Sure Backend Interview

Take-Home Challenge

Congratulations! You've reached the take-home challenge portion of our interview process. In this off-site challenge, we are looking to get a fuller picture of your technical skills, and to show you the type of work we do regularly here at Sure.

Overview

Build an API that will hook into an e-commerce frontend that sells prints by an artist.

Client Story

The estate of Herman Leonard, the famous photographer, would like a new web-based storefront to sell various prints of Herman's work. They have been working with another agency that will be handling all of the design and front-end work, and have reached a point where they are ready to have somebody begin the backend development. Wireframes of the current product order page have been provided to help inform your backend design.

Feature requests

- Users should be able to order a print of a photo out of 100 available photos.
- Users should be able to order the print in one of three sizes (small, medium, and large).
- Print costs are the following:
 - o Small \$10.00 + \$4.99 shipping
 - Medium \$15.00 + \$5.99 shipping

- Large \$20.00 + \$7.99 shipping
- Users should be able to provide all necessary shipping information.
- API should have an endpoint that returns the entire photo catalog
 - This endpoint should optionally receive parameters that allows the front end to lazy-load the catalog 20 photos at a time.
- API should have an endpoint that receives the order details, processes and persists the order, and returns an order number, and billing summary.
- Write tests to cover all of your features.

Technical considerations

- Use the latest version of Python 3, and the latest Django framework to build the API.
- API should be built following the principles of RESTful design.
- Ensure photo catalog and order data are persisted in a database (SQLite is a good option).
- You do not have to do any frontend development, the included wireframes (below) are there to guide your API design.
- Your API does not need to be hosted anywhere, please provide either a zip file of the source code, or access to a private Github repository.

Wireframes

