Business Scenario: Online Store Inventory and Supplier Management API

Background:

You are developing a system for an online store to manage its inventory and suppliers. The store requires an API to handle these aspects efficiently. This API will be utilized by various internal systems, including the front-end interface and the inventory tracking system.

Requirements:

Inventory Item Record:

The store maintains a variety of items in its inventory.
Each item should have a name, a detailed description, a price, and the date when it was added to the inventory.

Supplier Record:

The store sources items from various suppliers.
Each supplier should have a name, contact information, and a list of items they supply.

Inventory-Supplier Relationship:

Establish a relationship between items and suppliers. An item can have one or multiple suppliers, and a supplier can provide multiple items.
Employees should be able to view which suppliers provide a specific item and also see the list of items supplied by a particular supplier.

Inventory Management:

Employees need capabilities to add, view, update, and remove items from the inventory.

Supplier Management:

There should be functionalities to add new suppliers, update their details, and view their information.

Data Accessibility:

Ensure that both inventory and supplier data are accessible in a format compatible with other systems (like web frontends or mobile applications).

Testing and Documentation:

The system should be robust and accompanied by clear documentation for other developers and team members.

Deliverables:

A working API that fulfills the above requirements, including handling relational data between inventory items and suppliers.
Basic tests to verify the functionality and reliability of the API.
Documentation for setting up the project and interacting with the API.
Time Frame:
Complete the task within 2 hours.

Evaluation Criteria:

- Understanding of Requirements: Ability to interpret business needs and design a functional system with relational data models.
- Functionality: The API should accurately represent the relationships between inventory items and suppliers and perform all required operations.
- Code Quality: The code should be clean, efficient, and maintainable.
- Documentation: Provide clear and concise documentation for setup and usage of the API.

This revised scenario introduces a relational aspect between inventory items and suppliers, adding complexity and giving you a better opportunity to assess the candidate's skills in designing and implementing relational data models in Django.