# **Bookkeeping Application**

The goal is to create a simple bookkeeping API backend where users can record financial transactions. These transactions can be either credit or debit entries. The transactions can be optionally attributed to a contact (not a mandatory relation). A contact is a simple record of (name, phone number).

The system must be idempotent and prevent duplicate entries.

## **API** Requirements

- 1. Return all the transactions (paginated), ordered by latest created timestamp.
- 2. Allow filters by debit or credit transactions
- 3. Allow filters transactions against a contact
- 4. Create contacts (name + phone number)
- 5. Create transactions (amount, type [debit/credit], contact)
- 6. The backend API should enforce idempotency and prevent duplicates. If the API is called with the same input parameters in quick succession, only one record should get created and the remaining API calls should return an error.

## **Technology**

- 1. Any web programming framework and database of your choice
- 2. The backend APIs can be REST or GraphQL

### **Judging**

- 1. Database Schema Needs to be flawless. It's the basic architecture of your application.
- 2. Code Style Use indents, spaces wisely. Write test cases.
- 3. Code Quality Understanding of MVC & OOPS will be tested.
- 4. Completion of Requirements

#### GOOD LUCK!