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SCORE

Q1.This data model provides a structured representation of the entities, attributes, and their relationships, facilitating efficient data management and retrieval in a complex system involving reservations, companies, venues, staff members, jobs, and contracts.

- a. When a company reserves a venue it stores name, address & organizer. The date when it is reserved can be stored. The venue must be either unstaffed or staffed. Staffed venue is having budget and unstaffed venue is having total area. A reservation _agreement id and payment is stored in database. Each agreement has a unique id.
- b. A Company stores its location and is been recognised by its name
- c. A parent company can own many child companies and the acquired date is been record.
- d. A venue has many rooms where it stores room number & capacity. The room is not identified by number and capacity
- e. Every staffed venue must have either one or many Staff members whose id, first name, last name and and phone numbers can be stored. Every staff member is been identified by his or her id. A staff member can have multiple phone numbers.
- f. Staff members can work on many jobs where there job id and payment is been recorded. Their start date and end date when he works on is recorded
- g. A staff member who works on a job signs a contract which stores the contract id ,date signed and details and the contract will be identified by a contract id.

Q2.Conversion of attached ER diagram to Relational Database(i.e. A set of relation schemas)

Reservation_Agreement(id, payment)

Company(name, location)

Room(Venue name, Venue address, number, capacity)

Venue(name, address, organizer)

Unstaffed_Venue(Venue name, Venue address, total_area)

Staffed_Venue(Venue name, Venue address, budget)

Staff_Member(id, first name, last name, Venue name, Venue address)

Phone_number(Staff_Member id, phone_number)

Job(job_id, payment)

works_on(Staff_Member_id, job_id, start_date, end_date)

Contract(contract_id, date_signed, details)

signs(contract_id, Staff_Member id, job_id)

reserves(Reservation_Agreement id, Company name, Venue name, Venue address, date)

owned_by(child company_name, parent company_name, date_acquired)