




Cardio is a medical web platform that was created to help doctors visualize and predict cardiovascular diseases. This is a brief user manual to explain how you can use the system.

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Sign up

To sign up you have to enter a valid email address and two matching passwords. If this is satisfied, your account will be created, and you will be redirected to the “Patients” page.

 Cardio

Use without login


About

 Sign Up

Email

Password

Repeat Password



Add new patient

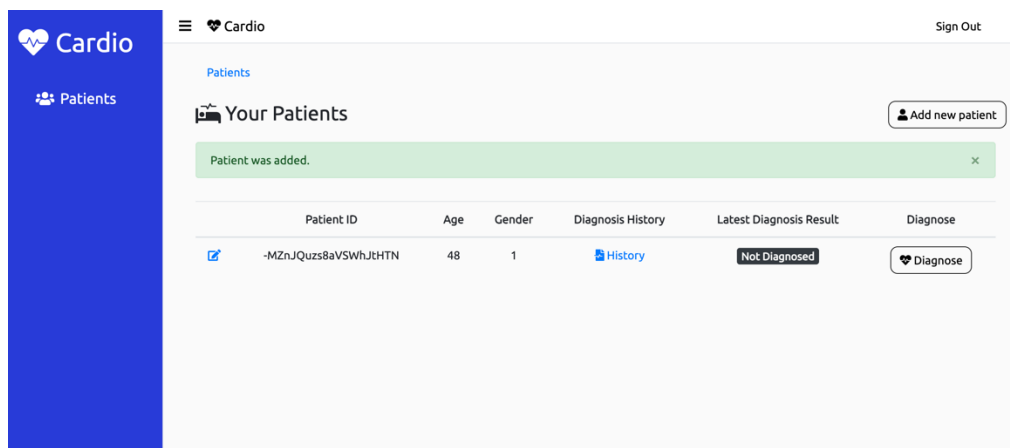
Once you are in the patients page you can add new patients and edit and diagnose existing patients. To add a new patient click on the “add patient” button.



A modal will open requiring the age of the patient and their gender. Once successfully entered, a new patient will be created in the database with a unique patient id that you will use to identify the patient.

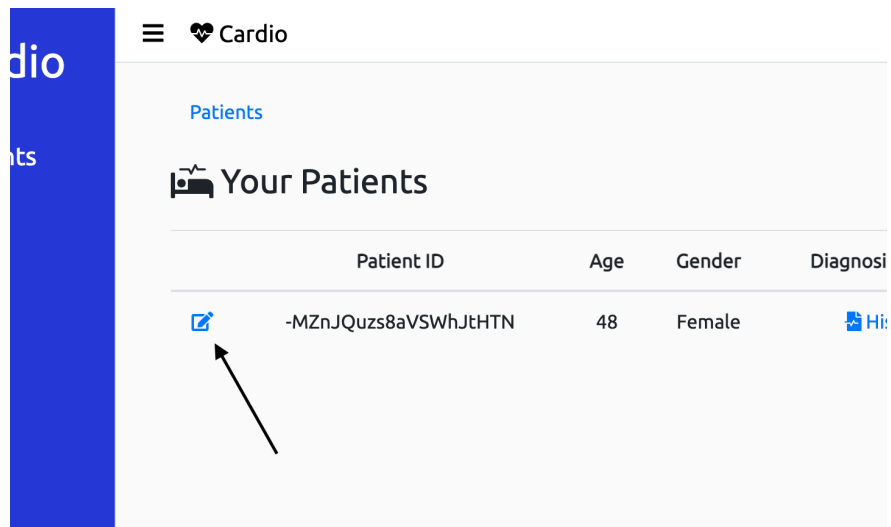


The new patient will appear on your “Patients” page.




Edit patient

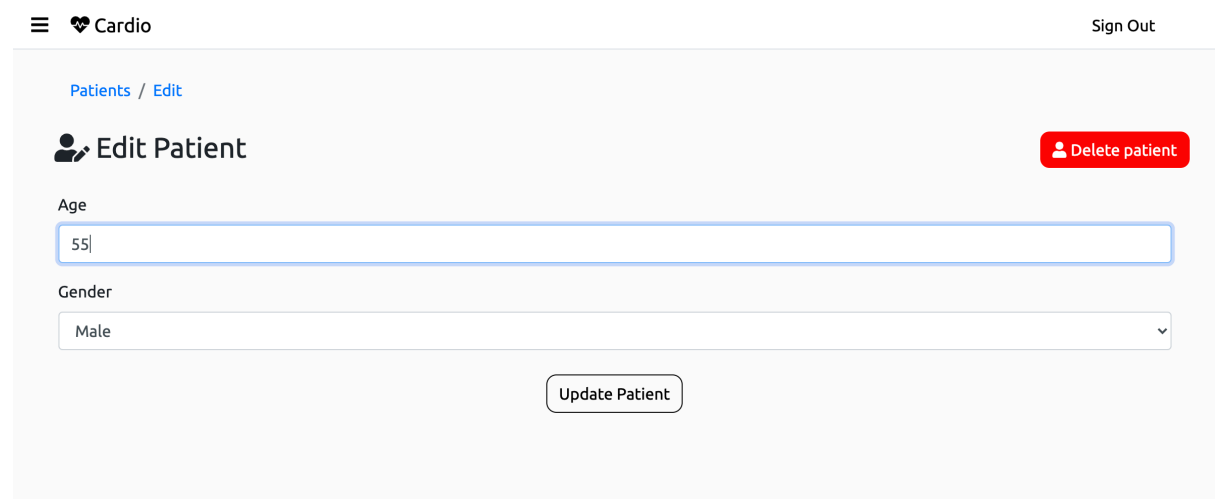
You can edit the patient information by clicking on the “edit” button on their row.



The screenshot shows a web interface for a 'Cardio' application. On the left is a blue sidebar with the text 'dio' and 'nts'. The main content area has a header with a hamburger menu icon and 'Cardio'. Below this is a 'Patients' link and a 'Your Patients' section with a stethoscope icon. A table lists patient information with columns: Patient ID, Age, Gender, and Diagnosis. The first row shows Patient ID '-MZnJQuzs8aVSWWhJtHTN', Age '48', Gender 'Female', and a partial diagnosis 'Hi'. A blue edit icon (pencil) is in the first column of this row, with a black arrow pointing to it.

	Patient ID	Age	Gender	Diagnosis
	-MZnJQuzs8aVSWWhJtHTN	48	Female	Hi

In the edit page you can update a patient’s age and gender.



The screenshot shows the 'Edit Patient' form in the 'Cardio' application. The top bar includes a hamburger menu, 'Cardio', and a 'Sign Out' link. The breadcrumb 'Patients / Edit' is shown. The title 'Edit Patient' is next to a person icon, and a red 'Delete patient' button is on the right. The form has two input fields: 'Age' with the value '55' and 'Gender' with a dropdown menu set to 'Male'. An 'Update Patient' button is at the bottom.

Age: 55

Gender: Male

Update Patient

Diagnose

To diagnose a patient, click on the diagnose button on the patient's row.

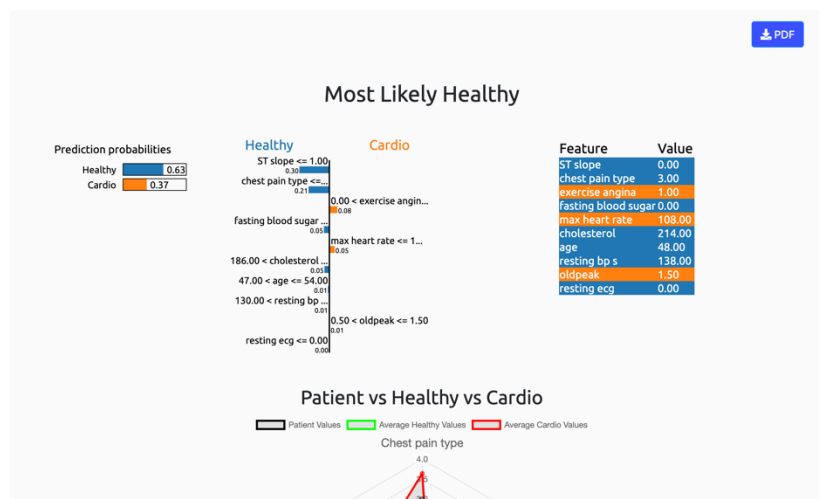
The screenshot shows a web interface for managing patients. At the top, there's a 'Patients' header and a 'Your Patients' section with an 'Add new patient' button. A green notification bar says 'Patient was added.' Below is a table with columns: Patient ID, Age, Gender, Diagnosis History, Latest Diagnosis Result, and Diagnose. The first row shows a patient with ID '-MZnJQuzs8aVSWHJtHTN', Age 48, Gender 1, and a 'Not Diagnosed' status. An arrow points to the 'Diagnose' button in the last column of this row.

Patient ID	Age	Gender	Diagnosis History	Latest Diagnosis Result	Diagnose
-MZnJQuzs8aVSWHJtHTN	48	1	History	Not Diagnosed	Diagnose

An input form will appear where you have to fill the values for all the inputs. Once successfully filled click on the “diagnose” button.

The screenshot shows the 'Diagnose Patient' form. It has a sidebar with 'Cardio' and 'Patients' links. The form title is 'Diagnose Patient' with a subtitle 'Fill out the form to diagnose whether the patient suffers from a cardiovascular disease.' The form contains several input fields: Chest pain type (Non anginal pain), Resting Blood Pressure (138), Total Cholesterol (214), Fasting blood sugar (Less or equal to 120 mg/dl), Resting ECG (Normal), Max heart rate achieved (108), Exercise angina? (Yes), Oldpeak (1.5), and ST slope (Normal). An arrow points to the 'Diagnose' button at the bottom right of the form.

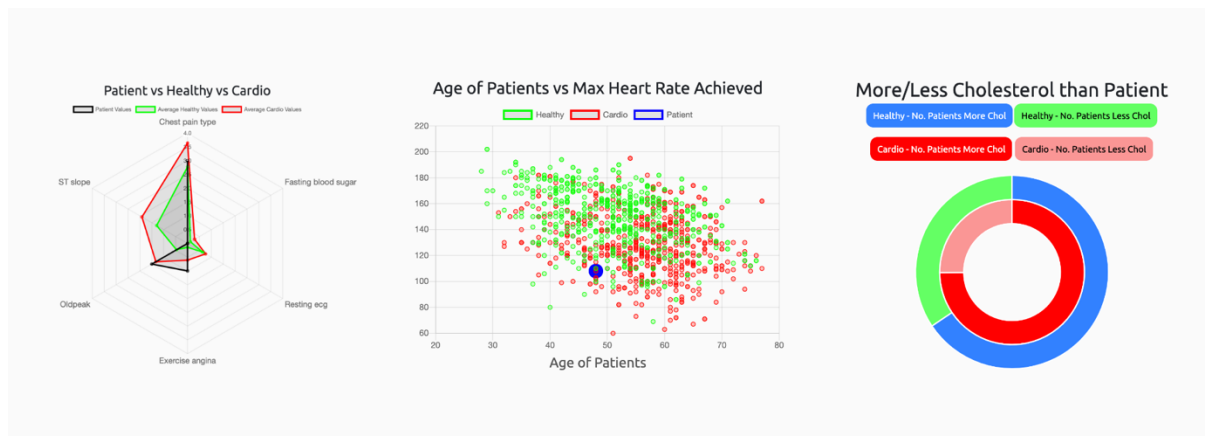
This will automatically generate a medical report displaying all of the patient's data in a meaningful graphical way.



Treat

Three types of graphs are generated in the visual report:

- 1) **A radar graph** - Showing the variation between the **average** healthy and CVD values against patient's values.
- 2) **Scatter Age graph** – Showing the distribution of healthy and CVD patients in a scatter chart as a function of age against various parameters
- 3) **Doughnut** – Showing the number of patients who have a higher or lower value for a health feature than the current patient.



You can use the graphs to further understand the condition of the patient and compare them against other healthy and CVD patients. The graphs generated in the medical report can also be downloaded as a PDF. If you feel appropriate you can show these graphs to the patient to help them understand better their condition and your diagnosis.

If you want to add any comments on the report, you can do that at the bottom of the report page. This comment will be saved in the database along with the diagnosis values and generated pdf.

Comments:

New comment!

Save Comments

History

Once you are done with your examination and return to the “Patients” page you will see that the “Latest Diagnosis Result” of the patient changed accordingly to the prediction of the diagnosis.

You can view the diagnosis history of the patient by clicking on the “history” button on the patient’s row.

Cardio Sign Out

Patients

Your Patients Add new patient

Patient ID	Age	Gender	Diagnosis History	Latest Diagnosis Result	Diagnose
-MZnJQuzs8aVSWHJtHTN	48	Female	History	Healthy	Diagnose

Every diagnosis that you perform on the patient will appear here. A diagnosis history row includes the date, result, details and pdf of the graphs of the diagnosis.

Cardio Sign Out

Patients / History

History

48, Female

Date	Diagnosis Result	View Details	PDF
2021-05-03 19:01:12	Healthy	View	PDF

If you click on view details you can see all the values entered and the comment for that diagnosis.

History Specific

Bps:138

Chest: 3

Cholestrol: 214

Electro Cardiogram: 0

Exang: 1

Fasting Blood Sugar: 0

Max Heart Rate Achieved: 108


Oldpeak: 1.5

St Slope: 0


New comment!

Use without login

The “Use without login” feature enables you to quickly diagnose a patient without having to login. The result of the diagnosis will not be stored in the database.

 Cardio

Use without loginAbout

 Diagnose

Fill out the form to diagnose whether the patient suffers from a cardiovascular disease.

Age ⓘ <small>INTEGER: Minimum 0 - Maximum 120</small>	Gender ⓘ
<input type="text" value="Enter Age"/>	<input type="text" value="Male"/>
Chest pain type ⓘ	Resting Blood Pressure ⓘ <small>INTEGER: Minimum 0 - Maximum 300</small>
<input type="text" value="Atypical"/>	<input type="text" value="Enter BP s"/>
Total Cholesterol ⓘ <small>INTEGER: Minimum 0 - Maximum 700</small>	Fasting blood sugar ⓘ
<input type="text" value="Enter Cholesterol"/>	<input type="text" value="Less or equal to 120 mg/dl"/>
Resting ECG ⓘ	Max heart rate achieved ⓘ <small>INTEGER: Minimum 0 - Maximum 300</small>
<input type="text" value="Normal"/>	<input type="text" value="Enter Heart Rate Achieved"/>
Exercise angina? ⓘ	Oldpeak ⓘ <small>NUMERIC: Minimum 0 - Maximum 7</small>
<input type="text" value="No"/>	<input type="text" value="Enter Oldpeak result"/>
ST slope ⓘ	
<input type="text" value="Normal"/>	

Diagnose

Once the form has been filled successfully and the “Diagnose” button was clicked, a graphical report will be generated. The report does not include the download PDF functionality, or the ability to add a comment.

For any enquiries please contact:

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