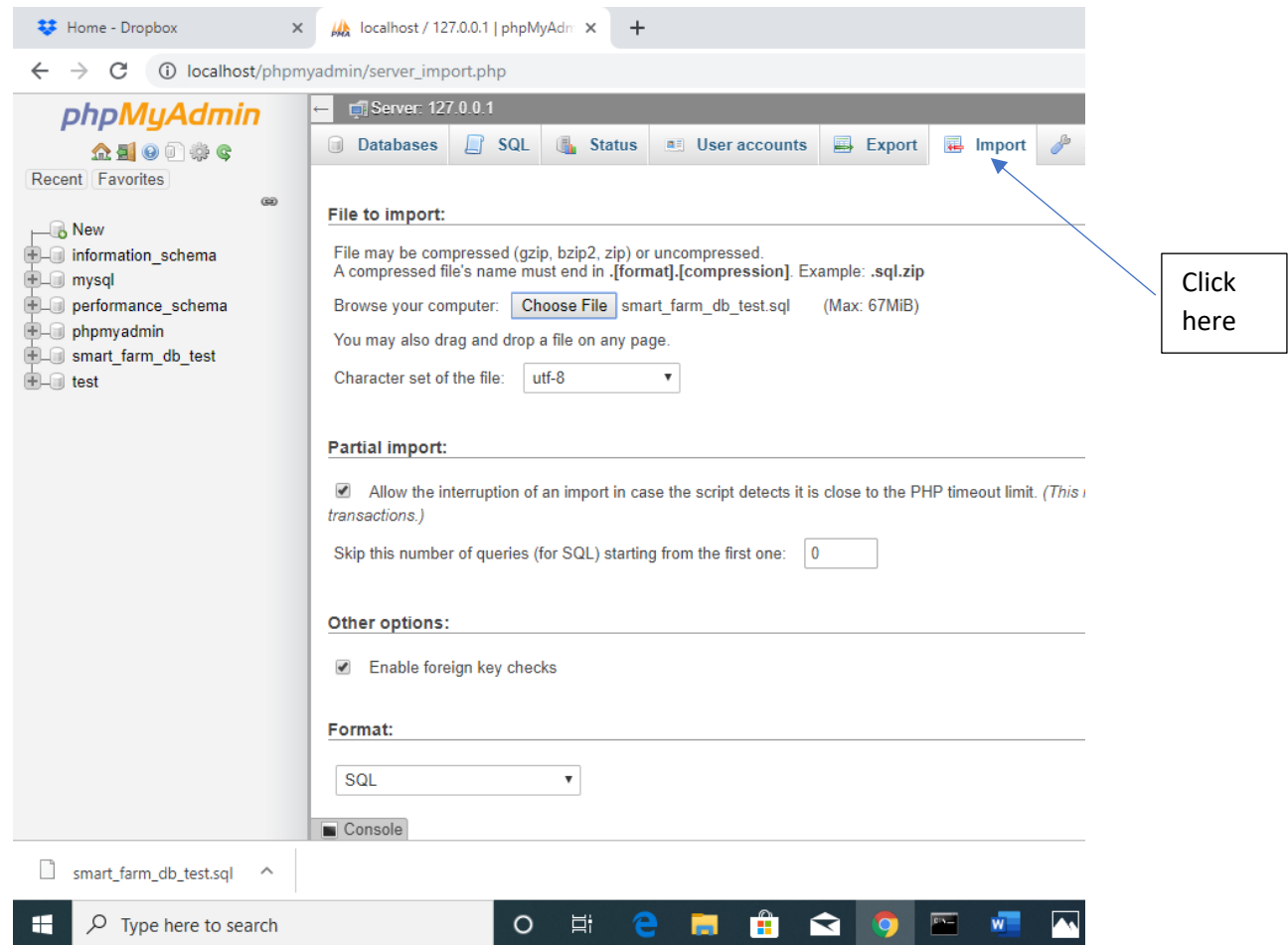


First import the sql file into the database using localhost/phpMyAdmin and press go.

This will import database, all the tables and dump data into the tables.



1. Run this command inside the smartfarm folder  
env\Script\activate
2. Pip install django

```
C:\Windows\system32\cmd.exe

(env) C:\Users\Toshiba Portege\Documents\smartfarm\tutorial>pip install django
Collecting django
  Downloading https://files.pythonhosted.org/packages/b2/79/df0ffea7bf1e02c073c2633702c90f4384645c40a1dd09a308e02ef0c817/Django-2.2.6-py3-none-any.whl (7.5MB)
    | 7.5MB 1.6MB/s
Collecting sqlparse (from django)
  Downloading https://files.pythonhosted.org/packages/ef/53/900f7d2a54557c6a37886585a91336520e5539e3ae2423ff1102daf4f3a7/sqlparse-0.3.0-py2.py3-none-any.whl
Collecting pytz (from django)
  Downloading https://files.pythonhosted.org/packages/e7/f9/f0b53f88060247251bf481fa6ea62cd0d25bf1b11a87888e53ce5b7c8ad2/pytz-2019.3-py2.py3-none-any.whl (509kB)
    | 512kB 939kB/s
Installing collected packages: sqlparse, pytz, django
Successfully installed django-2.2.6 pytz-2019.3 sqlparse-0.3.0
WARNING: You are using pip version 19.2.3, however version 19.3.1 is available.
You should consider upgrading via the 'python -m pip install --upgrade pip' command.

(env) C:\Users\Toshiba Portege\Documents\smartfarm\tutorial>
```

3. Pip install djangoestframework

C:\Windows\system32\cmd.exe

```
(env) C:\Users\Toshiba Portege\Documents\smartfarm\tutorial>pip install djangorestframework
Collecting djangorestframework
  Downloading https://files.pythonhosted.org/packages/33/8e/87a4e0025e3c4736c1dc728905b1b06a94968ce08de15304417acb40e374/djangorestframework-3.10.3-py3-none-any.whl (909kB)
    | 911kB 930kB/s
Installing collected packages: djangorestframework
Successfully installed djangorestframework-3.10.3
WARNING: You are using pip version 19.2.3, however version 19.3.1 is available.
You should consider upgrading via the 'python -m pip install --upgrade pip' command.

(env) C:\Users\Toshiba Portege\Documents\smartfarm\tutorial>
```

#### 4. pip install pymysql

C:\Windows\system32\cmd.exe

```
(env) C:\Users\Toshiba Portege\Documents\smartfarm\tutorial>pip install pymysql
Collecting pymysql
  Downloading https://files.pythonhosted.org/packages/ed/39/15045ae46f2a123019aa968dfcba0396c161c20f855f11dea6796bcaae95/PyMySQL-0.9.3-py2.py3-none-any.whl (47kB)
    | 51kB 328kB/s
Installing collected packages: pymysql
Successfully installed pymysql-0.9.3
WARNING: You are using pip version 19.2.3, however version 19.3.1 is available.
You should consider upgrading via the 'python -m pip install --upgrade pip' command.

(env) C:\Users\Toshiba Portege\Documents\smartfarm\tutorial>
```

#### 5.

#### 6. pip install celery

C:\Windows\system32\cmd.exe

```
(env) C:\Users\Toshiba Portege\Documents\smartfarm\tutorial>pip install celery
Collecting celery
  Downloading https://files.pythonhosted.org/packages/5c/a1/a3dd9d8bfa09156ec2c2ba37f90accf35c0f4ecc3980d96cb4fb99e56504b/celery-4.3.0-py2.py3-none-any.whl (413kB)
    | 419kB 930kB/s
Requirement already satisfied: pytz>dev in c:\users\toshiba portege\appdata\local\programs\python\python38-32\lib\site-packages (from celery) (2019.3)
Collecting vine>=1.3.0 (from celery)
  Downloading https://files.pythonhosted.org/packages/7f/60/82c03047396126c8331ceb64da1dc52d4f1317209f32e8fe286d0c07365a/vine-1.3.0-py2.py3-none-any.whl
Collecting billiard<4.0,>=3.6.0 (from celery)
  Downloading https://files.pythonhosted.org/packages/9a/bb/2a016ac912fca48e06ff5a662407f3d1681aa47df97fb19feba7cc931ee1/billiard-3.6.1.0-py3-none-any.whl (89kB)
    | 92kB 1.5MB/s
Collecting kombu<5.0,>=4.4.0 (from celery)
  Downloading https://files.pythonhosted.org/packages/42/16/f82ef8692fbd30ea7711e92e1775bb237888f4cef3a0d24dcf33a1968834/kombu-4.6.5-py2.py3-none-any.whl (182kB)
    | 184kB 1.6MB/s
Collecting amqp==2.5.1 (from kombu<5.0,>=4.4.0->celery)
  Downloading https://files.pythonhosted.org/packages/a1/ef/a62ff9dde89eb6b75976a746aa5b828ccb3c839ac6fcdc283edd88d7cf90b/amqp-2.5.1-py2.py3-none-any.whl (49kB)
    | 51kB 3.2MB/s
Collecting importlib-metadata>=0.18 (from kombu<5.0,>=4.4.0->celery)
  Downloading https://files.pythonhosted.org/packages/f6/d2/40b3fa882147719744e6aa50ac39cf7a22a913cbcb8a86a0371176c425a3b/importlib_metadata-0.23-py2.py3-none-any.whl
Collecting zipp>=0.5 (from importlib-metadata>=0.18->kombu<5.0,>=4.4.0->celery)
  Downloading https://files.pythonhosted.org/packages/74/3d/1ee25a26411ba0401b43c6376d2316a71addcc72ef8690b101b4ea56d76a/zipp-0.6.0-py2.py3-none-any.whl
Collecting more-itertools (from zipp>=0.5->importlib-metadata>=0.18->kombu<5.0,>=4.4.0->celery)
  Downloading https://files.pythonhosted.org/packages/45/dc/3241ee99eb45f1def35cf93af35d1cf9ef4c0991792583b8f33ea41b092/more_itertools-7.2.0-py3-none-any.whl (57kB)
    | 61kB 1.3MB/s
Installing collected packages: vine, billiard, amqp, more-itertools, zipp, importlib-metadata, kombu, celery
Successfully installed amqp-2.5.1 billiard-3.6.1.0 celery-4.3.0 importlib-metadata-0.23 kombu-4.6.5 more-itertools-7.2.0 vine-1.3.0 zipp-0.6.0
WARNING: You are using pip version 19.2.3, however version 19.3.1 is available.
You should consider upgrading via the 'python -m pip install --upgrade pip' command.

(env) C:\Users\Toshiba Portege\Documents\smartfarm\tutorial>
```

#### 7. pip install Django-cors-headers

Command Prompt

```
(env) C:\Users\Toshiba Portege\Documents\smartfarm\tutorial>pip install django-cors-headers
Collecting django-cors-headers
  Downloading https://files.pythonhosted.org/packages/47/0c/13b4435fbbcd39e3a2c21774dd41a37ee2d38750dbdab455a14bd4cccc23/django_cors_headers-3.1.1-py3-none-any.whl
Requirement already satisfied: Django>=1.11 in c:\users\toshiba portege\appdata\local\programs\python\python38-32\lib\site-packages (from django-cors-headers) (2.2.6)
Requirement already satisfied: sqlparse in c:\users\toshiba portege\appdata\local\programs\python\python38-32\lib\site-packages (from Django>=1.11->django-cors-headers) (0.3.0)
Requirement already satisfied: pytz in c:\users\toshiba portege\appdata\local\programs\python\python38-32\lib\site-packages (from Django>=1.11->django-cors-headers) (2019.3)
Installing collected packages: django-cors-headers
Successfully installed django-cors-headers-3.1.1
WARNING: You are using pip version 19.2.3, however version 19.3.1 is available.
You should consider upgrading via the 'python -m pip install --upgrade pip' command.

(env) C:\Users\Toshiba Portege\Documents\smartfarm\tutorial>
```

8.

- Cd tutorial
- py manage.py runserver 8080

if following error occurs

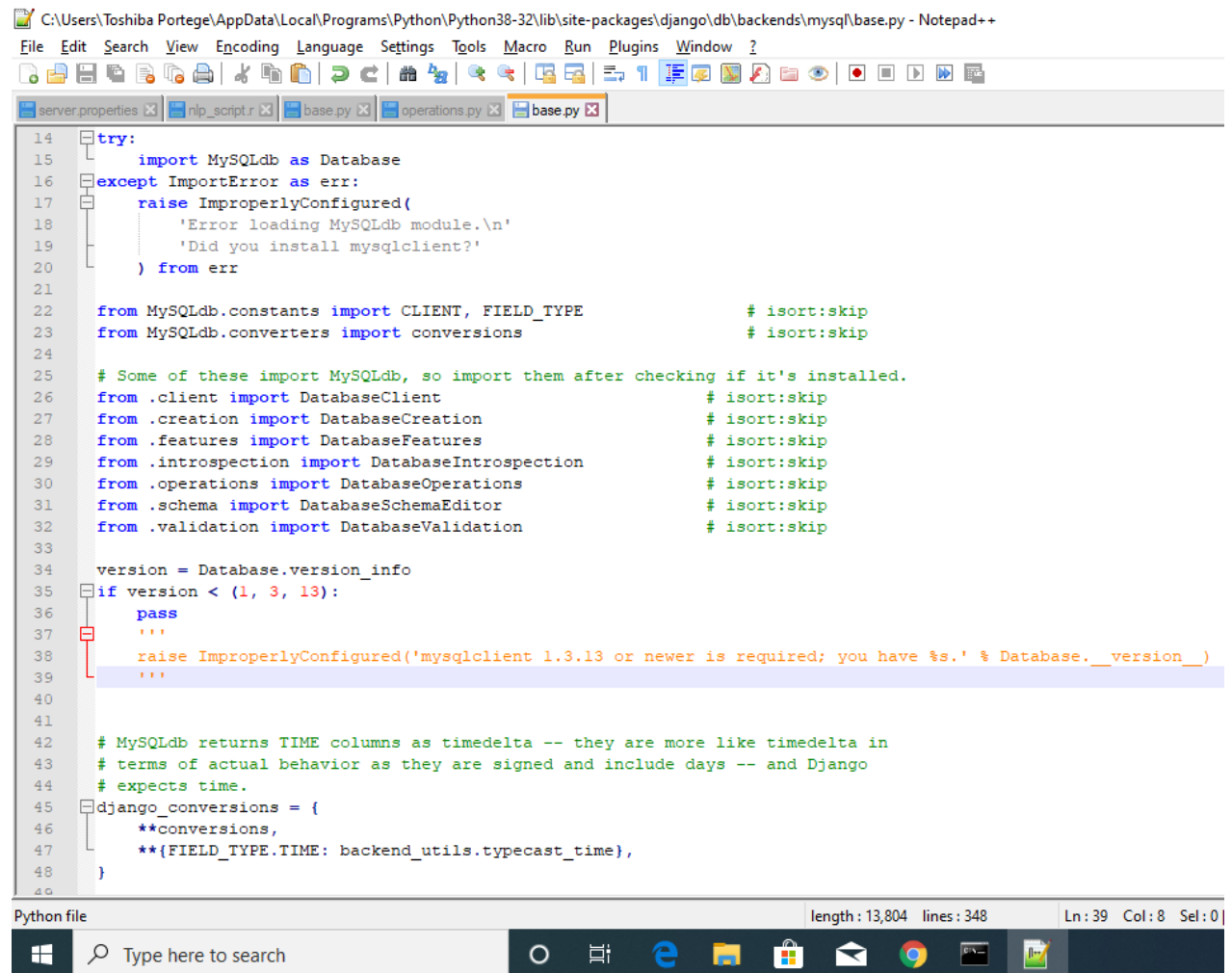
“mysqlclient 1.3.13 or newer is required “

```
Select C:\Windows\system32\cmd.exe - py manage.py runserver 9090
File "C:\Users\Toshiba Portege\AppData\Local\Programs\Python\Python38-32\lib\site-packages\django\core\management\commands\runserver.py", line 109, in inner_run
    autoreload.raise_last_exception()
File "C:\Users\Toshiba Portege\AppData\Local\Programs\Python\Python38-32\lib\site-packages\django\utils\autoreload.py", line 77, in raise_last_exception
    raise _exception[1]
File "C:\Users\Toshiba Portege\AppData\Local\Programs\Python\Python38-32\lib\site-packages\django\core\management\__init__.py", line 337, in execute
    autoreload.check_errors(django.setup())
File "C:\Users\Toshiba Portege\AppData\Local\Programs\Python\Python38-32\lib\site-packages\django\utils\autoreload.py", line 54, in wrapper
    fn(*args, **kwargs)
File "C:\Users\Toshiba Portege\AppData\Local\Programs\Python\Python38-32\lib\site-packages\django\__init__.py", line 24, in setup
    apps.populate(settings.INSTALLED_APPS)
File "C:\Users\Toshiba Portege\AppData\Local\Programs\Python\Python38-32\lib\site-packages\django\apps\registry.py", line 114, in populate
    app_config.import_models()
File "C:\Users\Toshiba Portege\AppData\Local\Programs\Python\Python38-32\lib\site-packages\django\apps\config.py", line 211, in import_models
    self.models_module = import_module(models_module_name)
File "C:\Users\Toshiba Portege\AppData\Local\Programs\Python\Python38-32\lib\importlib\__init__.py", line 127, in import_module
    return _bootstrap._gcd_import(name[level:], package, level)
File "<frozen importlib._bootstrap>", line 1014, in _gcd_import
File "<frozen importlib._bootstrap>", line 991, in _find_and_load
File "<frozen importlib._bootstrap>", line 975, in _find_and_load_unlocked
File "<frozen importlib._bootstrap>", line 671, in _load_unlocked
File "<frozen importlib._bootstrap_external>", line 783, in exec_module
File "<frozen importlib._bootstrap>", line 219, in _call_with_frames_removed
File "C:\Users\Toshiba Portege\AppData\Local\Programs\Python\Python38-32\lib\site-packages\django\contrib\auth\models.py", line 2, in <module>
    from django.contrib.auth.base_user import AbstractBaseUser, BaseUserManager
File "C:\Users\Toshiba Portege\AppData\Local\Programs\Python\Python38-32\lib\site-packages\django\contrib\auth\base_user.py", line 47, in <module>
    class AbstractBaseUser(models.Model):
File "C:\Users\Toshiba Portege\AppData\Local\Programs\Python\Python38-32\lib\site-packages\django\db\models\base.py", line 117, in __new__
    new_class.add_to_class('_meta', Options(meta, app_label))
File "C:\Users\Toshiba Portege\AppData\Local\Programs\Python\Python38-32\lib\site-packages\django\db\models\base.py", line 321, in add_to_class
    value.contribute_to_class(cls, name)
File "C:\Users\Toshiba Portege\AppData\Local\Programs\Python\Python38-32\lib\site-packages\django\db\models\options.py", line 204, in contribute_to_class
    self.db_table = truncate_name(self.db_table, connection.ops.max_name_length())
File "C:\Users\Toshiba Portege\AppData\Local\Programs\Python\Python38-32\lib\site-packages\django\db\__init__.py", line 28, in __getattr__
    return getattr(connections[DEFAULT_DB_ALIAS], item)
File "C:\Users\Toshiba Portege\AppData\Local\Programs\Python\Python38-32\lib\site-packages\django\db\utils.py", line 201, in __getitem__
    backend = load_backend(db['ENGINE'])
File "C:\Users\Toshiba Portege\AppData\Local\Programs\Python\Python38-32\lib\site-packages\django\db\utils.py", line 110, in load_backend
    return import_module('%s.base' % backend_name)
File "C:\Users\Toshiba Portege\AppData\Local\Programs\Python\Python38-32\lib\importlib\__init__.py", line 127, in import_module
    return _bootstrap._gcd_import(name[level:], package, level)
File "C:\Users\Toshiba Portege\AppData\Local\Programs\Python\Python38-32\lib\site-packages\django\db\backends\mysql\base.py", line 36, in <module>
    raise ImproperlyConfigured('mysqlclient 1.3.13 or newer is required; you have %s.' % Database.__version__)
django.core.exceptions.ImproperlyConfigured: mysqlclient 1.3.13 or newer is required; you have 0.9.3.
```

Then follow these steps:

Open the base.py as highlighted in the path above and put pass inside If version<(1,3,13) and save it

As shown below



```
C:\Users\Toshiba Portege\AppData\Local\Programs\Python\Python38-32\lib\site-packages\django\db\backends\mysql\base.py - Notepad++
File Edit Search View Encoding Language Settings Tools Macro Run Plugins Window ?
server properties nlp_script.r base.py operations.py base.py
14 try:
15     import MySQLdb as Database
16 except ImportError as err:
17     raise ImproperlyConfigured(
18         'Error loading MySQLdb module.\n'
19         'Did you install mysqlclient?'
20     ) from err
21
22 from MySQLdb.constants import CLIENT, FIELD_TYPE # isort:skip
23 from MySQLdb.converters import conversions # isort:skip
24
25 # Some of these import MySQLdb, so import them after checking if it's installed.
26 from .client import DatabaseClient # isort:skip
27 from .creation import DatabaseCreation # isort:skip
28 from .features import DatabaseFeatures # isort:skip
29 from .introspection import DatabaseIntrospection # isort:skip
30 from .operations import DatabaseOperations # isort:skip
31 from .schema import DatabaseSchemaEditor # isort:skip
32 from .validation import DatabaseValidation # isort:skip
33
34 version = Database.version_info
35 if version < (1, 3, 13):
36     pass
37     ...
38     raise ImproperlyConfigured('mysqlclient 1.3.13 or newer is required; you have %s.' % Database.__version__)
39     ...
40
41
42 # MySQLdb returns TIME columns as timedelta -- they are more like timedelta in
43 # terms of actual behavior as they are signed and include days -- and Django
44 # expects time.
45 django_conversions = {
46     **conversions,
47     **{FIELD_TYPE.TIME: backend_utils.typecast_time},
48 }
49
Python file length: 13,804 lines: 348 Ln: 39 Col: 8 Sel: 0
Type here to search
```

Open operations.py in the same location as base.py and find the query.decode line as shown below

```
C:\Users\Toshiba Portege\AppData\Local\Programs\Python\Python38-32\lib\site-packages\django\db\backends\mysql\operations.py
File Edit Search View Encoding Language Settings Tools Macro Run Plugins Window ?
server.properties x nlp_script.r x base.py x operations.py x base.py x operations.py x
129 def format_for_duration_arithmetic(self, sql):
130     return 'INTERVAL %s MICROSECOND' % sql
131
132 def force_no_ordering(self):
133     """
134     "ORDER BY NULL" prevents MySQL from implicitly ordering by grouped
135     columns. If no ordering would otherwise be applied, we don't want any
136     implicit sorting going on.
137     """
138     return [(None, ("NULL", [], False))]
139
140 def last_executed_query(self, cursor, sql, params):
141     # With MySQLdb, cursor objects have an (undocumented) "_executed"
142     # attribute where the exact query sent to the database is saved.
143     # See MySQLdb/cursors.py in the source distribution.
144     query = getattr(cursor, '_executed', None)
145     if query is not None:
146         query = query.decode(errors='replace')
147     return query
148
149 def no_limit_value(self):
150     # 2**64 - 1, as recommended by the MySQL documentation
151     return 18446744073709551615
152
153 def quote_name(self, name):
154     if name.startswith("`") and name.endswith("`"):
155         return name # Quoting once is enough.
156     return "`%s`" % name
157
158 def random_function_sql(self):
159     return 'RAND()'
160
161 def sql_flush(self, style, tables, sequences, allow_cascade=False):
162     # NB: The generated SQL below is specific to MySQL
163     # 'TRUNCATE x;', 'TRUNCATE y;', 'TRUNCATE z;...' style SQL statements
164     # to clear all tables of all data
length: 12,911 lines
Python file
Type here to search
```

Change decode to encode and save it as shown below.

```
C:\Users\Toshiba Portege\AppData\Local\Programs\Python\Python38-32\lib\site-packages\django\db\backends\mysql\operat
File Edit Search View Encoding Language Settings Tools Macro Run Plugins Window ?
server.properties x nlp_script.r x base.py x operations.py x base.py x operations.py x
129 def format_for_duration_arithmetic(self, sql):
130     return 'INTERVAL %s MICROSECOND' % sql
131
132 def force_no_ordering(self):
133     """
134     "ORDER BY NULL" prevents MySQL from implicitly ordering by grouped
135     columns. If no ordering would otherwise be applied, we don't want any
136     implicit sorting going on.
137     """
138     return [(None, ("NULL", [], False))]
139
140 def last_executed_query(self, cursor, sql, params):
141     # With MySQLdb, cursor objects have an (undocumented) "_executed"
142     # attribute where the exact query sent to the database is saved.
143     # See MySQLdb/cursors.py in the source distribution.
144     query = getattr(cursor, '_executed', None)
145     if query is not None:
146         query = query.encode(errors='replace')
147     return query
148
149 def no_limit_value(self):
150     # 2**64 - 1, as recommended by the MySQL documentation
151     return 18446744073709551615
152
153 def quote_name(self, name):
154     if name.startswith("`") and name.endswith("`"):
155         return name # Quoting once is enough.
156     return "`%s`" % name
157
158 def random_function_sql(self):
159     return 'RAND()'
160
161 def sql_flush(self, style, tables, sequences, allow_cascade=False):
162     # NB: The generated SQL below is specific to MySQL
163     # 'TRUNCATE x;', 'TRUNCATE y;', 'TRUNCATE z;'... style SQL statements
164     # to clear all tables of all data
165
Python file length: 12,91
```

## 9. Pip install apscheduler

```
C:\Windows\system32\cmd.exe
(env) C:\Users\Toshiba Portege\Documents\smartfarm\tutorial>pip install apscheduler
Collecting apscheduler
  Downloading https://files.pythonhosted.org/packages/09/ff/d5b0e81846cd5e92d02e5f2682b78c73a5d9d61bc1eae32cea5ac15c0d47/APScheduler-3.6.1-py2.py3-none-any.whl (58kB)
    | 61kB 787kB/s
Requirement already satisfied: pytz in c:\users\toshiba portege\appdata\local\programs\python\python38-32\lib\site-packages (from apscheduler) (2019.3)
Requirement already satisfied: setuptools>=0.7 in c:\users\toshiba portege\appdata\local\programs\python\python38-32\lib\site-packages (from apscheduler) (41.2.0)
Collecting tzlocal>=1.2 (from apscheduler)
  Downloading https://files.pythonhosted.org/packages/ef/99/53bd1ac9349262f59c1c421d8fcc2559ae8a5eeffed9202684756b648d33/tzlocal-2.0.0-py2.py3-none-any.whl
Collecting six>=1.4.0 (from apscheduler)
  Downloading https://files.pythonhosted.org/packages/73/fb/00a976f728d0d1fecfe898238ce23f502a721c0ac0ecfedb80e0d88c64e9/six-1.12.0-py2.py3-none-any.whl
Installing collected packages: tzlocal, six, apscheduler
Successfully installed apscheduler-3.6.1 six-1.12.0 tzlocal-2.0.0
WARNING: You are using pip version 19.2.3, however version 19.3.1 is available.
You should consider upgrading via the 'python -m pip install --upgrade pip' command.
(env) C:\Users\Toshiba Portege\Documents\smartfarm\tutorial>
```

## 10. py manage.py runserver 8080

```
C:\Windows\system32\cmd.exe - py manage.py runserver 8080
```

```
C:\Users\Toshiba Portege\Documents\smartfarm>env\Scripts\activate
```

```
(env) C:\Users\Toshiba Portege\Documents\smartfarm>cd tutorial
```

```
(env) C:\Users\Toshiba Portege\Documents\smartfarm\tutorial>py manage.py runserver 8080
Watching for file changes with StatReloader
Performing system checks...
```

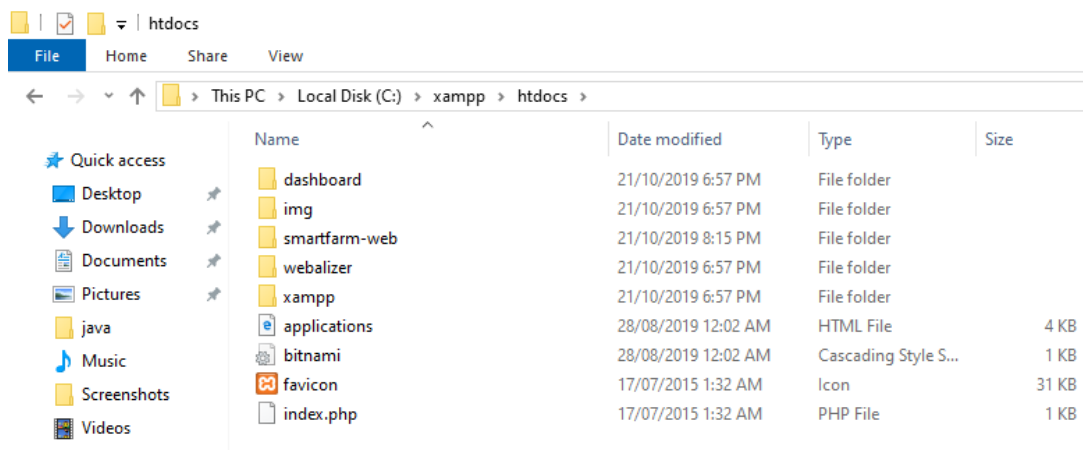
```
System check identified no issues (0 silenced).
```

```
October 21, 2019 - 20:17:48
```

```
Django version 2.2.6, using settings 'tutorial.settings'
```

```
Starting development server at http://127.0.0.1:8080/
```

11. save smartfarm-web inside xampp/htdocs in xampp or inside www/html folder in wampp



12. open <http://localhost/smartfarm-web/> in your browser

