Django Web Framework (Python)

Lab_1_A

What is Django?

- Django is a back-end server side web framework.
- Django is free, open source and written in Python.
- Django makes it easier to build web pages using Python.

How does Django Work?

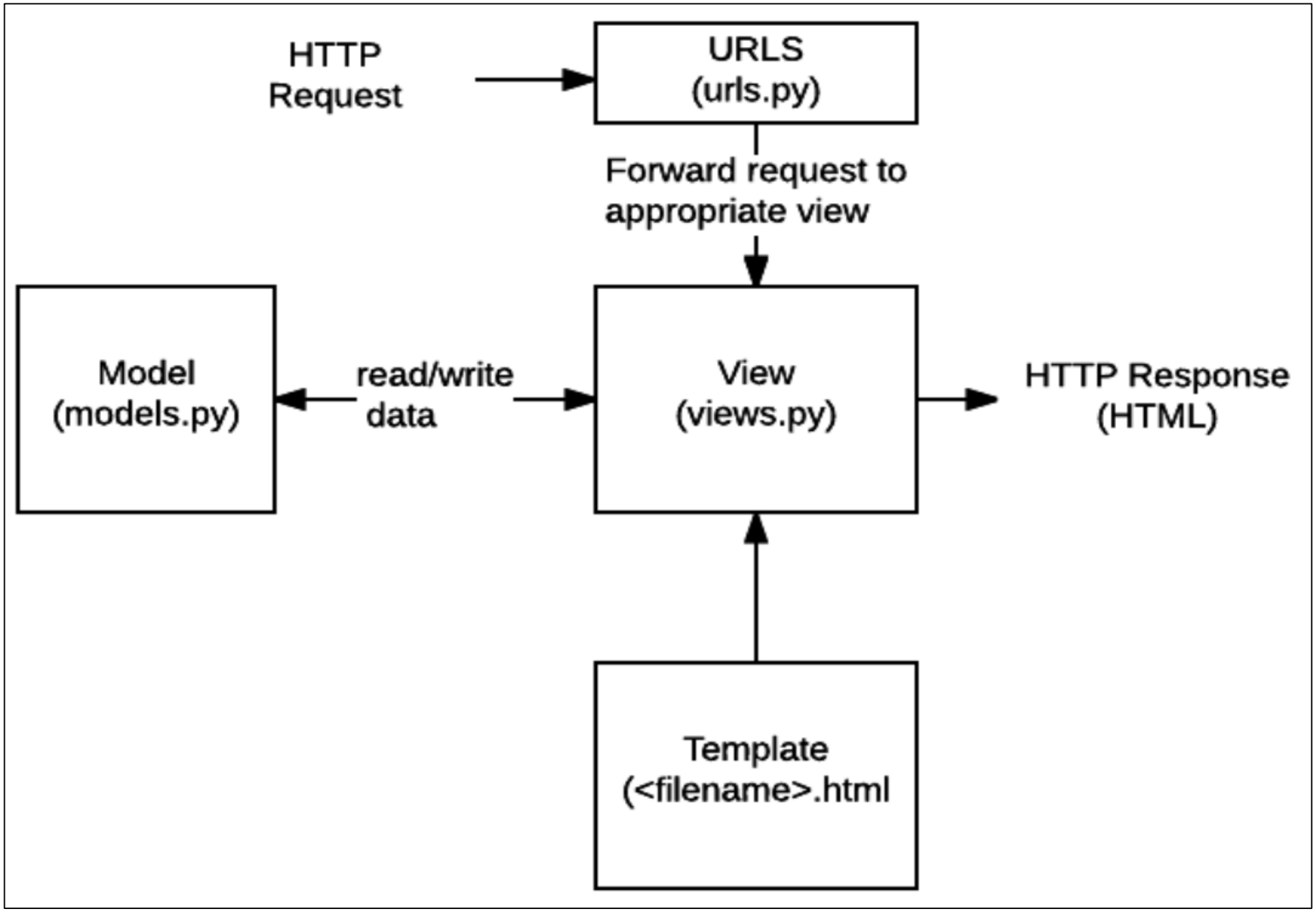
- Django follows the MVT design pattern (Model View Template).
- Model - The data you want to present, usually data from a database.
- View - A request handler that returns the relevant template and content - based on the request from the user.
- Template - A text file (like an HTML file) containing the layout of the web page, with logic on how to display the data.

URLs

- Django also provides a way to navigate around the different pages in a website.

- When a user requests a URL, Django decides which view it will send it to.

- This is done in a file called urls.py.


HTTP
Request
URLS
(urls.py)
Forward request to
appropriate view
Model
(models.py)
read/write
data
View
(views.py)
HTTP Response
(HTML)
Template
(<filename>.html

What is Going On?

- Django receives the URL, checks the urls.py file, and calls the view that matches the URL.
- The view, located in views.py, checks for relevant models.
- The models are imported from the models.py file.
- The view then sends the data to a specified template in the template folder.
- The template contains HTML and Django tags, and with the data it returns finished HTML content back to the browser.