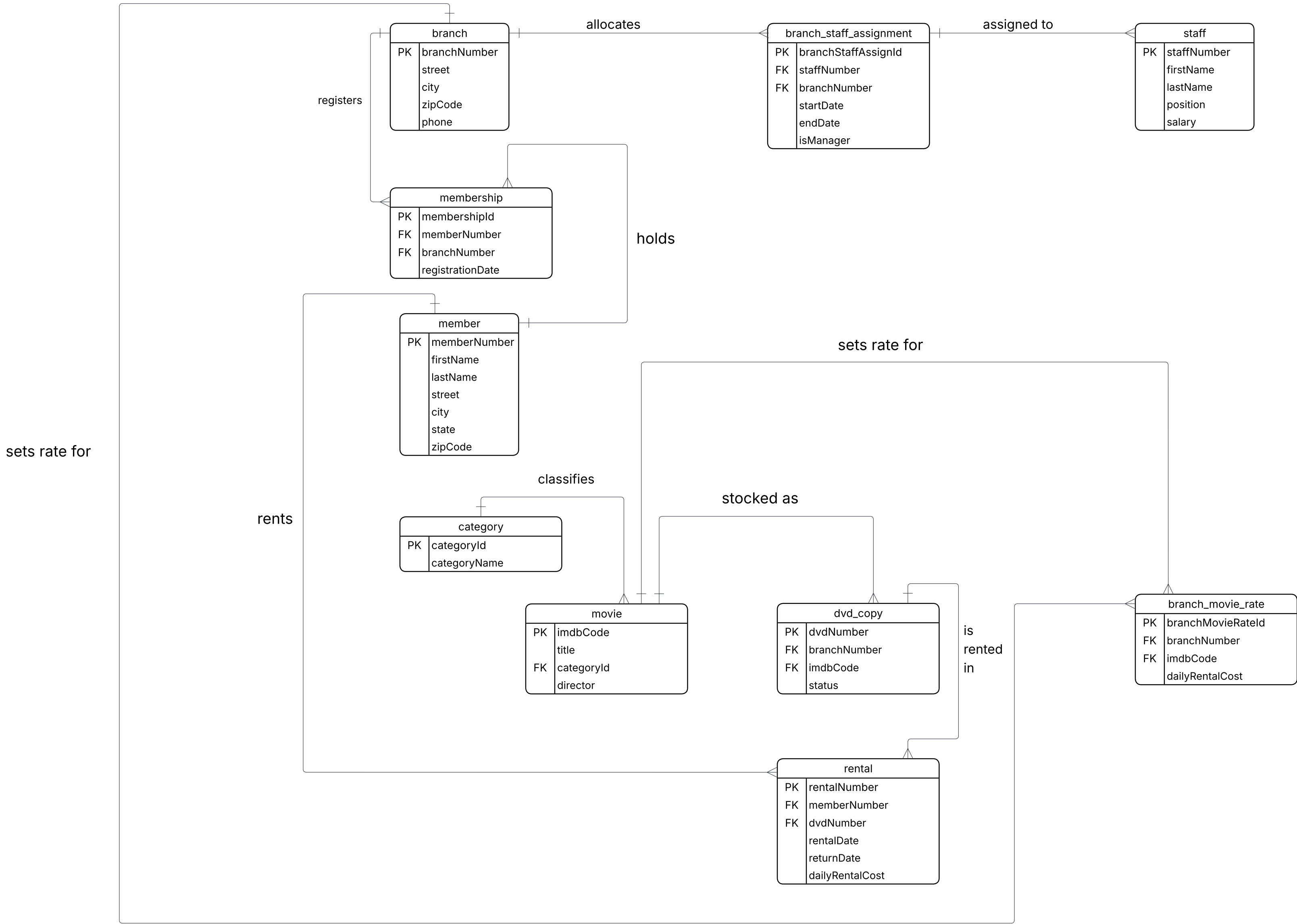


DVD Rental Company



- Assumptions
- 1) Branches & identifiers
- Each branch has a company-wide unique branchNumber plus street, city, state, zipCode, phone.
 - staffNumber, memberNumber, dvdNumber, and imdbCode are unique company-wide identifiers.
- 2) Staffing & management
- Staff are employed by the company (name, position, salary stored in staff).
 - A staff member works at one branch at a time, but may be reassigned over time; history is recorded in branch_staff_assignment(startDate, endDate).
 - Each branch has exactly one active manager at any time, branch_staff_assignment.isManager = true (no overlapping manager rows per branch).
- 3) Memberships (customers registering at branches)
- A member can register at multiple branches; each registration is a row in membership(memberNumber, branchNumber, registrationDate).
 - A member's postal address is stored on member; registrationDate is when they joined that specific branch.
- 4) Movies & categories
- Each movie is uniquely identified by imdbCode and has title, director, and categoryId.
 - Each category (e.g., Action, Drama, Horror, Sci-Fi) can classify many movies; each movie belongs to exactly one category.
- 5) Physical DVD copies (stock)
- dvd_copy represents a physical disc: each copy has a company-unique dvdNumber, belongs to one branch and one movie, and carries a status (e.g., Available, Rented, Damaged).
 - A movie may have many copies at a branch; copies can move branches only by updating branchNumber
- 6) Branch pricing (rate per movie per branch)
- Each branch sets a standard dailyRentalCost for each movie it rents; stored in branch_movie_rate(branchNumber, imdbCode, dailyRentalCost).
 - The dailyRentalCost on rental is a snapshot copied from branch_movie_rate at checkout to preserve history when rates change later.
- 7) Rentals
- A rental links one member to one dvd_copy with rentalDate and returnDate (nullable until returned).
 - A dvd_copy can be rented many times over time (separate rows).