

# Django 学习笔记



*for my dear wife.*

Rails Chen

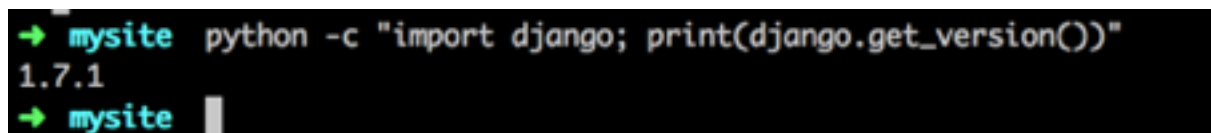
2014年12月

# Django app,part 1

## 1.1 Django 之 helloworld

### 1.查看Django版本

`python -c "import django; print(django.get_version())"`

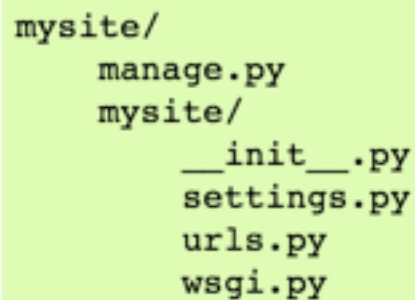
A terminal window with a black background. The prompt is a green arrow followed by 'mysite'. The command 'python -c "import django; print(django.get\_version())"' is entered. The output '1.7.1' is displayed. The prompt '→ mysite' is shown again on the next line.

```
→ mysite python -c "import django; print(django.get_version())"
1.7.1
→ mysite
```

### 2.新建project

`django-admin.py startproject mysite`

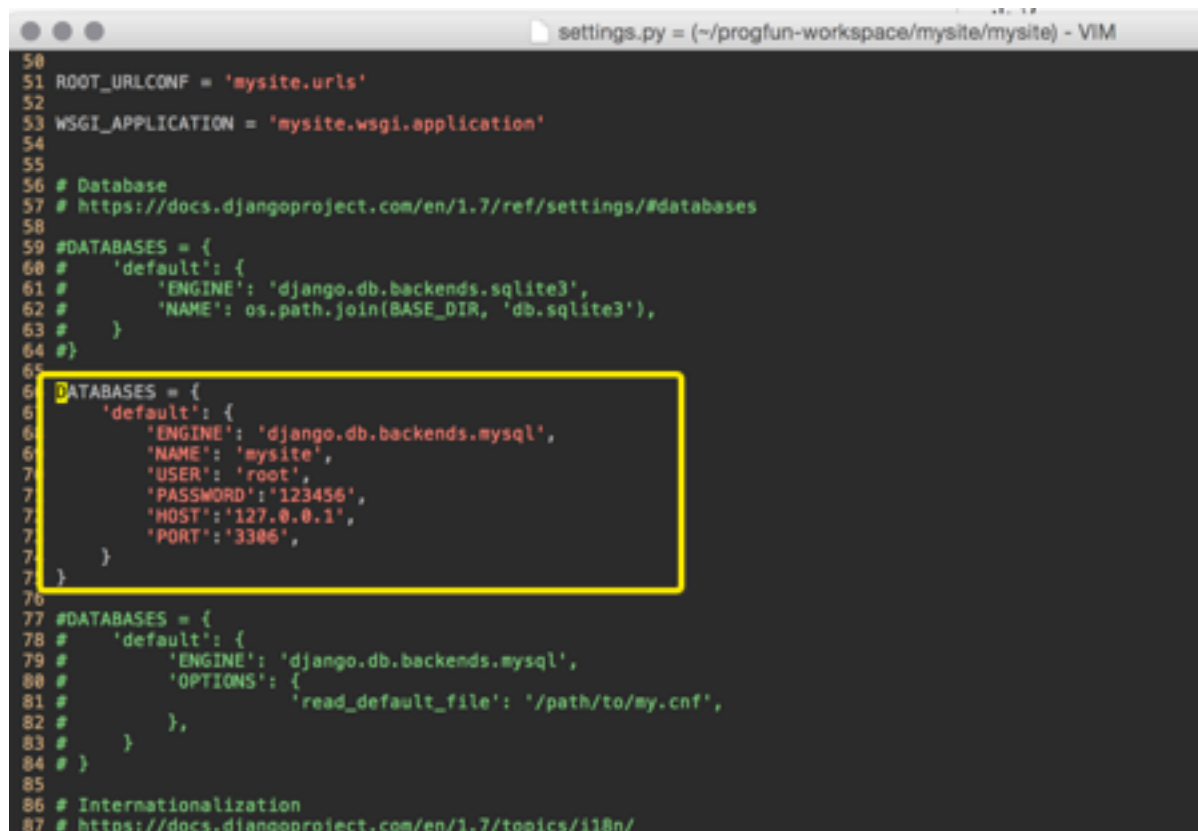
自动生成如下文件:

A diagram showing the file structure of a Django project. It is a tree view with a light green background. The root is 'mysite/'. Under it is 'manage.py'. Below 'manage.py' is another 'mysite/' directory. Inside this directory are four files: '\_\_init\_\_.py', 'settings.py', 'urls.py', and 'wsgi.py'.

```
mysite/
  manage.py
  mysite/
    __init__.py
    settings.py
    urls.py
    wsgi.py
```

### 3.配置MySQL数据库（数据库模块配置参考上一篇文章）

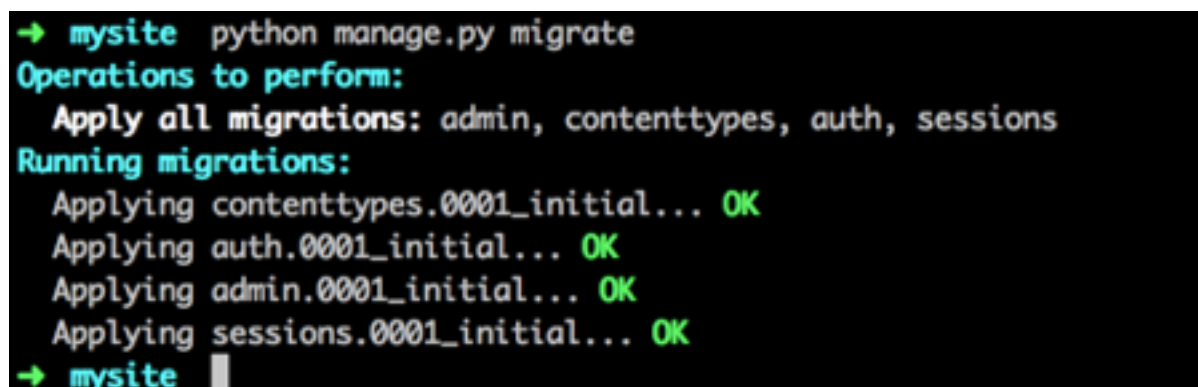
修改setting.py文件，以下是MySQL配置



```
50
51 ROOT_URLCONF = 'mysite.urls'
52
53 WSGI_APPLICATION = 'mysite.wsgi.application'
54
55
56 # Database
57 # https://docs.djangoproject.com/en/1.7/ref/settings/#databases
58
59 #DATABASES = {
60 #     'default': {
61 #         'ENGINE': 'django.db.backends.sqlite3',
62 #         'NAME': os.path.join(BASE_DIR, 'db.sqlite3'),
63 #     }
64 # }
65
66 DATABASES = {
67     'default': {
68         'ENGINE': 'django.db.backends.mysql',
69         'NAME': 'mysite',
70         'USER': 'root',
71         'PASSWORD': '123456',
72         'HOST': '127.0.0.1',
73         'PORT': '3306',
74     }
75 }
76
77 #DATABASES = {
78 #     'default': {
79 #         'ENGINE': 'django.db.backends.mysql',
80 #         'OPTIONS': {
81 #             'read_default_file': '/path/to/my.cnf',
82 #         },
83 #     }
84 # }
85
86 # Internationalization
87 # https://docs.djangoproject.com/en/1.7/topics/i18n/
```

4.初始化数据（可选择运行）

python manage.py migrate



```
→ mysite python manage.py migrate
Operations to perform:
  Apply all migrations: admin, contenttypes, auth, sessions
Running migrations:
  Applying contenttypes.0001_initial... OK
  Applying auth.0001_initial... OK
  Applying admin.0001_initial... OK
  Applying sessions.0001_initial... OK
→ mysite
```

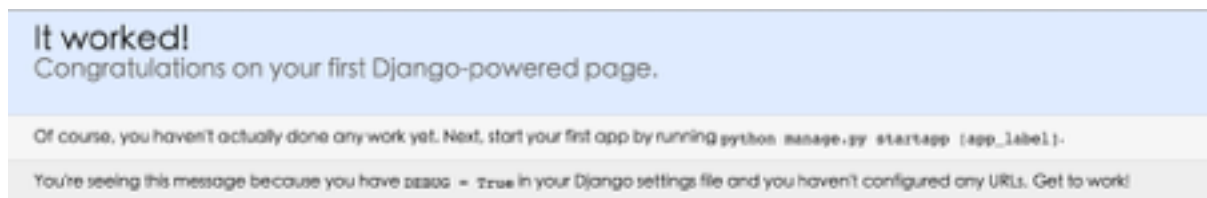
5.部署工程，启动服务

python manage.py runserver

```
→ mysite python manage.py runserver
Performing system checks...

System check identified no issues (0 silenced).
December 14, 2014 - 15:46:33
Django version 1.7.1, using settings 'mysite.settings'
Starting development server at http://127.0.0.1:8000/
Quit the server with CONTROL-C.
```

访问：<http://127.0.0.1:8000/>，成功！



其他启动方式，端口与IP可选：

python manage.py runserver 8080

或

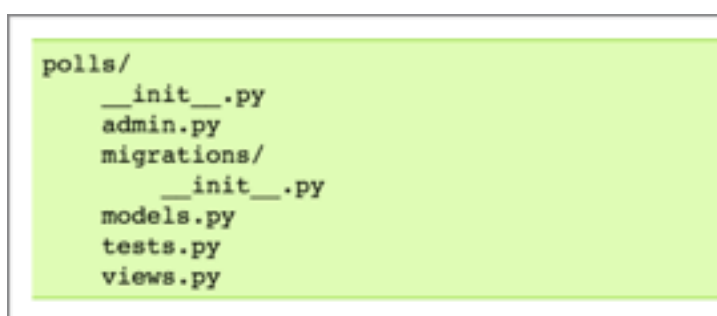
python manage.py runserver 0.0.0.0:8000

## 1.2 Django之创建 Models

1.进入与manage.py同一路径下：

执行：python manage.py startapp polls

创建以下文件：

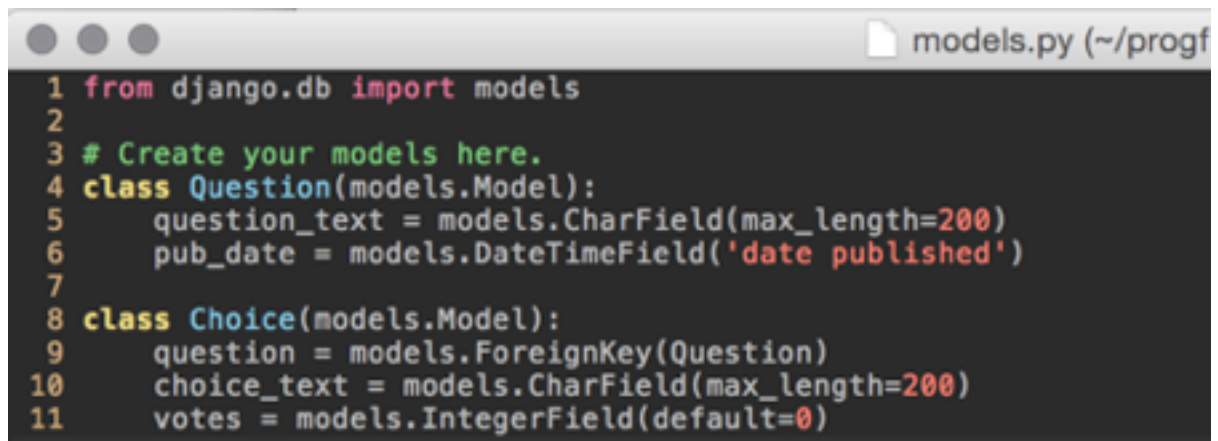


2.编辑polls/models.py, 建立数据模型 Question and Choice。

```
from django.db import models
```

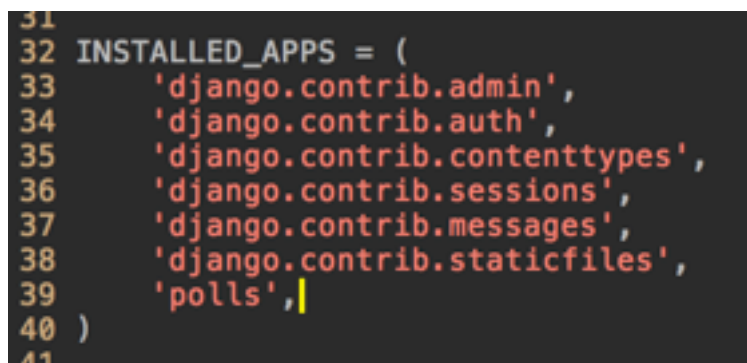
```
class Question(models.Model):
    question_text = models.CharField(max_length=200)
    pub_date = models.DateTimeField('date published')
```

```
class Choice(models.Model):
    question = models.ForeignKey(Question)
    choice_text = models.CharField(max_length=200)
    votes = models.IntegerField(default=0)
```



```
models.py (~/progrf
1 from django.db import models
2
3 # Create your models here.
4 class Question(models.Model):
5     question_text = models.CharField(max_length=200)
6     pub_date = models.DateTimeField('date published')
7
8 class Choice(models.Model):
9     question = models.ForeignKey(Question)
10    choice_text = models.CharField(max_length=200)
11    votes = models.IntegerField(default=0)
```

3. 接下来, 告诉这个工程我们创建了一个模型。修改mysite/settings.py 文件, 在INSTALLED\_APPS 配置中加入 'polls'.



```
31
32 INSTALLED_APPS = (
33     'django.contrib.admin',
34     'django.contrib.auth',
35     'django.contrib.contenttypes',
36     'django.contrib.sessions',
37     'django.contrib.messages',
38     'django.contrib.staticfiles',
39     'polls',
40 )
41
```

执行命令: `python manage.py makemigrations polls`

```

→ mysite python manage.py makemigrations polls
Migrations for 'polls':
  0001_initial.py:
    - Create model Choice
    - Create model Question
    - Add field question to choice
→ mysite

```

4.提交到MySQL数据库中:

python manage.py sqlmigrate polls 0001

```

→ mysite python manage.py sqlmigrate polls 0001
BEGIN;
CREATE TABLE `polls_choice` (`id` integer AUTO_INCREMENT NOT NULL PRIMARY KEY, `choice_text` varchar(200) NOT NULL, `votes` integer NOT NULL);
CREATE TABLE `polls_question` (`id` integer AUTO_INCREMENT NOT NULL PRIMARY KEY, `question_text` varchar(200) NOT NULL, `pub_date` datetime NOT NULL);
ALTER TABLE `polls_choice` ADD COLUMN `question_id` integer NOT NULL;
ALTER TABLE `polls_choice` ALTER COLUMN `question_id` DROP DEFAULT;
CREATE INDEX polls_choice_7aa0f6ee ON `polls_choice` (`question_id`);
ALTER TABLE `polls_choice` ADD CONSTRAINT `polls_choice_question_id_246c99a640fb
bd72_fk_polls_question_id` FOREIGN KEY (`question_id`) REFERENCES `polls_questio
n` (`id`);
COMMIT;
→ mysite

```

提交: python manage.py migrate

```

→ mysite python manage.py migrate
Operations to perform:
  Apply all migrations: admin, contenttypes, polls, auth, sessions
Running migrations:
  Applying polls.0001_initial... OK
→ mysite

```

在MySQL中生成两张表：

