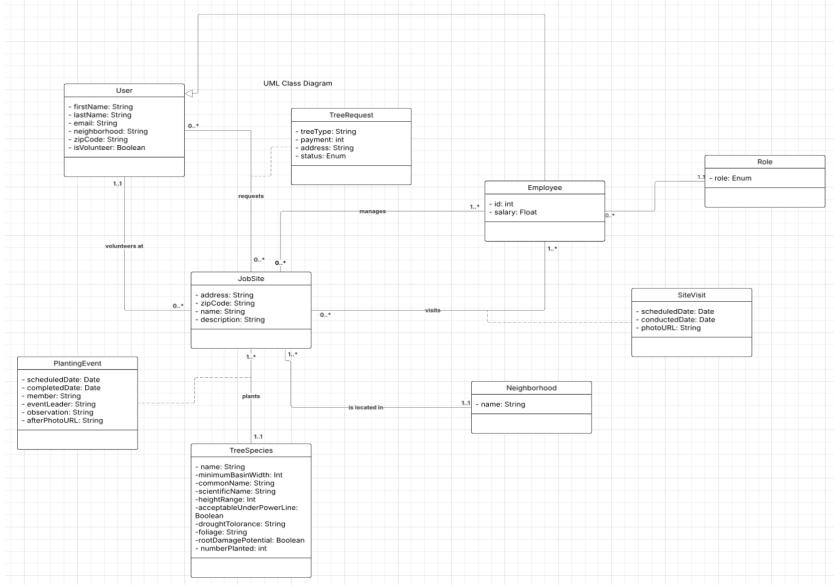
# OAKhoury Trees

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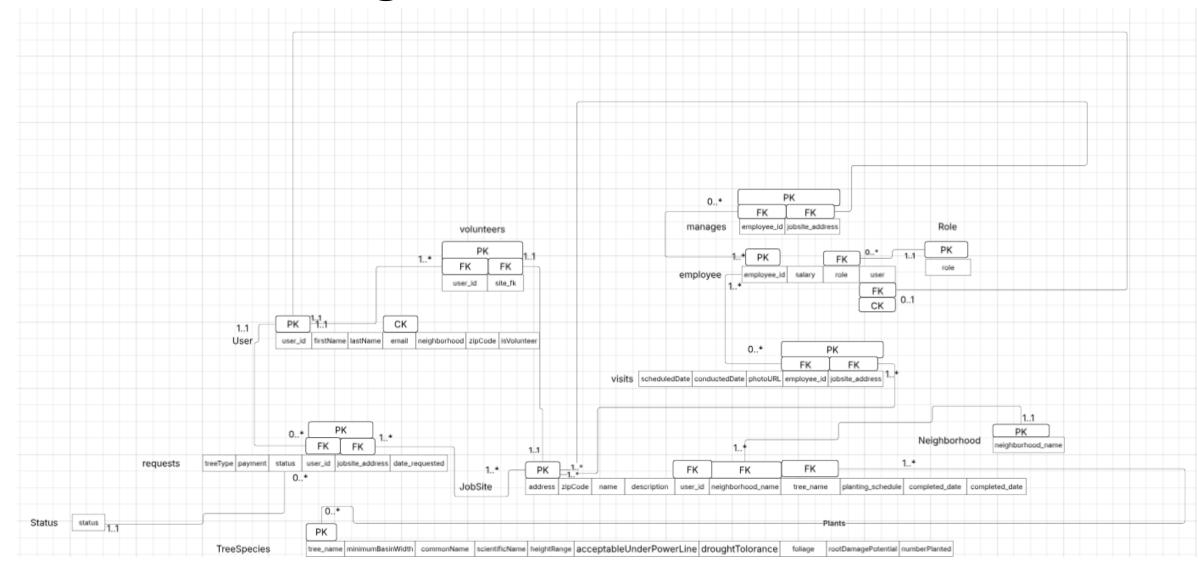
### **Project Motivation**

- Trees for Oakland is a nonprofit helping residents plant trees across the streets of Oakland
- The existing system uses Google Forms, spreadsheets, and manual processing – no central system
- Hard to track request progress, manage volunteers, and gather data
- Goal: create a centralized, efficient, and scalable solution that uses a database and application

# Database Design – UML Diagram



## Database Design – Relational Model



#### Source of Data

- https://localwiki.org/oakland/Neighborhoods
  - List of Oakland neighborhoods provided to us in the assignment
- https://www.oaklandca.gov/resources/official-street-tree-list
  - Description and traits of common trees found in Oakland provided to us in the assignment
- Traits of people, dates, etc., were generated at random by ourselves

### System Description

- The application is made in java
- It is used from the terminal
- It starts by allowing the user to choose between the 11 tasks
- The application doesn't allow the user to make any changes to the database unless they are a registered user.
- It uses premade statements that the user inputs variables into

#### **Core Features**

- Only Users/ Employees can make certain changes to the database
- It allows new commers to register as a user
- Employees are able to make the major changes to the database
  - Register new trees
  - Record Plantings
  - Schedule visits
- Users have less power but still can make small changes
  - Request a job
  - Volunteer