

## Exercise 2.8: Deploying a Django Project

### Learning Goals

- Enhance user experience and look and feel of your web application using CSS and JS
- Deploy your Django web application on a web server
- Curate project deliverables for your portfolio

### Reflection Questions

1. Explain how you can use CSS and JavaScript in your Django web application.

CSS and Javascript can be used in a Django web application to do things such as, adjusting formatting, aligning text, adding colors, and even installing dynamic elements to an application. CSS and JavaScript files will be stored in a 'static' folder that is found inside the 'src' folder. When you want to access these files you need to refer to them in your HTML templates by doing the following:

```
<head>
  <link rel="stylesheet" href="static/styles.css">
  <script src="static/js.js" defer></script>
</head>
```

2. In your own words, explain the steps you'd need to take to deploy your Django web application.

The following steps are needed to deploy a Django web application to heroku:

- Clear sensitive information (such as security keys)
  - Create a .gitignore file to ensure only files needed for production environment are pushed
  - Create Procfile, install Gunicorn and configure app to be hosted on a service provider
  - Configure database in settings.py file and install dj-database-url and psycopg2
  - Update settings.py file to handle static files in production and install whitenoise
  - Create requirements.txt file to replicate development environment in production
  - Push all changes to GitHub
  - Then changes can be pushed to heroku and deployed
  - Finally, run heroku config:set to set the SECRET\_KEY
3. (Optional) Connect with a few Django web developers through LinkedIn or any other network. Ask them for their tips on creating a portfolio to showcase Python programming and Django skills. Think about which tips could help you improve your portfolio.
  4. You've now finished Achievement 2 and, with it, the whole course! Take a moment to reflect on your learning:

a. What went well during this Achievement?

I think a lot of things went well with this assignment. I got a strong grasp of Django, and was able to reinforce some basic principles of working with python.

b. What's something you're proud of?

I am proud of the finished application, specifically its design. I wanted to make something that looked unique and different from other applications I currently have on my portfolio site.

c. What was the most challenging aspect of this Achievement?

For me, the most challenging aspect of this Achievement was definitely deploying. I struggle when it comes to this step, but no matter the number of issues, I continue to focus on persevering and not letting my frustrations prevent me from succeeding.

d. Did this Achievement meet your expectations? Did it give you the confidence to start working with your new Django skills?

Yes, this Achievement certainly met my expectations. It gave me a glimpse of what Django is capable of and has gotten me excited to take what I have learned and continue to push myself to do more with Django and Python.

Well done—you've now completed the Learning Journal for the whole course.