**­­Heart Disease Risk Prediction System**

**All Modules**

1. **Role-Based Logins (Admin, User, Doctor):**
   * Admin: Manages the system, user accounts, and data.
   * Doctor: Views patient predictions and provides medical advice.
   * User: Submits personal health data and views prediction results.
2. **Disease Prediction:**
   * This module predicts the likelihood of heart disease based on patient data such as age, blood pressure, cholesterol, etc.
   * Machine Learning algorithms gradient boosting and logistic regression are used to analyze the data and classify the risk levels (low, medium, or high).
   * Provides personalized insights for early diagnosis and better treatment planning.
3. **Lifestyle Assessment:**
   * Allows users to input lifestyle habits (gender, age, occupation, sleep duration, quality of sleep, physical activity level, stress levels, BMI category, blood pressure, heart rate, etc.) to predict the initial chances of risk.
4. **View Diseases:**
   * Displays information about various heart diseases, their symptoms, causes, and treatment options.
   * Helps users and doctors understand potential risks and make informed decisions.
5. **Doctor Appointment Module:**
   * Users can search for doctors by name, specialization, location, or availability.
   * Displays doctor profiles, including qualifications, experience, and ratings.
   * Users can select a date and time for consultation based on doctor availability.
   * Allows both in-person and virtual appointment options.
6. **Search Your Doctor:**
   * Allows users to search for doctors specializing in heart-related conditions based on their location or expertise.
   * Provides contact details and availability for consultations.
7. **Feedback System:**
   * Enables users and doctors to provide feedback on the system’s functionality and accuracy.
   * Collects suggestions for improvements to enhance user experience.