

North South University Department of Electrical & Computer Engineering PROJECT REPORT

Course Code: CSE 327

Course Title: Software Engineering

Section: 04

Project Name: Centralized Hospital Management System Using MySQL

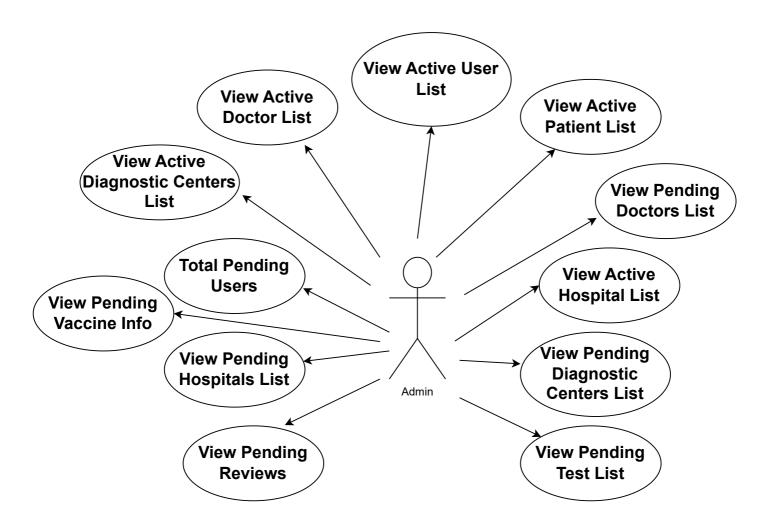
CHMS

Date of Submission: 14 May 2024

Group members:

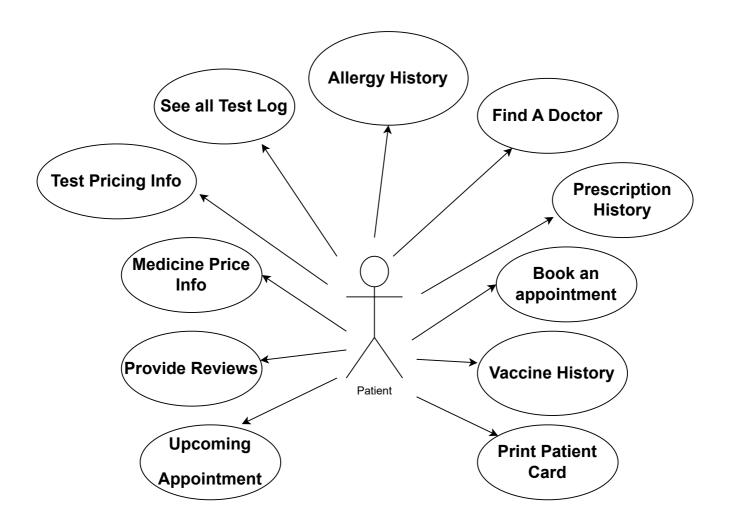
Name	ID
1. Saikat Ghosh	2011146642
2. Joy Kumar Ghosh	2211424 6 42

Course Instructor: Maktuba Mohid Binni



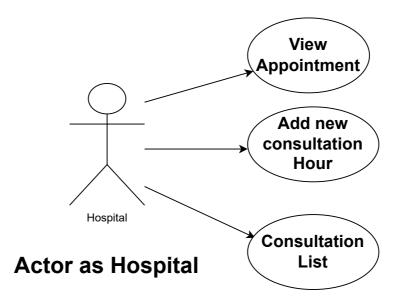
Actor as Admin

Drawn By Saikat Ghosh - 2011146642

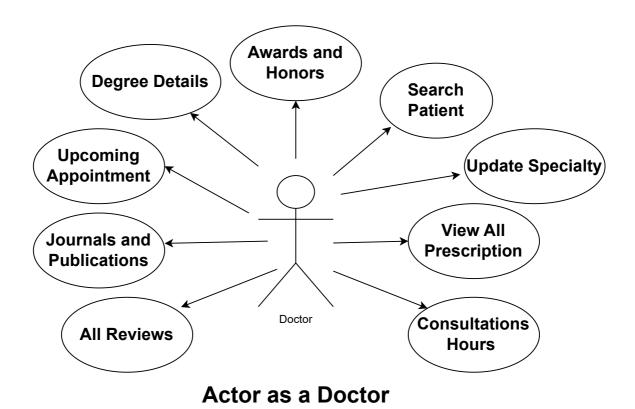


Actor as a Patient

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Drawn By Joy Kumar Ghosh - 2211424 6 42



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User_Details

- + ID: int
- + User Name: varchar
- + Password: char
- + Role: varchar
- + Phone Number: char
- + Email: char
- + Address: varchar
- + Photo: char
- + Status: bool
- + updatePassword(int, char): bool
- + updatePhoneNumber(int, char): bool
- + updateEmail(int, char): bool
- + updateAddress(int, char): bool
- + updatePhoto(int, char): bool
- + updateStatus(int, bool): bool

Medicine

- + ID: int
- + Name: varchar
- + Strength: varchar
- + Group Name: varchar
- + Brand Name: varchar
- + Price: float
- + updatePrice(int): bool

Appointment

- + ID: int
- + P ID: int
- + D ID: int
- + H ID: int
- + Date: date
- + updateDate(int, date): bool

Speciality

- + D ID: int
- + Field: varchar
- + updateField(int, char): bool

Awards_Honors

- + D ID: int
- + Award Name: varchar
- + Awarding Organization:: varchar
- + Year Received: year
- + Description: varchar
- + updateName(int, char): bool
- + updateOrganization(int, char): bool
- + updateYear(int, int): bool
- + updateDescription(int, char): bool

Patient

- + ID: int
- + Fname: varchar
- + Lname: varchar
- + DOB: date
- + Gender: char
- + Emergency Number: char
- + Blood: char
- + Weight: float
- + searchDoctor(): int[]
- + bookAppointment(int): bool
- + viewAppointment(int): int[]
- + viewPrescriptions(int): int[]
- + viewTest(int): int[]
- + searchTest(char): int[]
- + searchMedicine(char): int[]
- + addAllergy(char, int): bool
- + viewAllergy(int): char[]
- + addVaccine(char, int): bool
- + viewVaccine(int): char[]
- + provideReviews(int): bool
- + printPatientCard(int); void

Prescriptions

- + ID: int
- + Date: date
- + D ID: int
- + P ID: int
- + Problem: varchar
- + Suggestions: varchar
- + updateProblem(int, char): bool
- + updateSuggestions(int, char): bool

Consultation

- + D ID: int
- + H ID: int
- + Day: char
- + Start Time: timestamp
- + End Time: timestamp
- + Room: int
- + Fees: float
- + MAX Capacity: int
- + updateRoom(int, int, int): bool
- + updateFees(int, int, float): bool
- + updateCapacity(int, int, int): bool

Doctor_Reviews

- + P_ID: int
- + D ID: int
- + Date: date
- + Comment: varchar
- + Ratings: float
- + Status: bool
- + updateDate(int, int, date): bool
- + updateComment(int, int, char): bool
- + updateRatings(int, int, float): bool
- + updateStatus(int, int, bool): bool

Doctor

- + ID: int
- + License Number: int
- + Fname: varchar
- + Lname: varchar
- + Title: varchar
- + DOB: date
- + Gender: char
- + Experience From: date
- + Language: varchar
- + Current Position: varchar
- + P Location: varchar
- + searchPatient(int): int
- + newPrescription(int): bool
- + viewPrescription(int): int[]
- + viewAppointment(int): int[]
- + addAwards(char, int): bool + viewAwards(int): char[]
- + addSpeciality(int, char): bool
- + viewSpeciality(int): char[]
- + addDegree(int, char): bool
- + viewDegree(int): char[]
- + addJournals(char, int): bool
- + viewJournals(int): char[]
- + viewConsultationHour(int): char[] + viewReview(int): int[]

Prescribed_In

- + Pr ID: int
- + M ID: int
- + Morning: bool
- + M After Meal: bool
- + Noon: bool
- + N_After_Meal: bool
- + Night: bool
- + Nt_After_Meal: bool
- + updateMorning(int, bool): bool
- + updateNoon(int, bool): bool
- + updateNight(int, bool): bool

Vaccine_Log

- + P ID: int
- + Vaccine Name: varchar
- + Doss Number: int
- + Date: date + Status: bool
- +updateVaccine(int, char): bool
- + updateDoss(int, int): bool
- + updateDate(int, date): bool
- + updateStatus(int, bool): bool

Degrees

- + D ID: int
- + Degree: varchar
- + Field: varchar
- + Institution: varchar
- + Year: year
- + updateDegree(int, char): bool
- + updateField(int, char): bool
- + updateInstitution(int, char): bool + updateYear(int, int): bool

Hospital

- + ID: int
- + LIcense Number: int
- + Name: varchar
- + viewAppointment(int): int[]
- + addConsultationHour(int): bool
- + viewConsultationList(int): int[]

Diagnostic Center

- + ID: int
- + LIcense Number: int
- + Name: varchar
- + claimTest(int): bool
- + addNewTest(int, char): bool
- + uploadTestReport(int): bool
- + viewTestReport(int): int[] + addMissingTest(int): bool

Test_Log

- + ID: int
- + T_ID: int + P ID: int
- + Prescription_ID: int
- + DC ID: int + Test_Date: date
- + Result Date: date + Result: char + Comment: varchar
- + updateDCID(int): bool + updateResultDate(int): bool
- + uploadReport(int): bool + addComment(int, char): bool

+ updateComment(int, char): bool

Test

- + ID: int + Name: varchar
- + Price: float + Status: bool
- + updateName(int, char): bool + updatePrice(int, float): bool + updateStatus(int, bool): bool

Allergies_Log

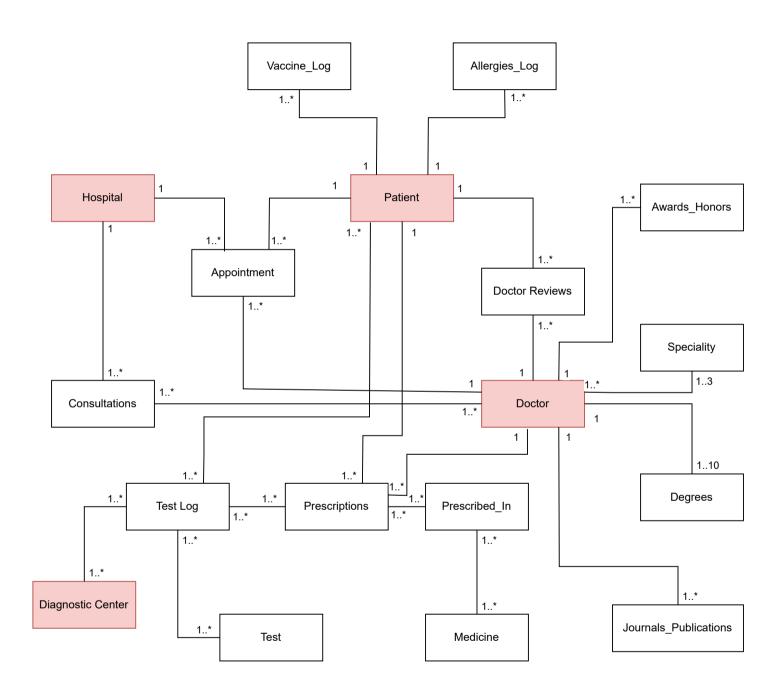
- + P_ID: int + Allergies: varchar
- + updateAllergies(int, char): bool

Publications

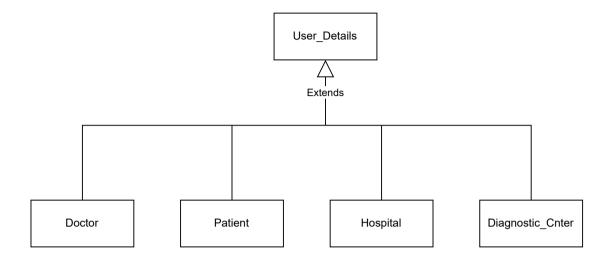
- + D ID: int
- + Title: varchar + Year: year + Link: varchar
- + updateTitle(int, char): bool
- + updateYear(int, int): bool
- + updateLink(int, char): bool

Total 19 Class Information Diagram

Class Diagram

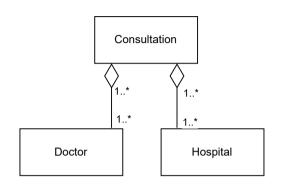


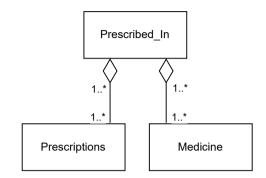
Generalization



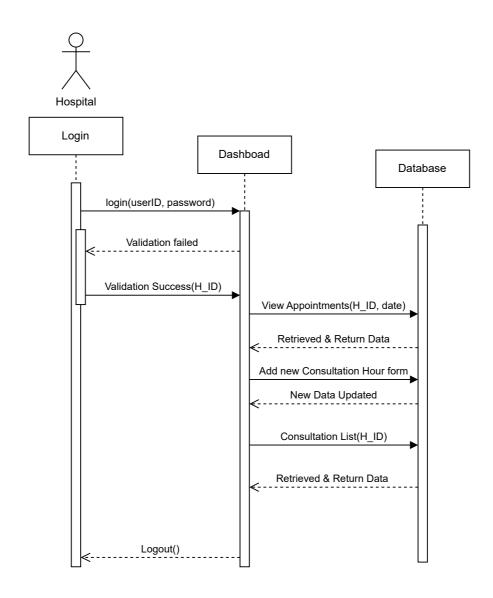
Group Work

Aggregration





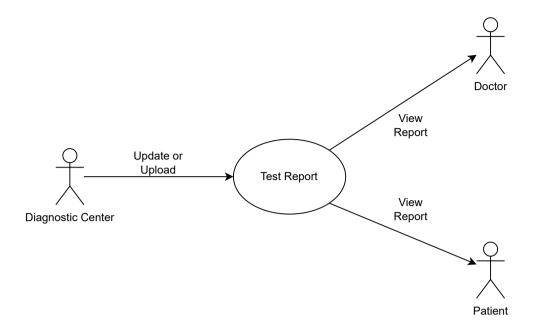
Group Work

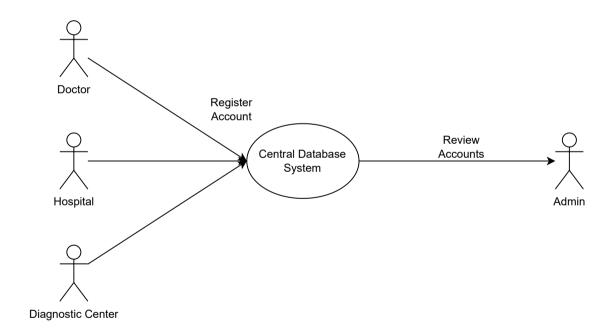


Hospital Sequence Diagram

Drawn By Saikat Ghosh - 2011146642

Use Case Interaction





Group Work