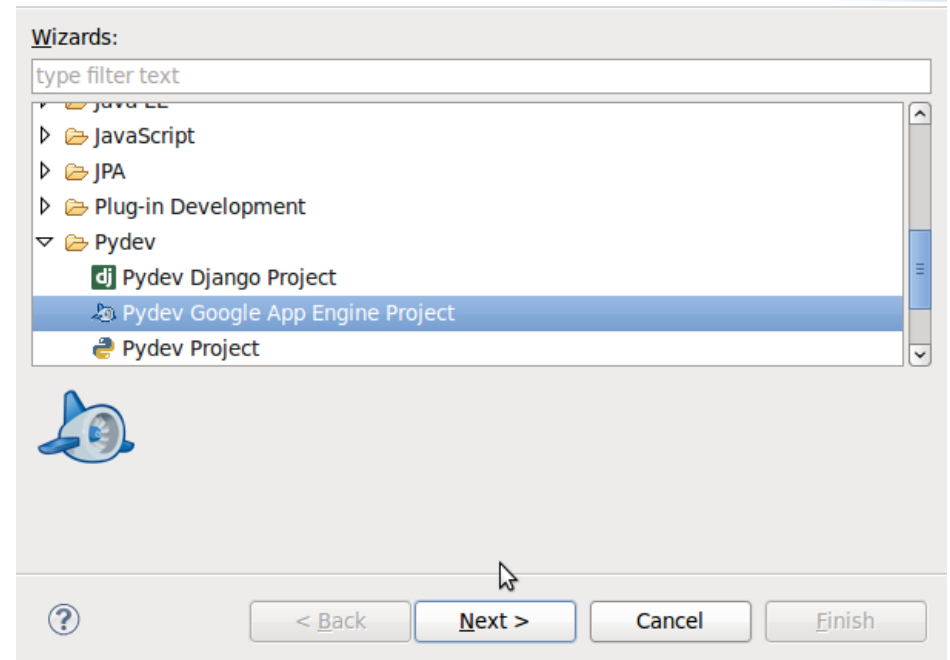
Setting up

Watch

<http://www.youtube.com/watch?v=v1gTI4BOPUw>

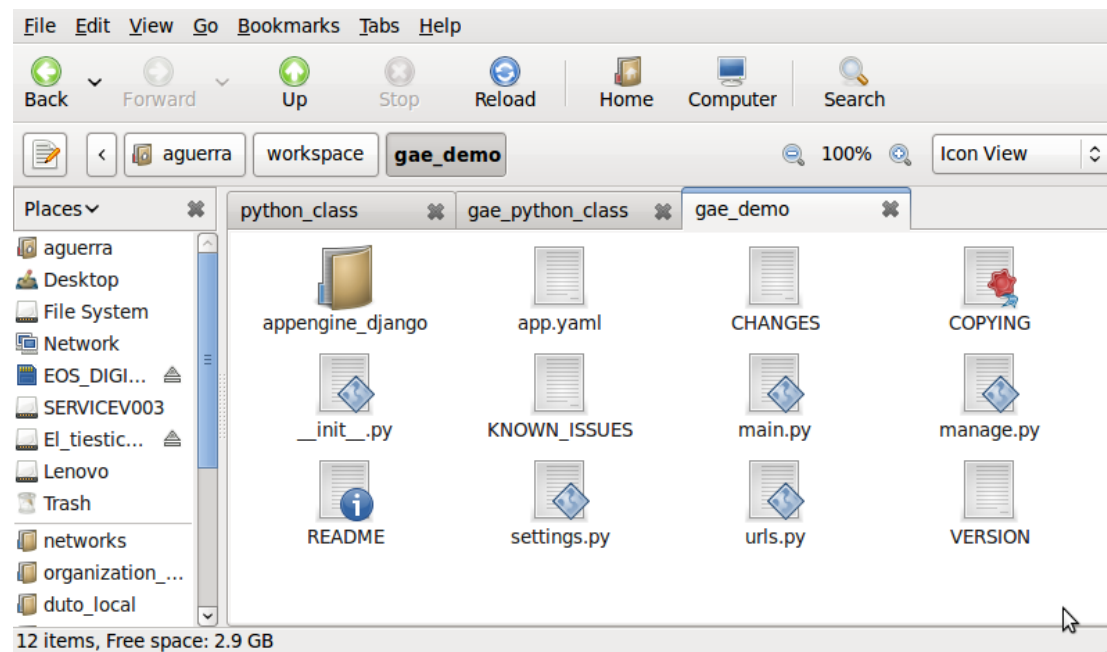
- Create an app GAE empty app
 - In eclipse start new project->pydev->pydev google app engine project

Select a wizard



Install the helper

- <http://code.google.com/p/google-app-engine-django/>
- Unzip and copy the contents of the appengine_helper_for_django into your new project folder
- Follow the instructions of the README file

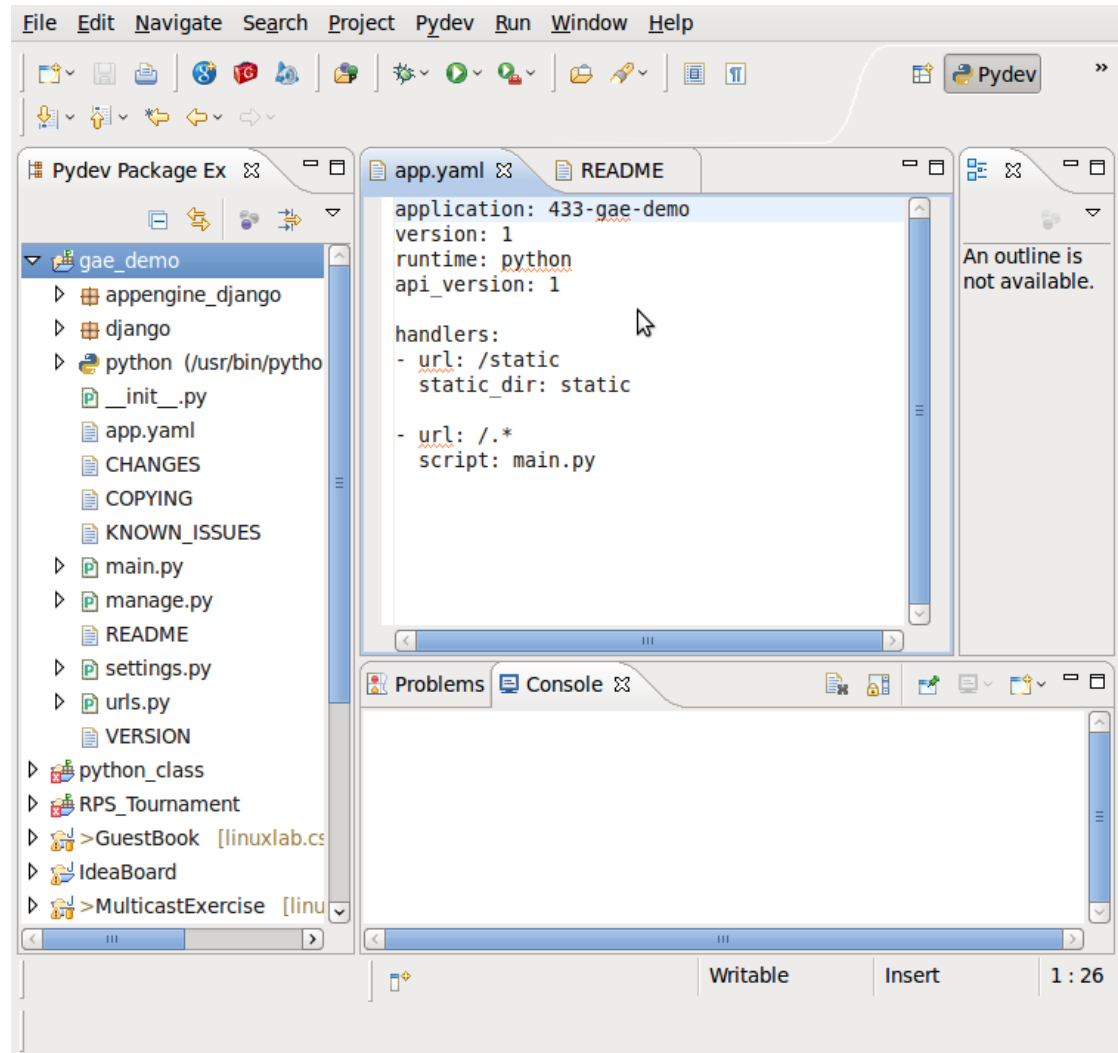


More tutorials

- http://pydev.org/manual_adv_django.html
- Describes how to perform the steps from within Eclipse

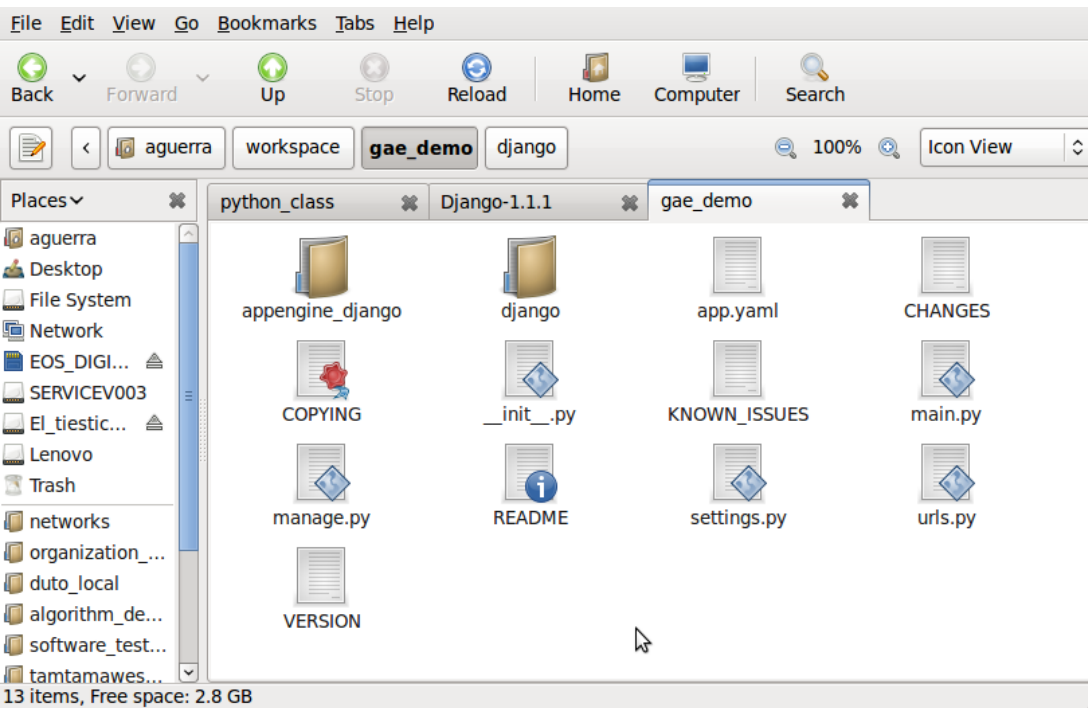
Modify the configuration files

- On app.yaml write your applications name



Copy django

- Download, and extract the latest version of django.
- Take the folder call django and copy it on your project folder.

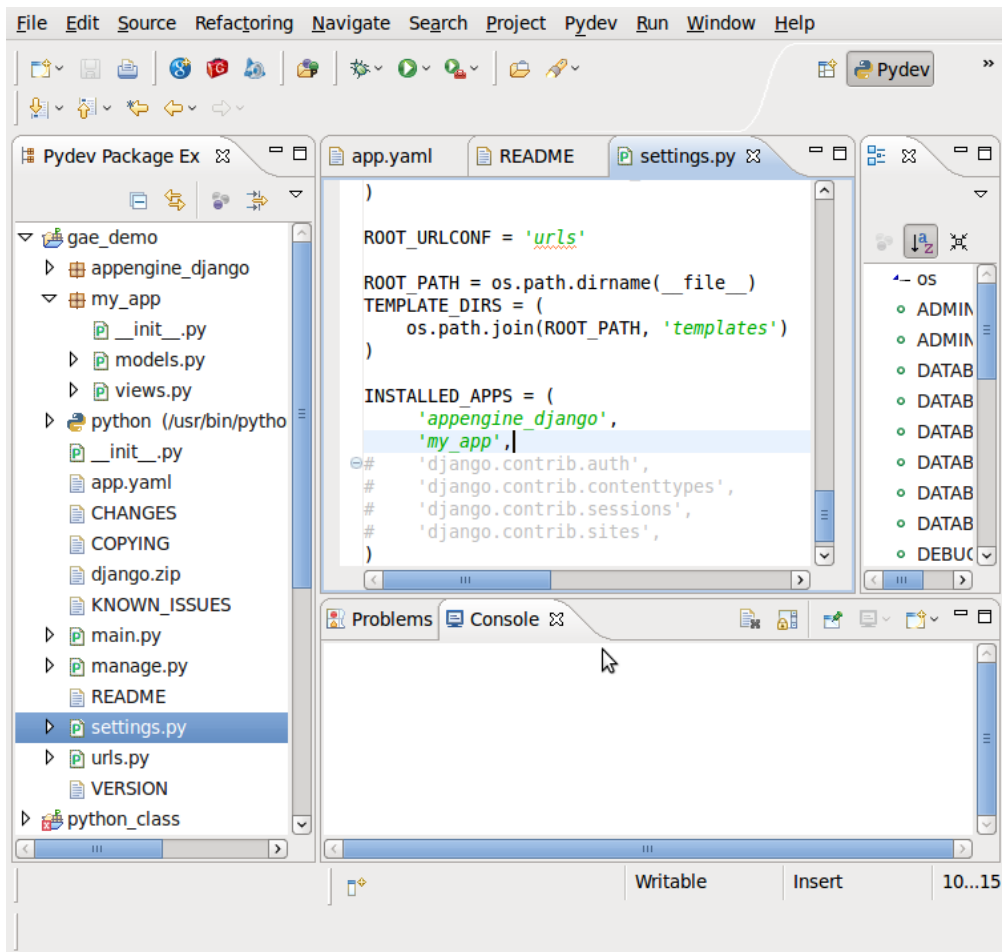


Start a new app

- Run `python manage.py startapp my_app`

Modify the settings.py file

- In the `INSTALLED_APPS` add your recently created app



Modify your urls.py

```
1 # Copyright 2008 Google Inc.
2 #
3 # Licensed under the Apache License, Version 2.0 (the "License");
4 # you may not use this file except in compliance with the License.
5 # You may obtain a copy of the License at
6 #
7 #     http://www.apache.org/licenses/LICENSE-2.0
8 #
9 # Unless required by applicable law or agreed to in writing, software
10 # distributed under the License is distributed on an "AS IS" BASIS,
11 # WITHOUT WARRANTIES OR CONDITIONS OF ANY KIND, either express or implied.
12 # See the License for the specific language governing permissions and
13 # limitations under the License.
14
15 from django.conf.urls.defaults import *
16
17 urlpatterns = patterns('my_app.views',
18     (r'^$', 'index'),
19 )
```

Modify your views.py

```
1  # Create your views here.
2  from django.http import HttpResponse
3
4  def index(request):
5      return HttpResponse("Hello world")
```

Facebook

Infrastructure



PyFacebook

- <http://code.google.com/p/pyfacebook/>
- Allow us to use the fb API

Create your own fb app

- Go to <http://www.facebook.com/developers>
- Create your own app.
- Copy the api key and secret

File Edit View History Bookmarks Tools Help

http://www.facebook.com/developers/editapp.php?app_id=119356951408446

Disable Cookies CSS Forms Images Information Miscellaneous Outline Resize Tools View Source Options

HP Official S... Lenovo - Cust... HP Official S... La tienda en lí... The Dell Onlin... Successfully C... Greetings Disabling Appli... Facebook ...

facebook Search Home Profile Account

Edit 433-hello-world Back to My Applications

Basic

Authentication

Profiles

Canvas

Connect

Widgets

Advanced

Migrations

Required URLs

Canvas Page URL

http://apps.facebook.com/myfirstfbapp-new/

The base URL for your canvas pages on Facebook.

Canvas Callback URL

http://myfirstfbapp.appspot.com/

Facebook pulls the content for your application's canvas pages from this URL or directory. For more information, see the [documentation](#)

Optional URLs

Post-Authorize Redirect URL

Where to redirect users when they first [authorize your application](#). If left blank, this field defaults to the Canvas Page URL.

Canvas Settings

Render Method

☐ IFrame ☒ FBML

Choose whether you will render your canvas page in an [iframe](#) or with [FBML](#). Note that you can use [XFBML](#) in an [iframe](#).

IFrame Size

☒ Smart size ☐ Resizable

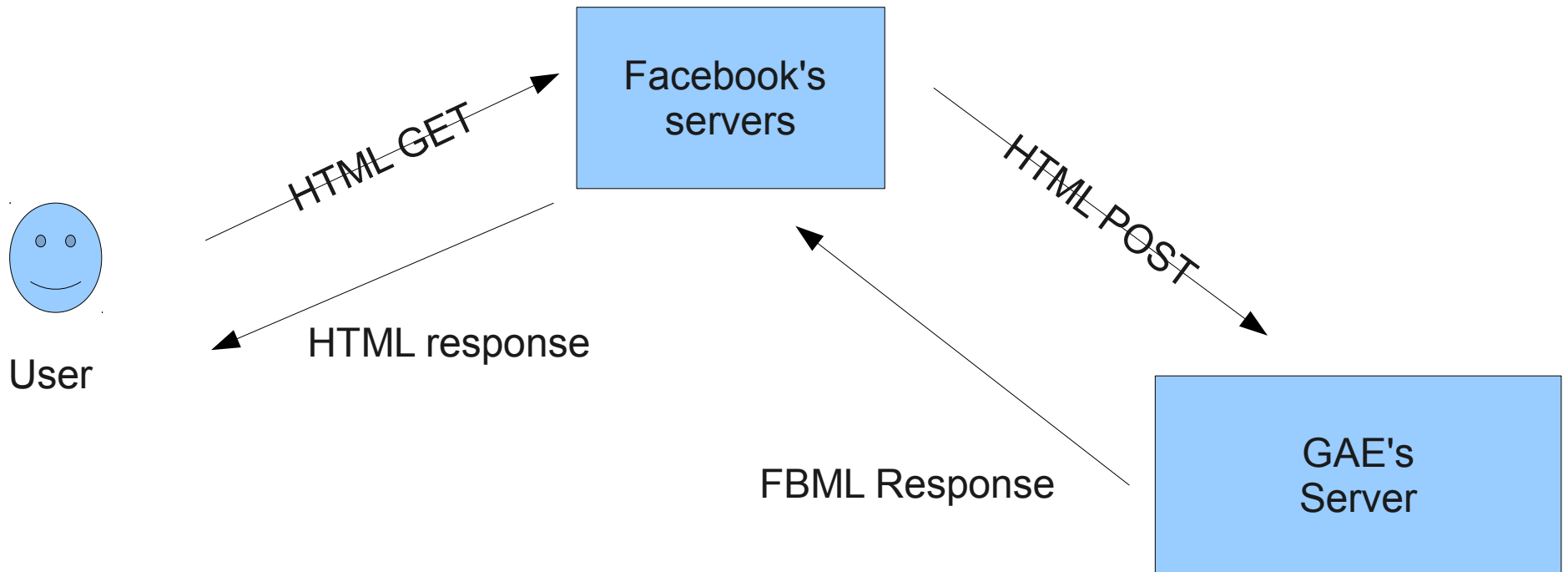
For [iframe](#) applications, choose whether you want to [smartsize](#) the [iframe](#) so it fits in the remaining space or to make

Chat (Offline)

http://www.facebook.com/developers/editapp.php?app_id=119356951408446&view=canvas

zotero

FBML



Authentication

- We don't use anymore the GAE model
- We use the Facebook users model