

SDE I Python Assignment

Objective:

Create a set of CRUD APIs for managing a product inventory. The final submission should be production-ready and dockerized.

Requirements:

1. Framework: You can use either Django or FastAPI.
2. APIs: Develop the following four APIs:
 - Get a single product by ID.
 - Get all the products.
 - Update a product by ID.
 - Delete a product by ID.
3. Product Model: The product model should have the following attributes:
 - `id`: Integer (Primary Key)
 - `name`: String
 - `category`: String
 - `price`: Float
4. Database: You can use any database of your choice.
5. Docker: Ensure the final submission is dockerized and ready for production.
6. Bonus Points:
 - Proper project structure
 - Usage of type hints
 - Usage of ORM (Object-Relational Mapping)
 - Adherence to REST API design best practices

Additional Points:

- Feel free to make any assumptions necessary for completing the assignment.
- Avoid using ChatGPT or any other AI tools for code generation.
- Ensure originality in your code to avoid plagiarism.

Submission Details:

1. Create a public GitHub repository.
2. Push your final code to this repository.
3. Share the repository link by filling the below form.

Assignment Submission URL: <https://forms.gle/Hzzxk9dsZekuN8GC6>