

Exercise 2.3: Django Models

Learning Goals

- Discuss Django models, the “M” part of Django’s MVT architecture
- Create apps and models representing different parts of your web application
- Write and run automated tests

Reflection Questions

1. Do some research on Django models. In your own words, write down how Django models work and what their benefits are.

Django models are Python objects that allow web applications to use the structure from a database to store data. For each Table there is a Model and each column is defined within this model and the way the data is stored within them. For example. A user request is made, via the controller a query is sent to the Models, which then reads/writes the database, the result returns to the model, which is then sent through the controller onto the Template shows these returned results.

The models creates the interface saving the developer time because they don't need to write this code and that the data in any database can be migrated, so not needed to learn SQL.

2. In your own words, explain why it is crucial to write test cases from the beginning of a project. You can take an example project to explain your answer.

Testing is crucial in ensuring that unforeseen errors are corrected as you build the application. Testing each model as it is built saves time and errors from occurring later. Inputting incorrect values ensures that the test written will fail proves the test is correct, if it does not fail then you can find the errors in your code or how the test was written. For example, you want to ensure only 50 characters are used in a name field so by testing 60 characters will give you an error.