DJANGO

How to Install Django on Ubuntu 18.04

Step 1 – Installing Python and Pip:

Update:

```
$sudo apt-get update
```

Check the version:

```
$ python3 -V
```

Install pip:

```
$sudo apt-get install python3-pip
```

Check the pip version:

```
$pip3 -V
```

Step 2 : Installing Django

Install django:

```
$pip3 install Django
```

Check the version:

```
$django-admin –version
```

Step 3 : Create A Django Application

$django-admin startproject School

Go to the path and migrate the changes:

$cd School

$python3 manage.py migrate

Step 4 : Creating a Super User for Django Application

$python3 manage.py createsuperuser

How to connecting PostgreSQL with a Django application

1.Create Database

$sudo -u postgres psql

$Postgres = # CREATE DATABASE blctrainingdb;

2. Create User for Database

$*Postgres=# CREATE USER* blctraining *WITH PASSWORD '*123456*';*

$Postgres=# ALTER ROLE blctraining SET client_encoding TO 'utf8';

$Postgres=# ALTER ROLE blctraining SET default_transaction_isolation TO 'read committed';

$Postgres=# ALTER ROLE blctraining SET timezone TO 'UTC';

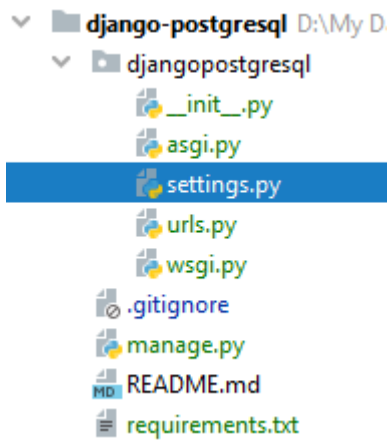$Postgres=# GRANT ALL PRIVILEGES ON DATABASE blctraining db TO blctraining ;

Exit the SQL prompt to return to the postgres user shell session:

$Postgres=# \q

To connect to the PostgreSQL database server in the Django Project, use the psycopg database adapter:

$(django-postgresql) $ pip install django psycopg2

3. Configure the Django Database Settings


```
---------------------------------------------------------------------------------------------------------
 DATABASES =
 {
              'default': {
                  'ENGINE':
          'django.db.backends.postgresql_psycopg2',
                  'NAME': 'blctrainingdb',
                  'USER': 'blctraining',
                  'PASSWORD': '123456',
                  'HOST': 'localhost',
                  'PORT': '5432',
              }
          }
---------------------------------------------------------------------------------------------------------
```

4. Migrate Database and Test Project

$(django-postgresql) $ python manage.py makemigrations
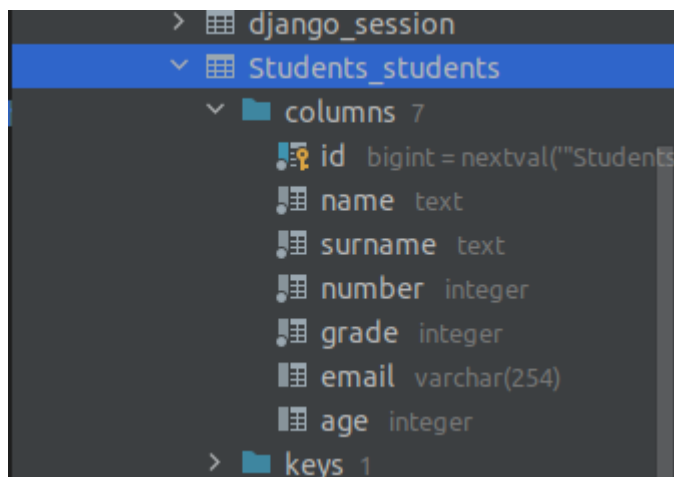
$(django-postgresql) $ python manage.py migrate

$(djangopostgresql) $ python manage.py createsuperuser

$(djangopostgresql) $ python manage.py runserver

Add Model

```
class Students(models.Model):
      name = models.TextField(max_length=10)
      surname = models.TextField(max_length=10)
      email = models.EmailField(null=True)
      age = models.IntegerField(null=True)
      number = models.IntegerField()
      grade = models.IntegerField()
```

Urls.py

```python
from django.urls import path
from . import views


urlpatterns = [
      path('', views.listStudents),
]
```

Views.py

```python
from django.shortcuts import render
from . import models

# Create your views here
def listStudents(request):
      models.Students.objects.create(name="test", surname="test" , email =... )
      return render(request,'list.html', {'data_students':
models.Students.objects.all()})
```

https://github.com/gizempesen/blc_training/tree/main/School

https://www.e2enetworks.com/help/knowledge-base/how-to-install-django-on-ubuntu-18-04-16-04-lts/

https://medium.com/@rudipy/how-to-connecting-postgresql-with-a-django-application-f479dc949a11