

A
Project Report
On

“MILK INFORMATION SYSTEM”

Submitted to



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Under the guidance of
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CERTIFICATE

Certificate that project fieldwork report titled “**Milk Information System**” has been completed satisfactory impartial fulfilment of **M.Sc. (Entire Computer Science)** course of **Punyashlok Ahilyadevi Holkar Solapur University, Solapur** for the academic Year 2022-2023 by following students of **Greenfingers College of Computer & Technology, Akluj.**

Mr. Akash Shivasharan Shinde.

ACKNOWLEDGEMENT

“When we start a journey towards something worthwhile it’s never a simple trail nor an easy mile, but we often move on without back. At all the peoples who helped put us on track, so today when we’ve reached the end of our journey. We’d like to thank of all those who walked with us”.

The completion of this project I feel obliged to express my gratitude towards all of them who contributed to the completion of our project. I would like to express my thanks who have guided me during this period. Words can hardly express my deep sense of gratitude for my project guide

Kshirsagar B.J & all faculty members for their intellectual, moral, technical and ceaseless help and cooperation guidance throughout the project work.

I would like to take an opportunity to convey my sincere gratitude to the entire Computer Science Department, GFCCT College.

I would also like to express my heartfelt gratitude towards my colleagues and friends for their moral and technical support throughout the duration of the project.

**Yours Sincerely,
Mr. Akash Shivasharan Shinde.**

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1.INTRODUCTION

This system is an application for the Milk Information System to display the milk information for users requirements. The system is an online application that can be accessed throughout the organization and outside customers as well with proper login provided, which will give better service to the customers.

This system can be used to show the information above in the milk. like Fat, Vitamin A, Vitamin D, Protein, Potassium, Calcium. This system provide to the user to enter our quantity of milk in MiliLiter and this system display the user intered quantity how many points achieve in milk .

Overall description consists of background of the entire specific requirement. It also gives explanation about actor and function which is used. It gives explanation about architecture diagram and it also gives what we are assumed and dependencies.

2.SYSTEM ANALYSIS

2.1. ANALYSIS MODEL

The model that is basically being followed is the WATER FALL MODEL, which states that the phases are organized in a linear order. First of all the feasibility study is done. Once that part is over the requirement analysis and project planning begins. If system exists one and modification and addition of new module is needed, analysis of present system can be used as basic model.

The design starts after the requirement analysis is complete and the coding begins after the design is complete. Once the programming is completed, the testing is done. In this model the sequence of activities performed in a software development project are: -

- Requirement Analysis
- Project Planning
- System design
- Detail design
- Coding
- Unit testing
- System integration & testing

Here the linear ordering of these activities is critical. End of the phase and the output of one phase is the input of other phase. The output of each phase is to be consistent with the overall requirement of the system. Some of the qualities of spiral model are also incorporated like after the people concerned with the project review completion of each of the phase the work done.

WATER FALL MODEL was being chosen because all requirements were known beforehand and the objective of our software development is the computerization/automation of an already existing manual working system.

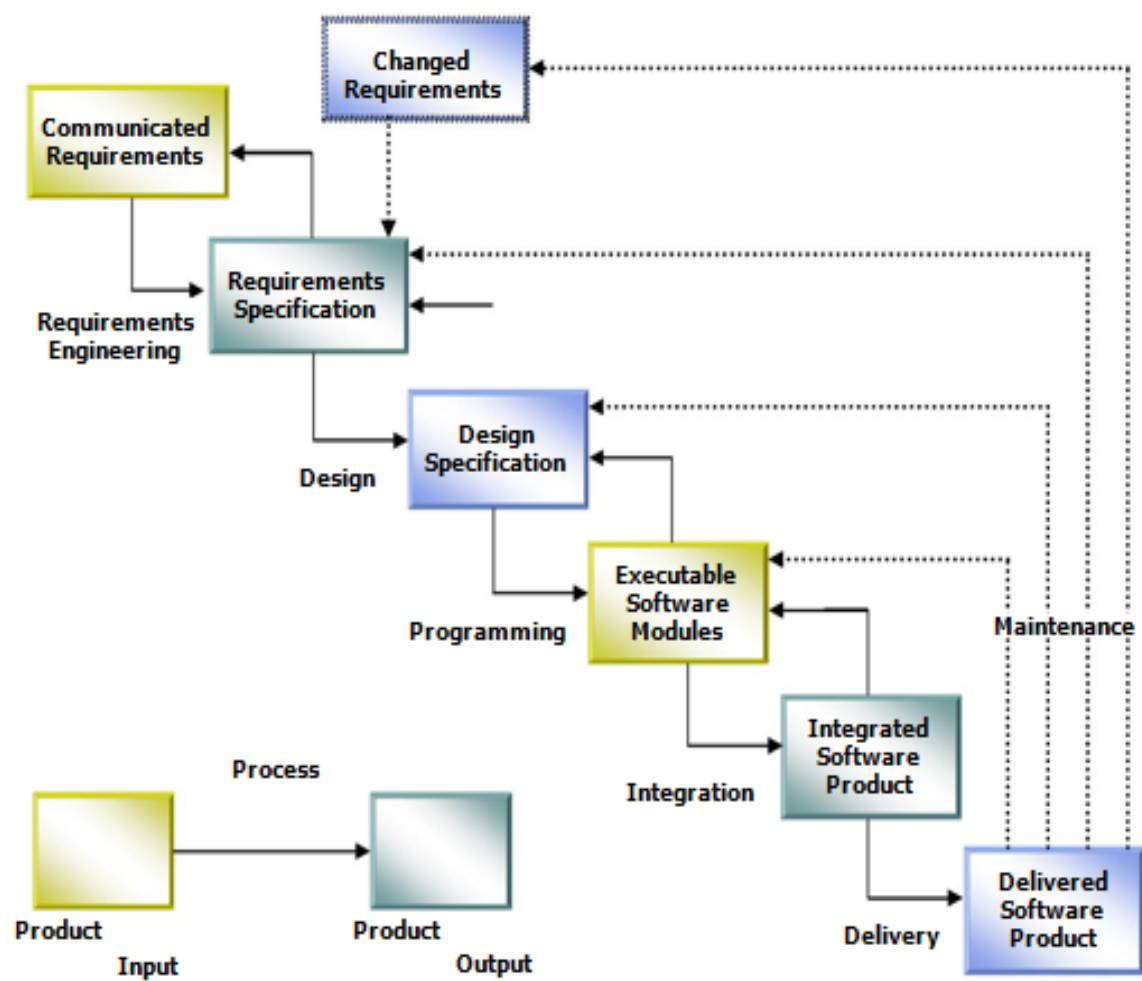


Fig: Water Fall Model

3.STUDY OF THE SYSTEM

3.1.GUI'S

In the flexibility of the uses the interface has been developed a graphics concept in mind, associated through a browses interface. The GUI'S at the top level have been categorized as

1. Administrative user interface
2. The operational or generic user interface

The administrative user interface concentrates on the consistent information that is practically, part of the organizational activities and which needs proper authentication for the data collection. The interfaces help the administrations with all the transactional states like Data insertion, Data deletion and Date updation along with the extensive data search capabilities.

The operational or generic user interface helps the users upon the system in transactions through the existing data and required services. The operational user interface also helps the ordinary users in managing their own information helps the ordinary users in managing their own information in a customized manner as per the assisted flexibilities.

3.2.MODULES

The system after careful analysis has been identified to be presented with the following modules:

Admin :

In this module Admin will add, update and delete user information.

Authentication:

This module contains all the information about the authenticated user. User without his username and password can't enter into the login if he is only the authenticated user then he can enter to his login.

4. SYSTEM DESIGN

4.1.INTRODUCTION

Software design sits at the technical kernel of the software engineering process and is applied regardless of the development paradigm and area of application. Design is the first step in the development phase for any engineered product or system. The designer's goal is to produce a model or representation of an entity that will later be built. Beginning, once system requirement have been specified and analyzed, system design is the first of the three technical activities - design, code and test that is required to build and verify software.

The importance can be stated with a single word "Quality". Design is the place where quality is fostered in software development. Design provides us with representations of software that can assess for quality. Design is the only way that we can accurately translate a customer's view into a finished software product or system. Software design serves as a foundation for all the software engineering steps that follow. Without a strong design we risk building an unstable system – one that will be difficult to test, one whose quality cannot be assessed until the last stage.

During design, progressive refinement of data structure, program structure, and procedural details are developed reviewed and documented. System design can be viewed from either technical or project management perspective. From the technical point of view, design is comprised of four activities – architectural design, data structure design, interface design and procedural design.

4.2.DATA FLOW DIAGRAMS

A data flow diagram is graphical tool used to describe and analyze movement of data through a system. These are the central tool and the basis from which the other components are developed. The transformation of data from input to output, through processed, may be described logically and independently of physical components associated with the system. These are known as the logical data flow diagrams. The physical data flow diagrams show the actual implements and movement of data between people, departments and workstations. A full description of a system actually consists of a set of data flow diagrams. Using two familiar notations Yourdon, Gane and Sarson notation develops the data flow diagrams. Each component in a DFD is labeled with a descriptive name. Process is further identified with a number that will be used for identification purpose. The development of DFD'S is done in several levels. Each process in lower level diagrams can be broken down into a more detailed DFD in the next level. The top-level diagram is often called context diagram. It consists a single process bit, which plays vital role in studying the current system. The process in the context level diagram is exploded into other process at the first level DFD.

The idea behind the explosion of a process into more process is that understanding at one level of detail is exploded into greater detail at the next level. This is done until further explosion is necessary and an adequate amount of detail is described for analyst to understand the process.

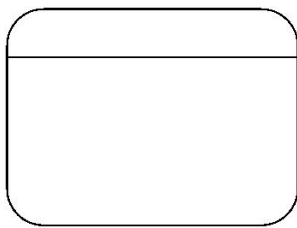
Larry Constantine first developed the DFD as a way of expressing system requirements in a graphical from, this lead to the modular design.

A DFD is also known as a "bubble Chart" has the purpose of clarifying system requirements and identifying major transformations that will become programs in system design. So it is the starting point of the design to the lowest level of detail. A DFD consists of a series of bubbles joined by data flows in the system.

DFD SYMBOLS:

In the DFD, there are four symbols

1. A square defines a source(originator) or destination of system data
2. An arrow identifies data flow. It is the pipeline through which the information flows
3. A circle or a bubble represents a process that transforms incoming data flow into outgoing data flows.
4. An open rectangle is a data store, data at rest or a temporary repository of data.



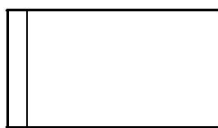
Process that transforms data flow.



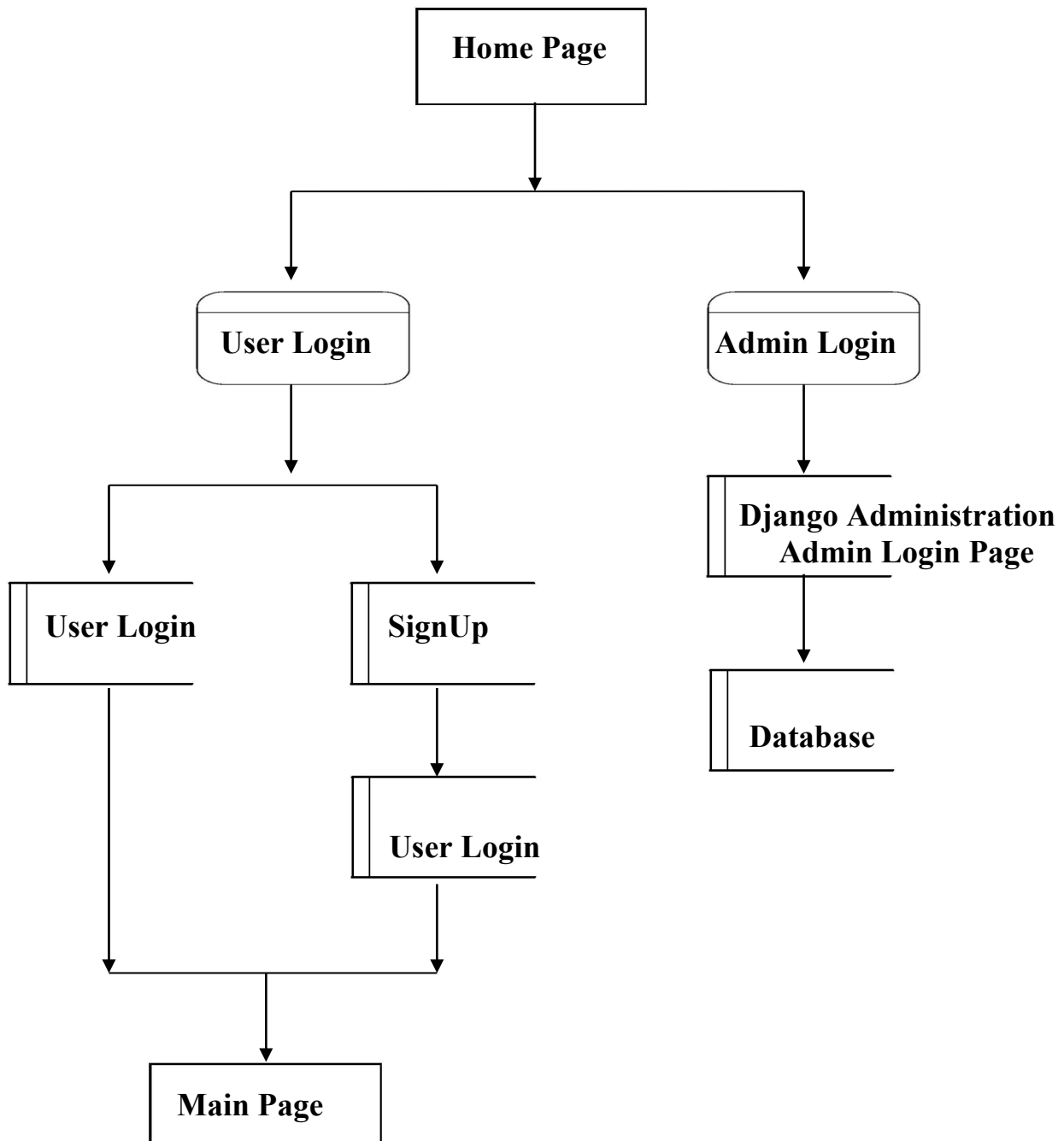
Source or Destination of data

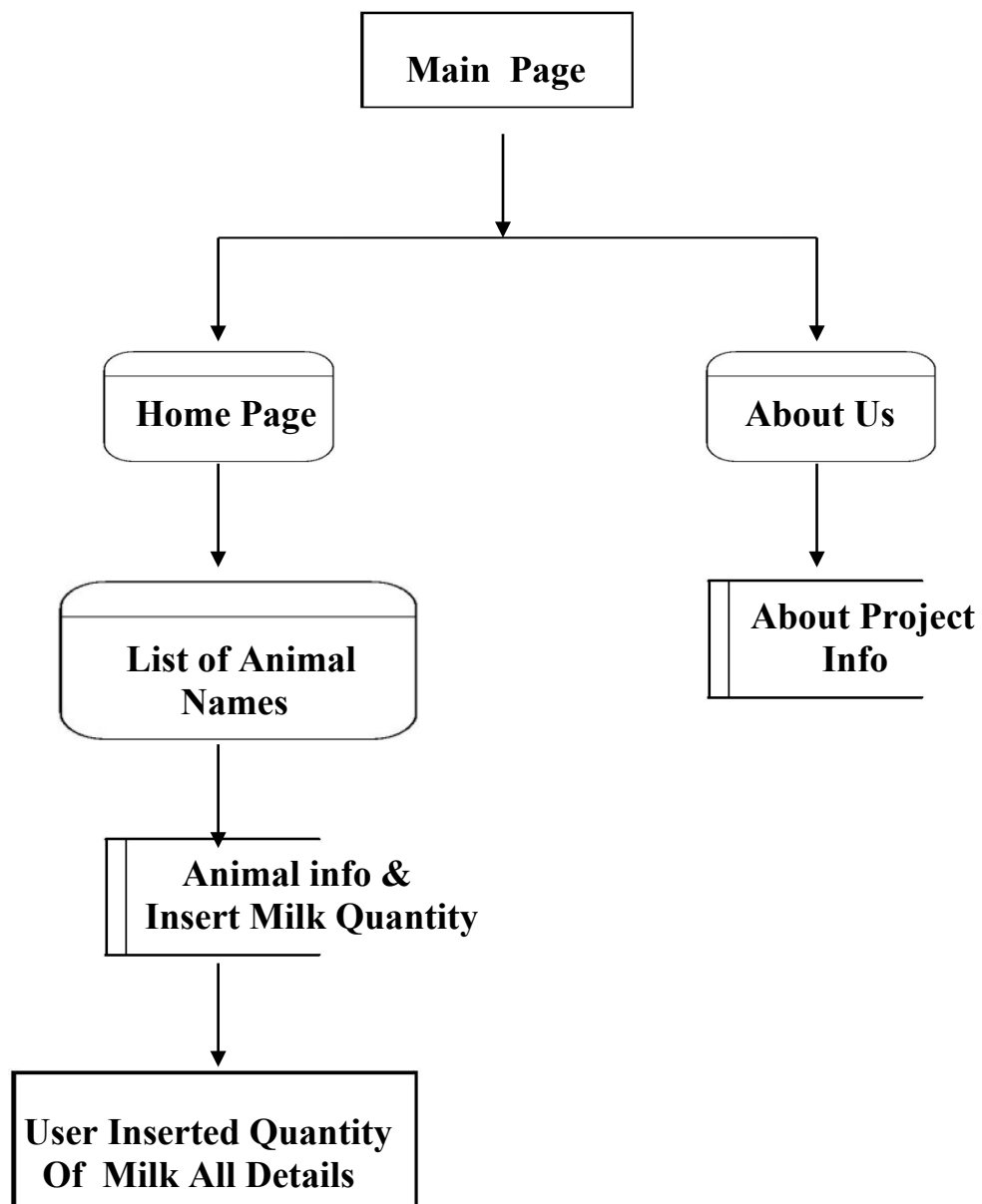


Data flow.



Data Store





5.SYSTEM REQUIREMENT

Hardware:

RAM : minimum 4 GB or more

Processor : minimum intel i3 or more

Disk Space : 1 GB

Softwares :

1) Python3.10

2) Django

6.INSTALLATION

- It must be install Python 3.10 version.
- Python -m pip install --upgrade pip
- pip install Django

7.DATABASE CONNECTION

```
def user_login(request):
    if request.user.is_authenticated:
        return redirect("/")
    else:
        if request.method == "POST":
            username = request.POST['username']
            password = request.POST['password']
            user = authenticate(username=username, password=password)

            if user is not None:
                user1 = Applicant.objects.get(user=user)
                if user1.type == "applicant":
                    login(request, user)
                    return redirect("/cattle")
                else:
                    thank = True
                    return render(request, "login.html", {"thank":thank})
    return render(request, "user_login.html")

def user_homepage(request):
    if not request.user.is_authenticated:
        return redirect('/user_login/')
    applicant = Applicant.objects.get(user=request.user)
    if request.method=="POST":
        email = request.POST['email']
        first_name=request.POST['first_name']
        last_name=request.POST['last_name']
        phone = request.POST['phone']
        gender = request.POST['gender']

        applicant.user.email = email
        applicant.user.first_name = first_name
        applicant.user.last_name = last_name
        applicant.phone = phone
        applicant.gender = gender
        applicant.save()
        applicant.user.save()

        try:
            image = request.FILES['image']
            applicant.image = image
            applicant.save()
        except:
            pass
        alert = True
        return render(request, "user_homepage.html", {'alert':alert})
    return render(request, "user_homepage.html", {'applicant':applicant})

def signup(request):
    if request.method=="POST":
        username = request.POST['email']
        first_name=request.POST['first_name']
        last_name=request.POST['last_name']
        password1 = request.POST['password1']
        password2 = request.POST['password2']
        phone = request.POST['phone']
        gender = request.POST['gender']
        image = request.FILES['image']

        if password1 != password2:
```



```
        messages.error(request, "Passwords do not match.")
        return redirect('/signup')

    user = User.objects.create_user(first_name=first_name,
last_name=last_name, username=username, password=password1)
    applicants = Applicant.objects.create(user=user, phone=phone,
gender=gender, image=image, type="applicant")
    user.save()
    applicants.save()
    return render(request, "signup.html")

def Logout(request):
    logout(request)
    return redirect('/')
```

8.DATABASE OUTPUT

Django administration

WELCOME, AKASH. VIEW SITE / CHANGE PASSWORD / LOG OUT

Home : Authentication and Authorization : Users

✓ The user "vinod@gmail.com" was changed successfully.

Select user to change

ADD USER +

Search

Action: [-----] Go 0 of 7 selected

<input type="checkbox"/>	USERNAME	EMAIL ADDRESS	FIRST NAME	LAST NAME	STAFF STATUS
<input type="checkbox"/>	abc@gmail.com	abc@gmail.com	abc	abc	✓
<input type="checkbox"/>	ambadas@gmail.com	ambadas12@gmail.com	ambadas	vitkar	✓
<input type="checkbox"/>	ankitamisal@gmail.com	ankitamisal@gmail.com	ankita	misal	✓
<input type="checkbox"/>	rutuja1904@gmail.com	rutuja1904@gmail.com	rutuja	darade	✓
<input type="checkbox"/>	shinde.akash9798@gmail.com	shinde.akash9798@gmail.com	akash	shinde	✓
<input type="checkbox"/>	vinod@gmail.com	vinod@gmail.com	vinod	shinde	✓
<input type="checkbox"/>	xyz@gmail.com	xyz@gmail.com	xyz	abc	✓

7 users

FILTER

By staff status

All
Yes
No

By superuser status

All
Yes
No

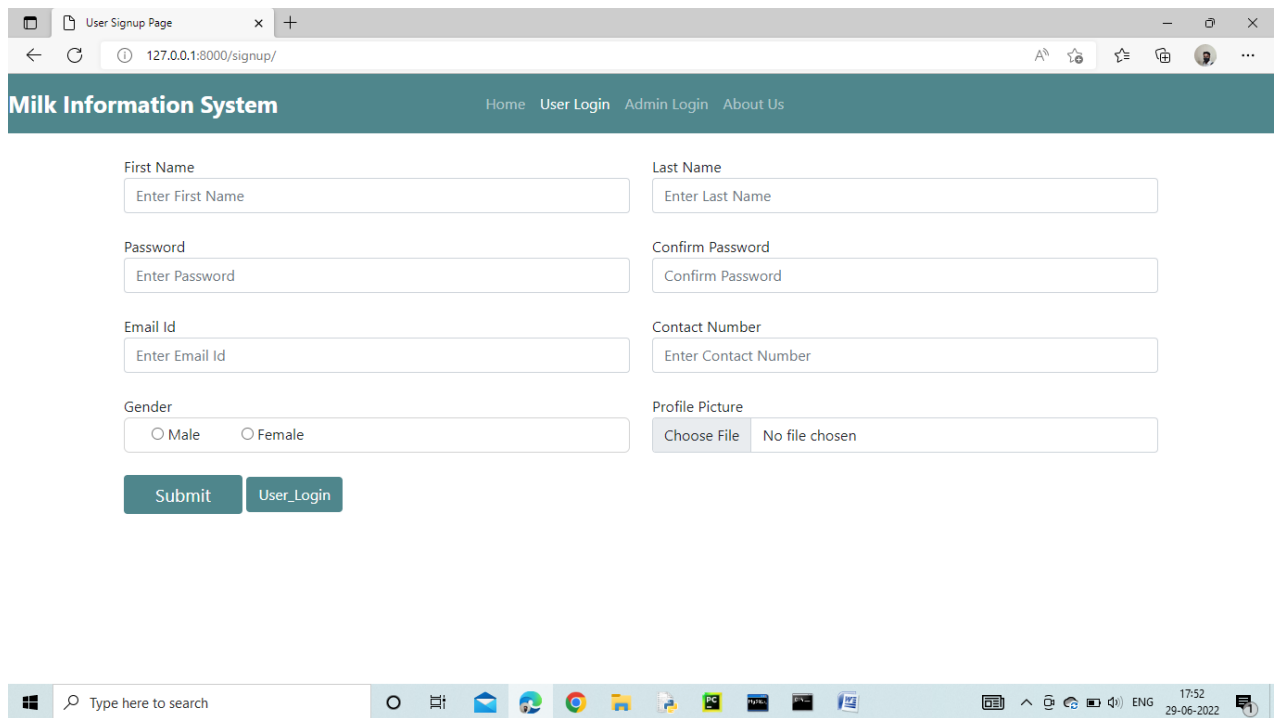
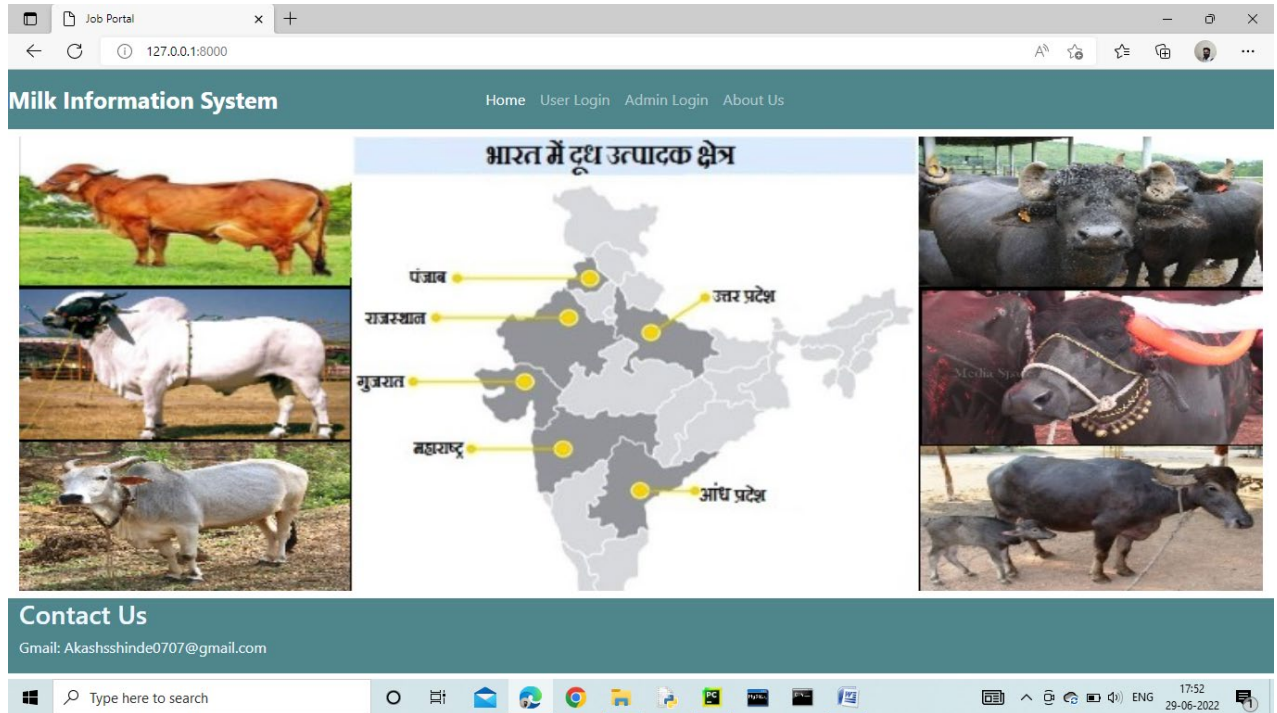
By active

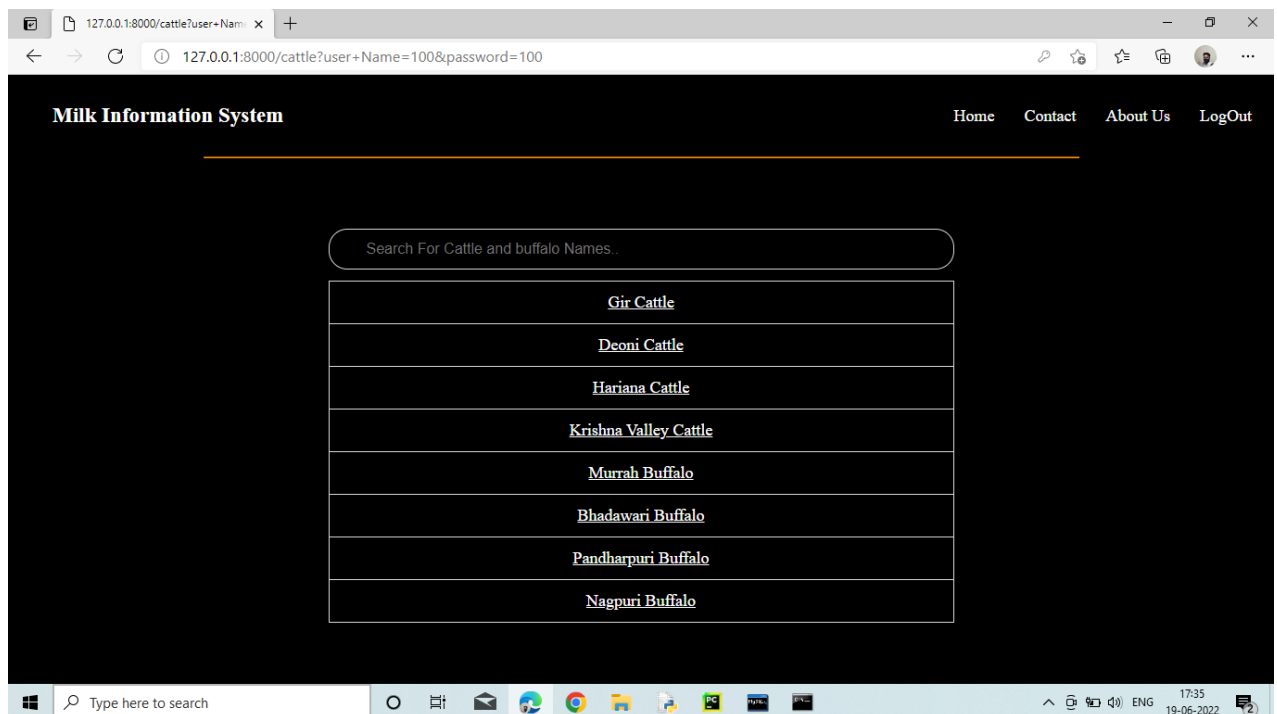
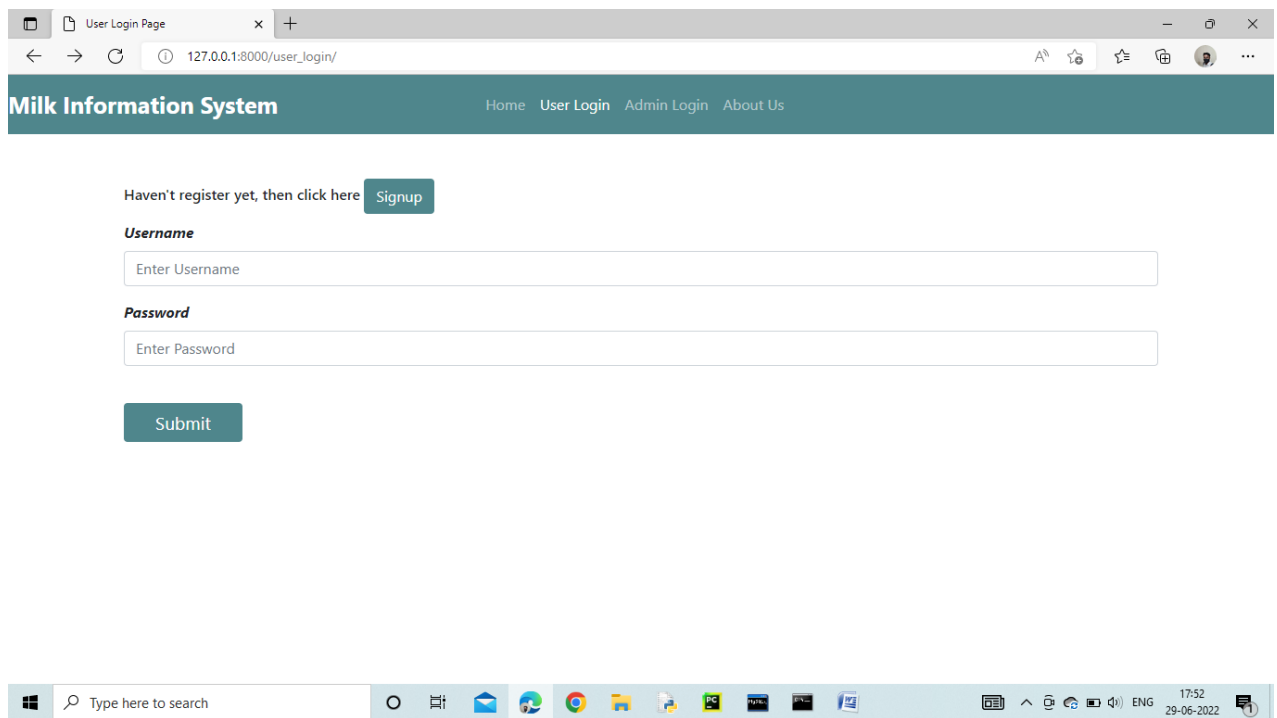
All
Yes
No

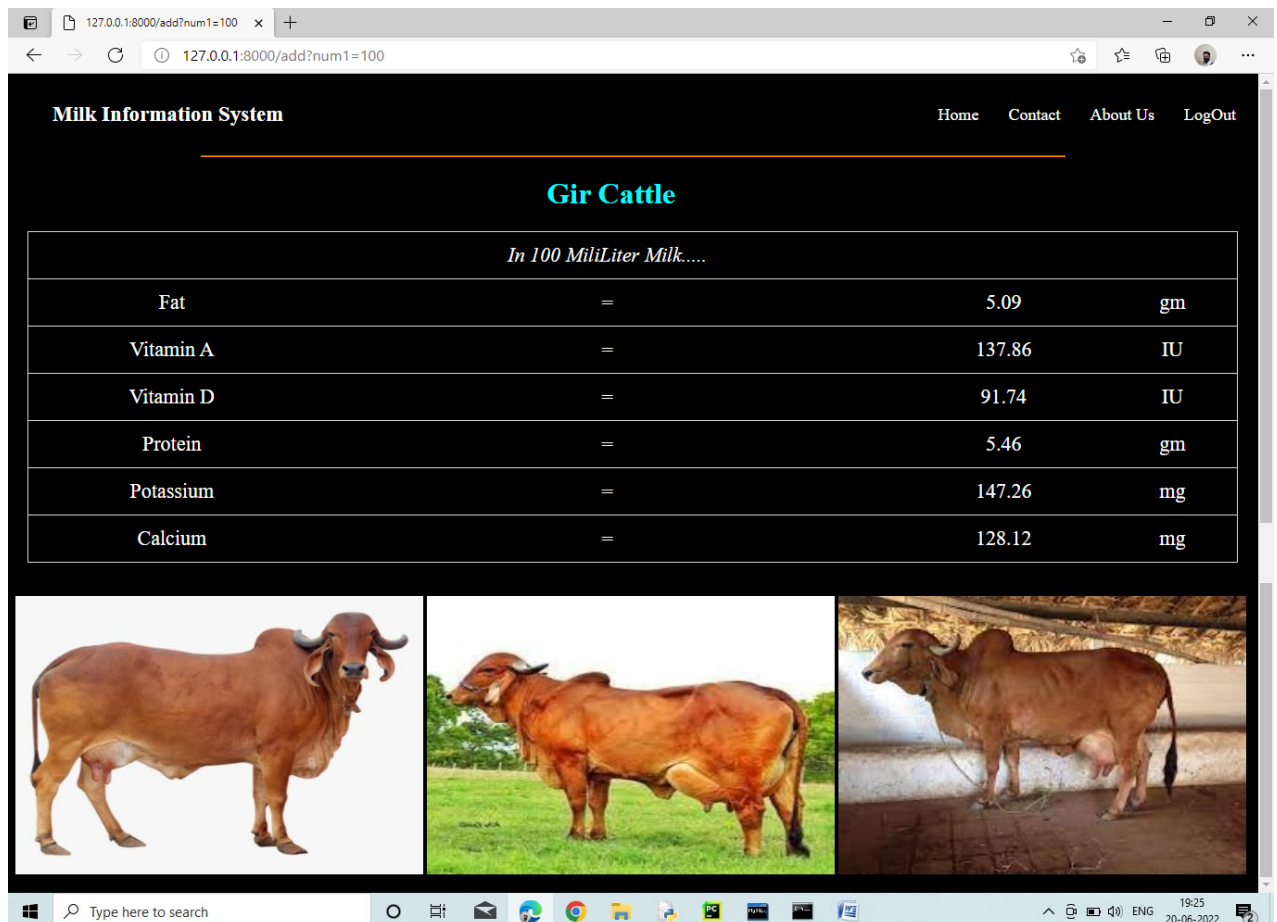
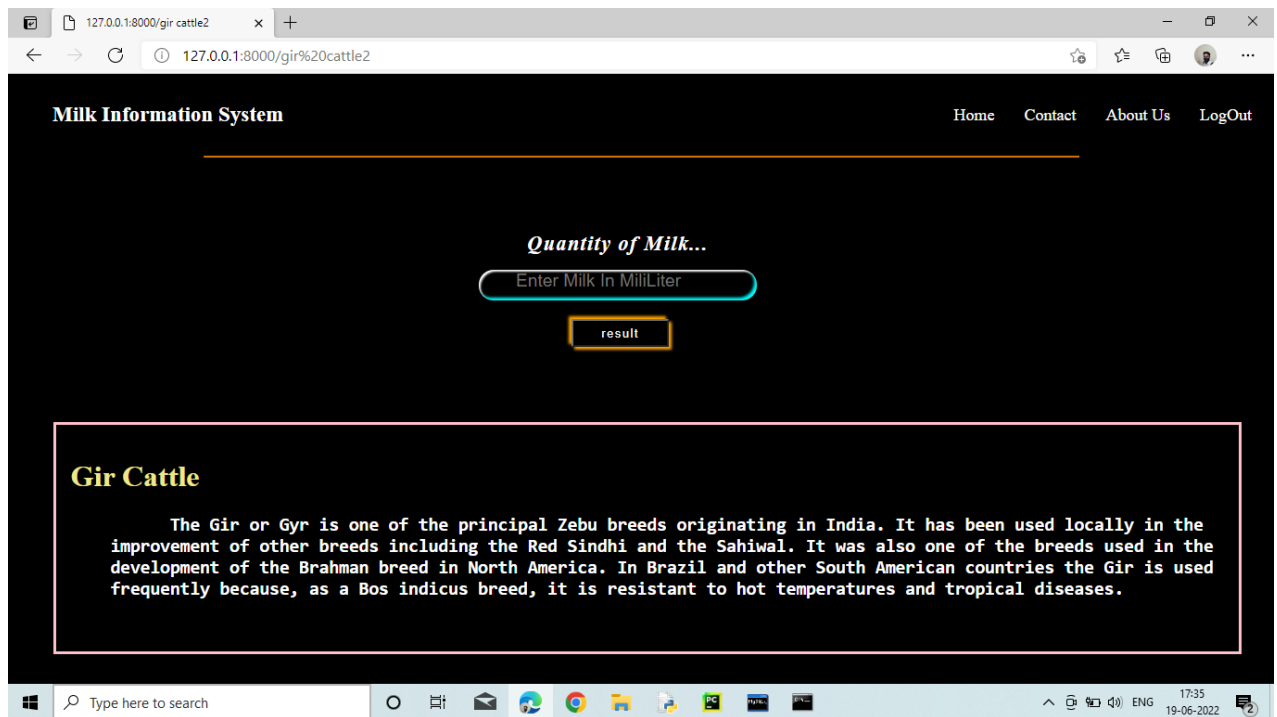
Type here to search

20:08
29-06-2022

9.IMPLEMENTATION







127.0.0.1:8000/deoni

127.0.0.1:8000/deoni

Milk Information System
HomeContactAbout UsLogOut

Quantity of Milk...

Enter Milk In MiliLiter

result

Deoni Cattle

The Deoni is an Indian breed of draught cattle. It is named after the taluk of Deoni in the Latur district of Maharashtra state, and is distributed mainly in the Latur, Nanded, Osmanabad and Parbhani districts of the Marathwada region of Maharashtra, as well as the Bidar district of Karnataka.

Type here to search




127.0.0.1:8000/add1?num1=100

127.0.0.1:8000/add1?num1=100

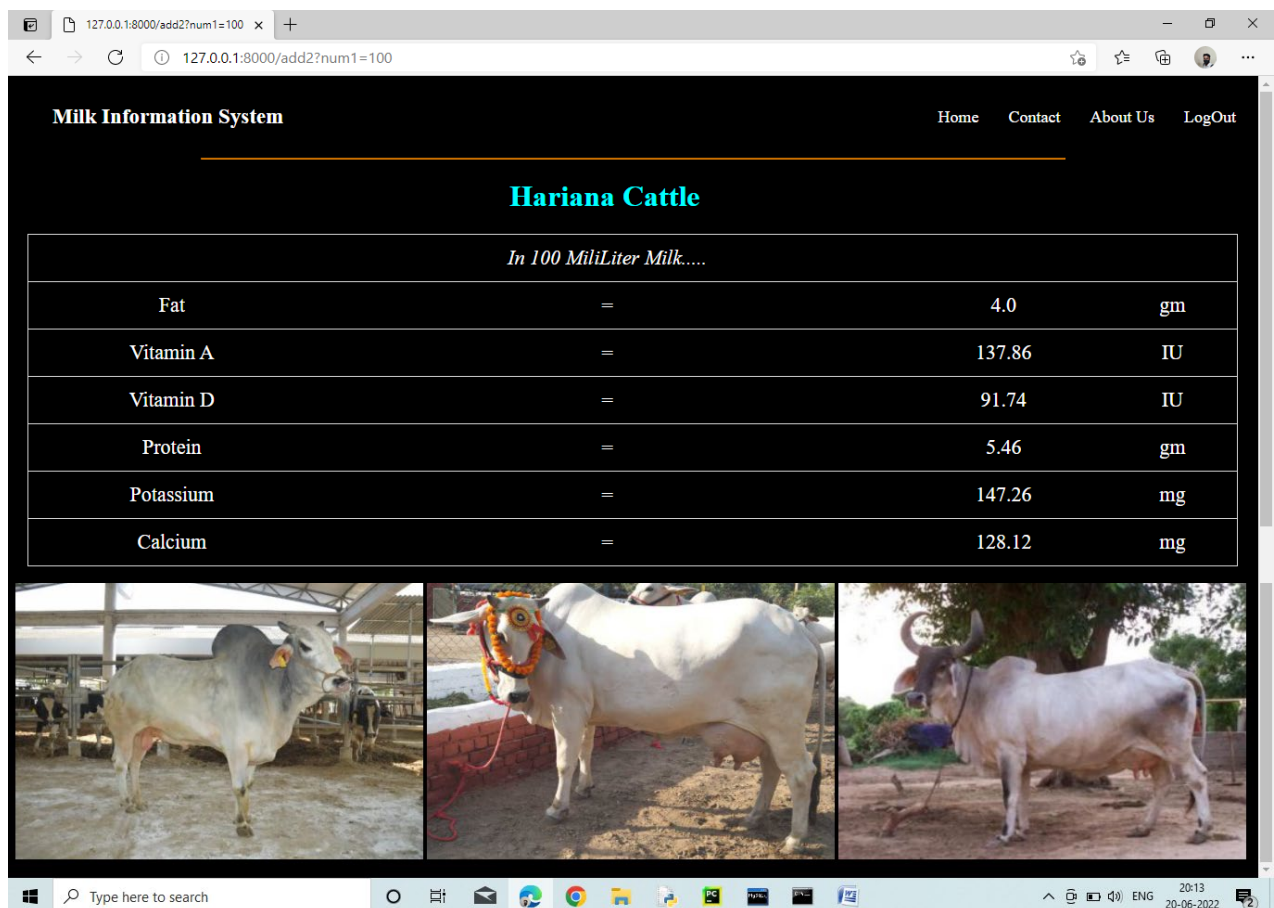
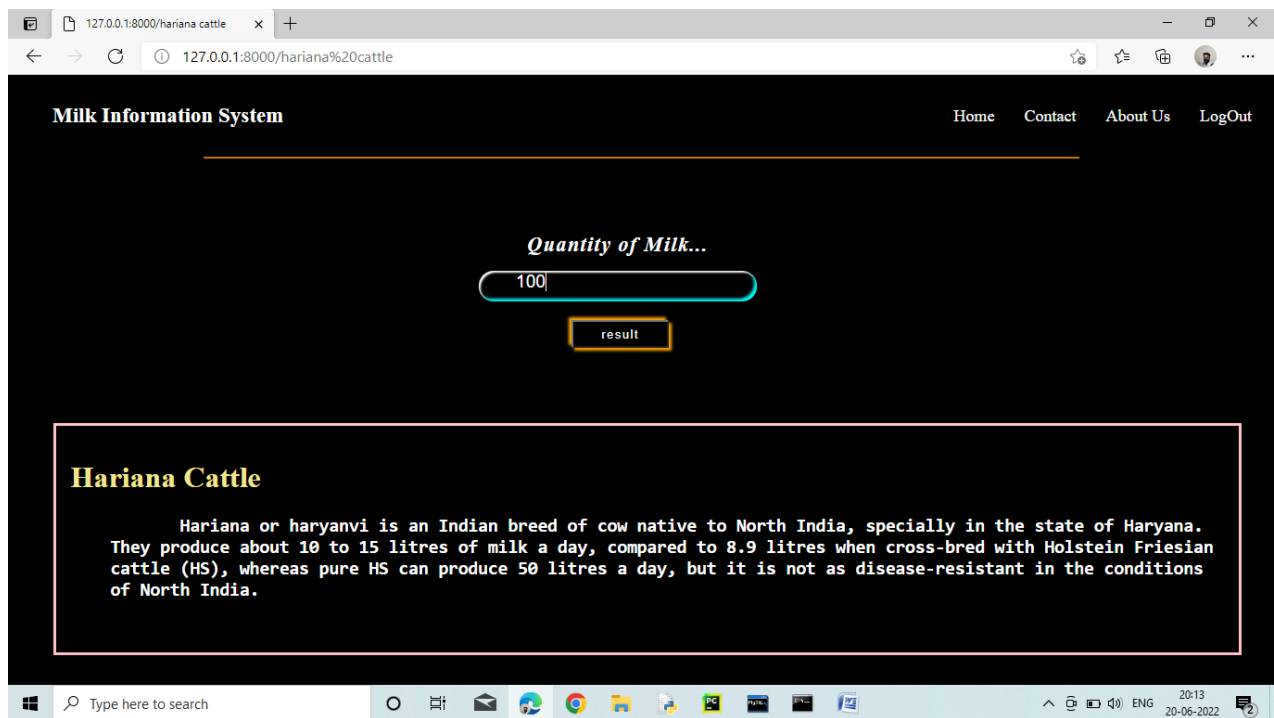
Milk Information System
HomeContactAbout UsLogOut

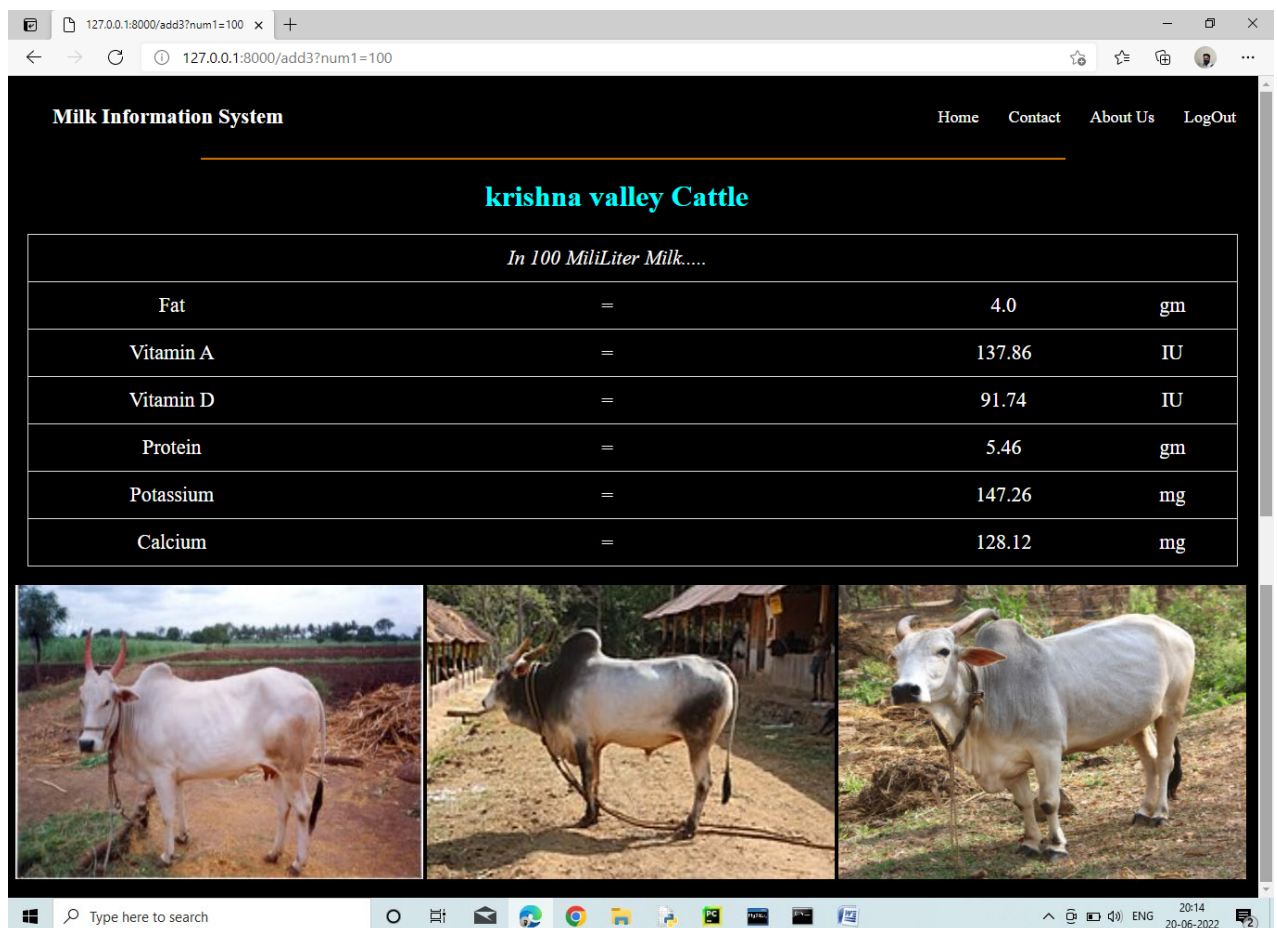
deoni Cattle

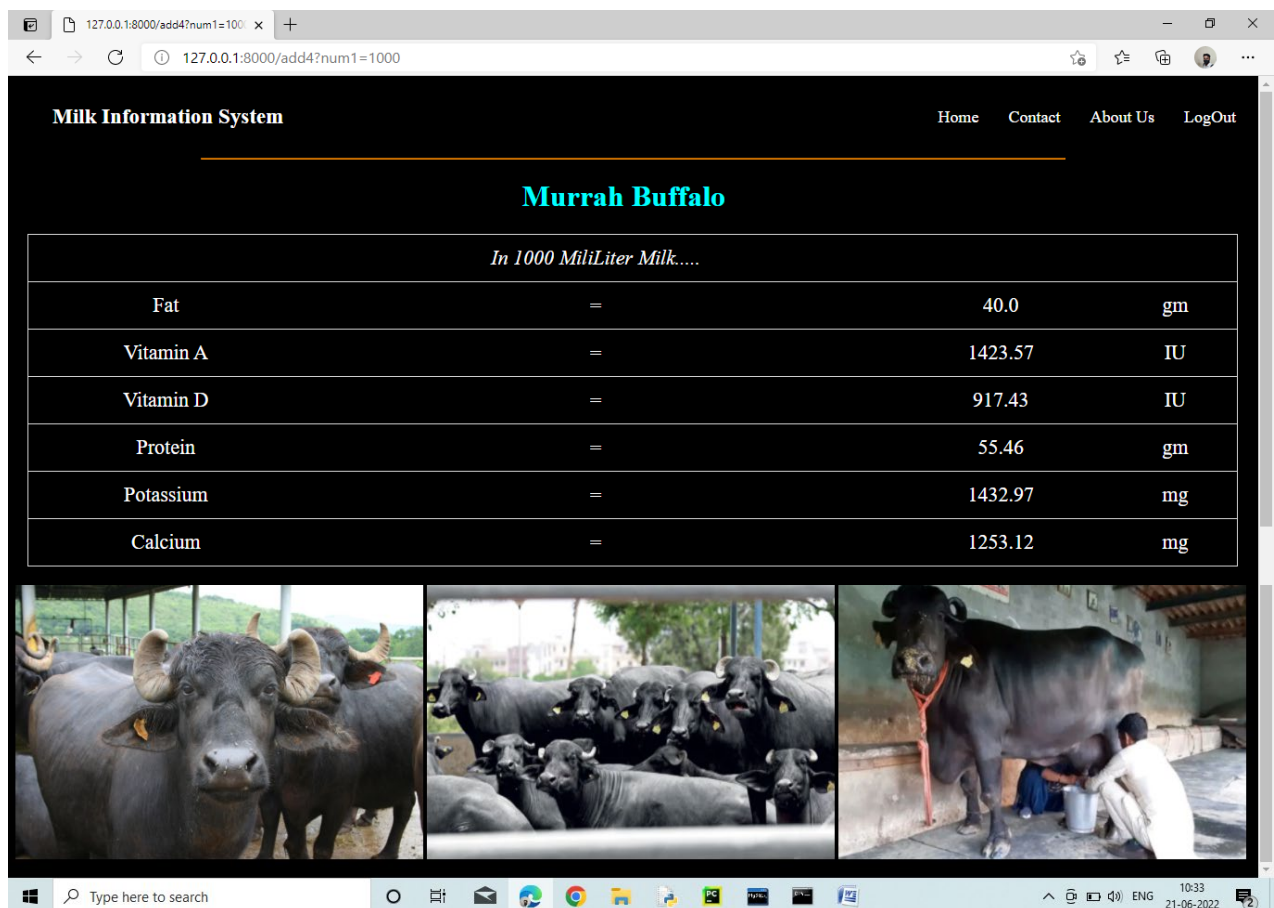
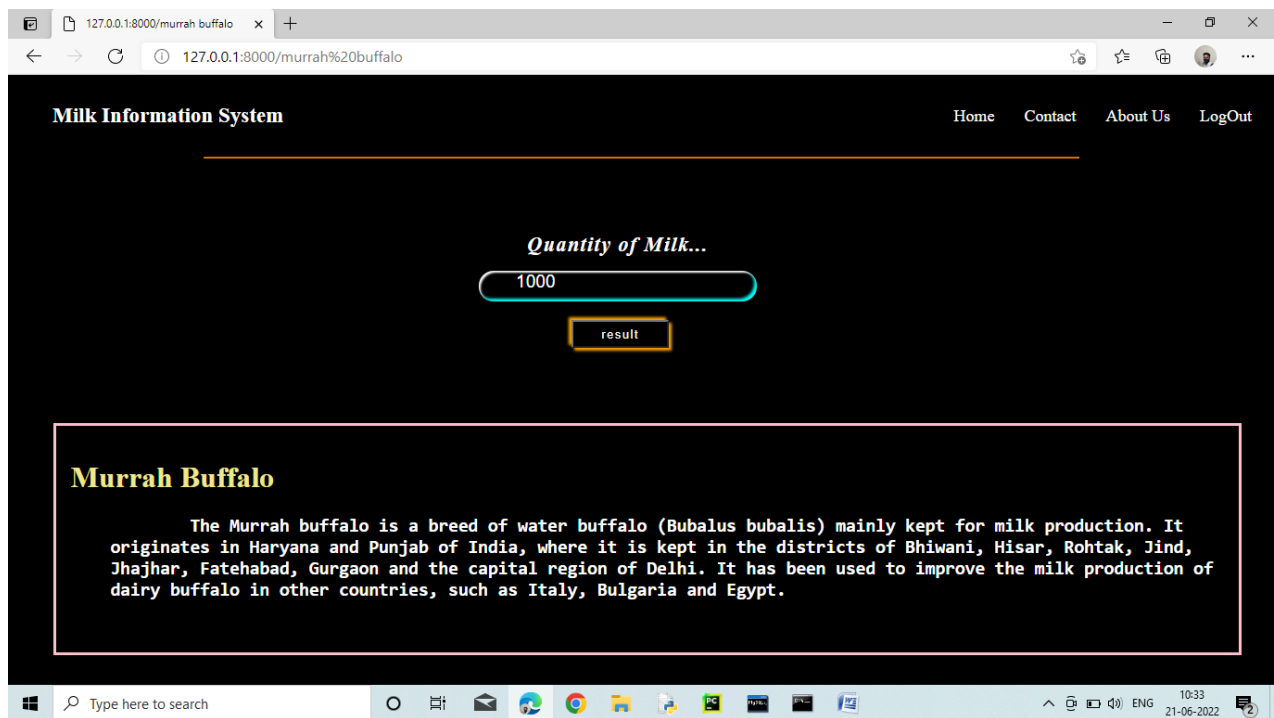
In 100 MiliLiter Milk.....			
Fat	=	4.0	gm
Vitamin A	=	137.86	IU
Vitamin D	=	91.74	IU
Protein	=	5.46	gm
Potassium	=	147.26	mg
Calcium	=	128.12	mg

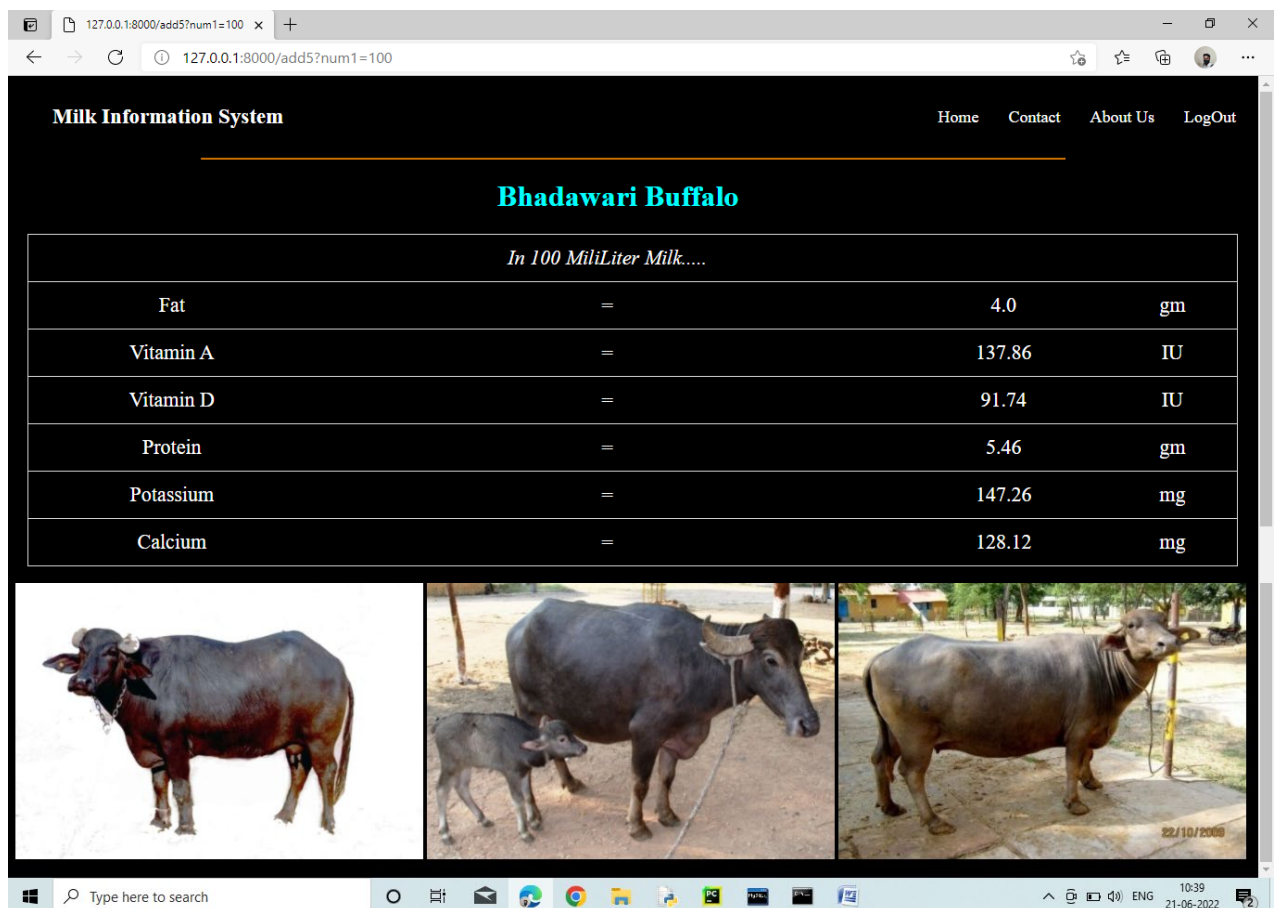
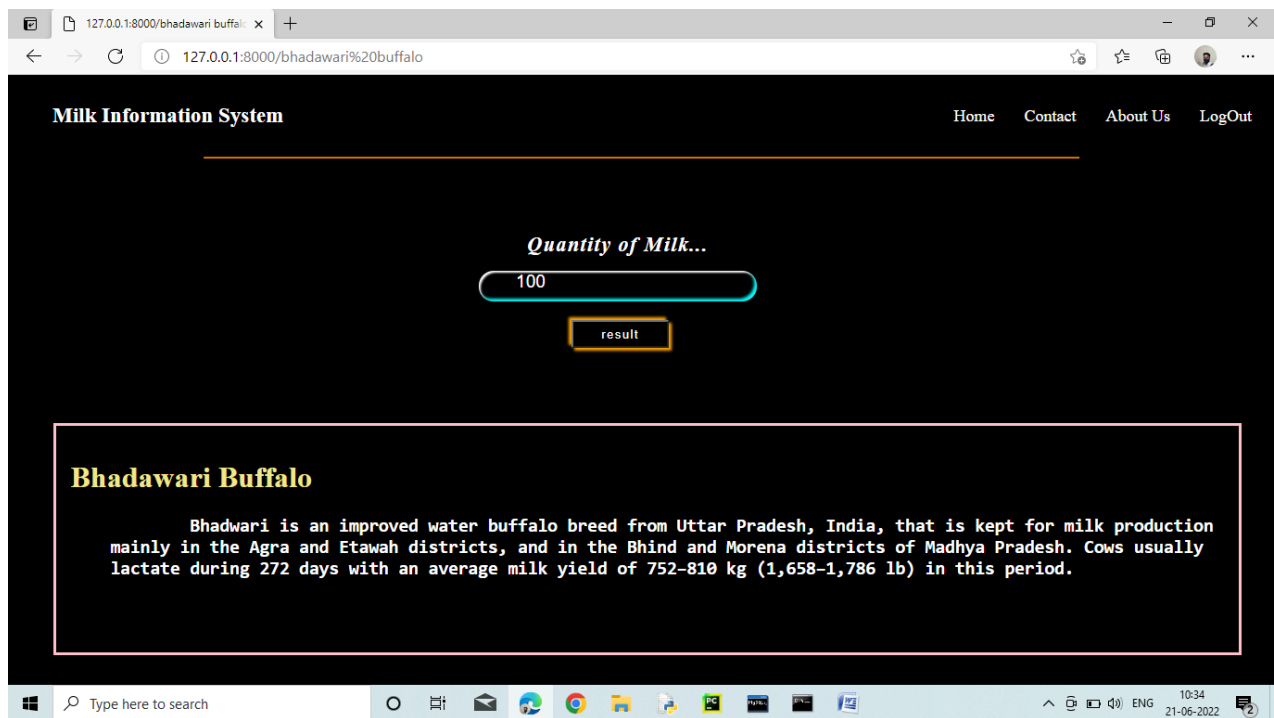




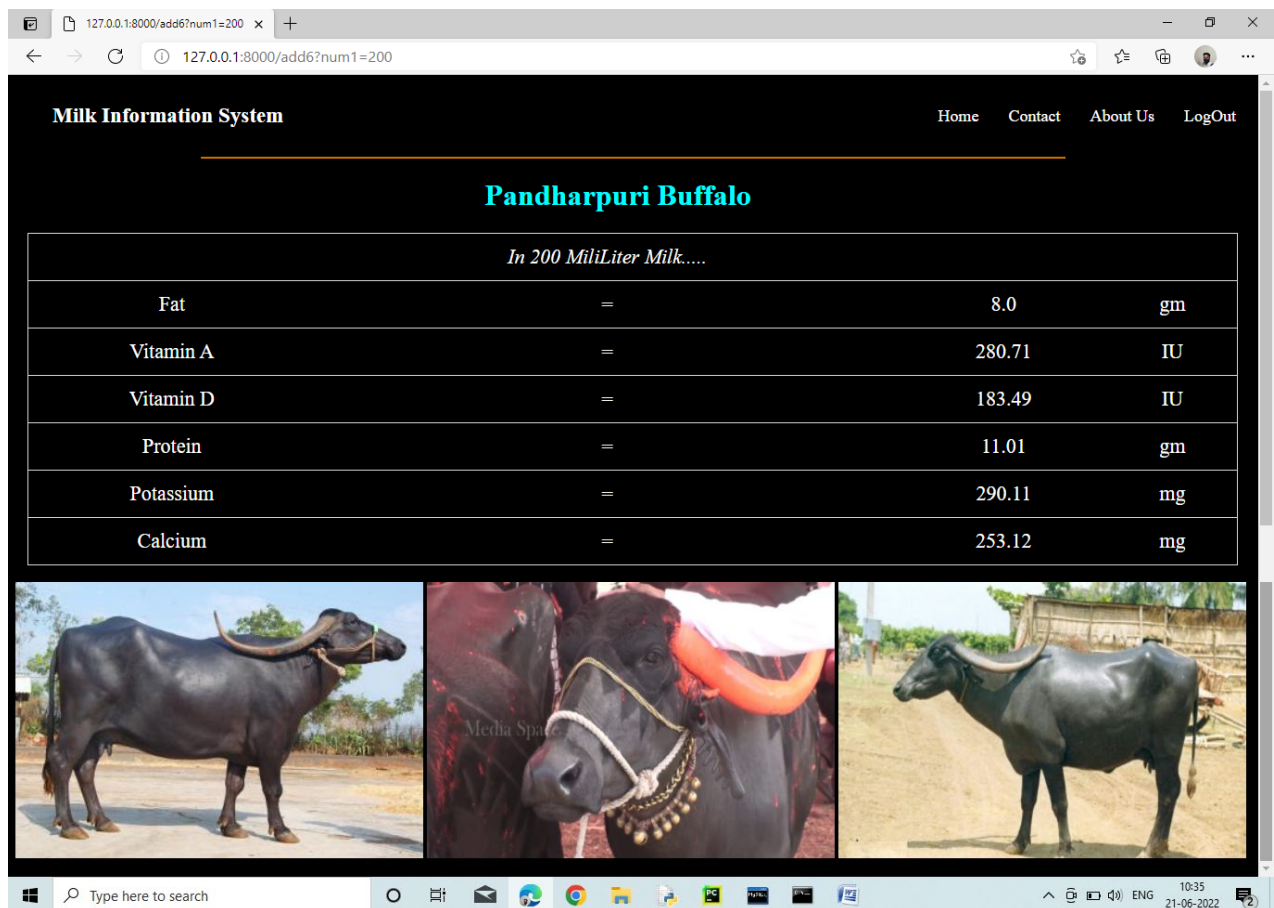
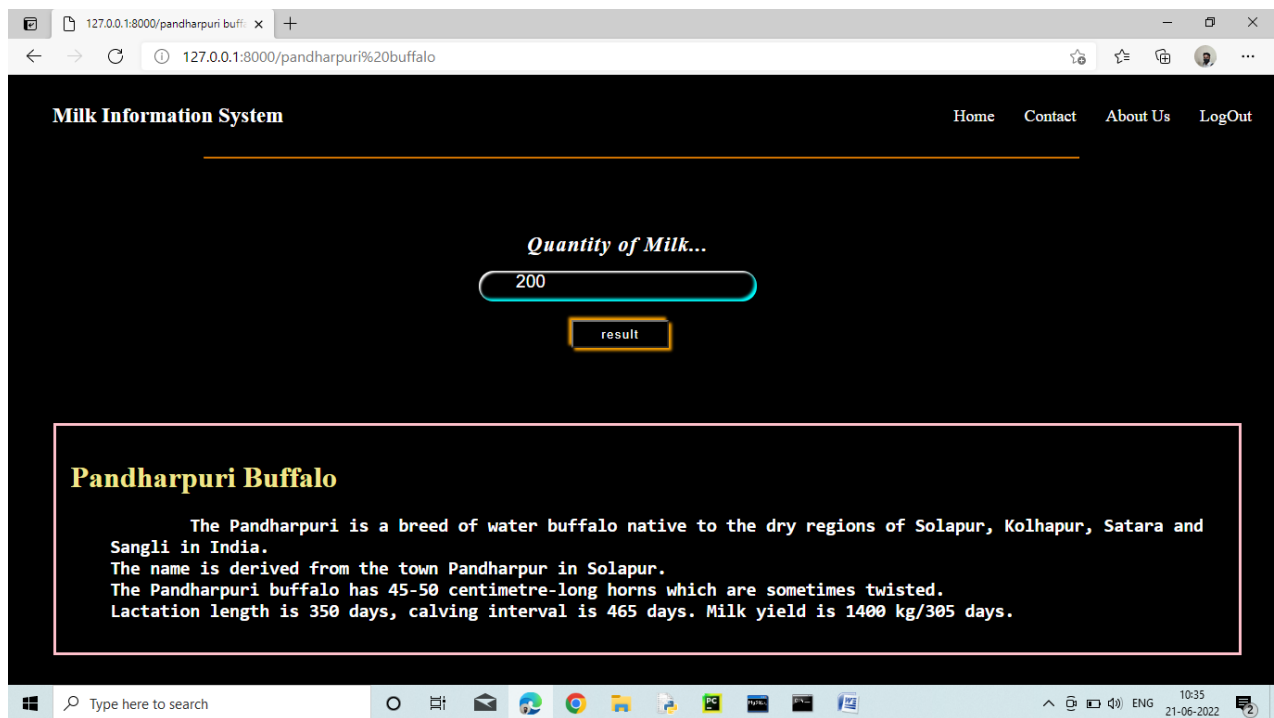
Type here to search











127.0.0.1:8000/nagpuri buffalo

127.0.0.1:8000/nagpuri%20buffalo

Milk Information System
HomeContactAbout UsLogOut

Quantity of Milk...
400
result

Nagpuri Buffalo

The Nagpuri is a breed of water buffalo originating in Maharashtra, India. It stands better amongst the breeds of buffaloes which combine the milk and drought qualities in a better proportion in adverse climatic conditions. It is a River type buffalo. It is a central Indian breed. The breed has many synonyms, such as "Berari", "Gaorani", "Puranthadi", "Varhadi", "Gaolavi", "Arvi", "Gaolaogan", "Gangauri", "Shahi" and "Chanda".

Type here to search
10:35 21-06-2022




127.0.0.1:8000/add7?num1=400

127.0.0.1:8000/add7?num1=400

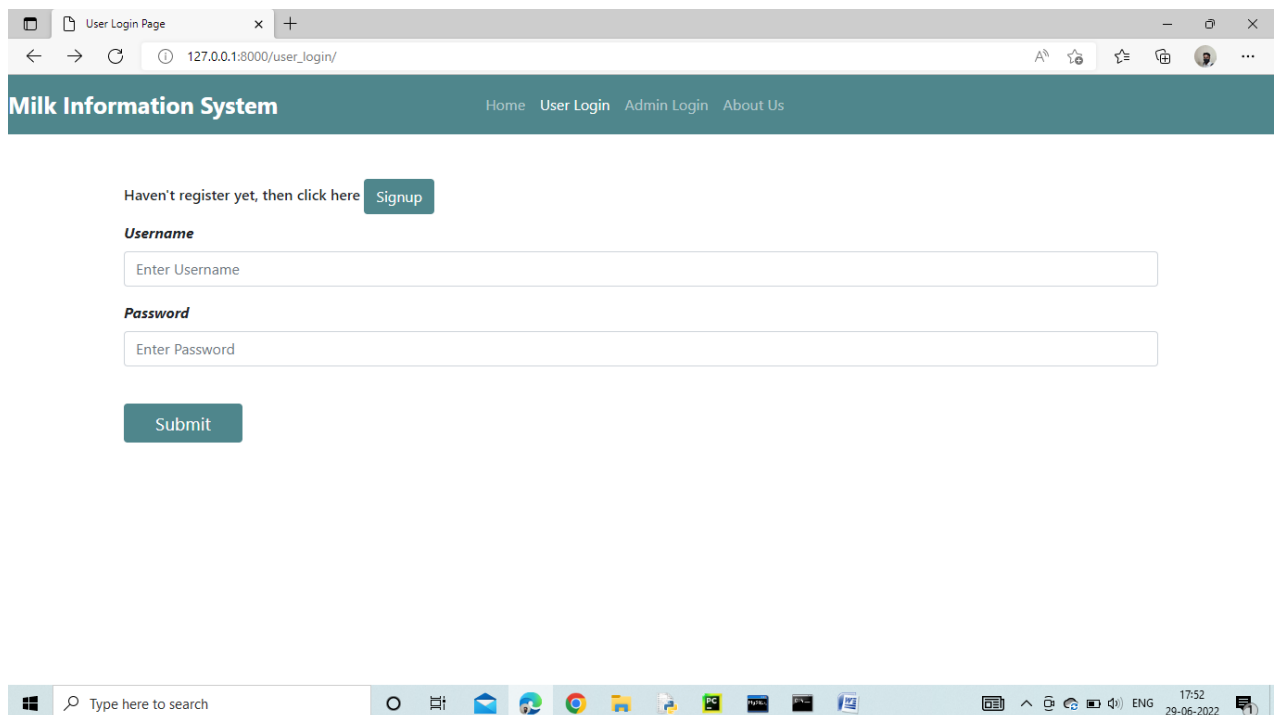
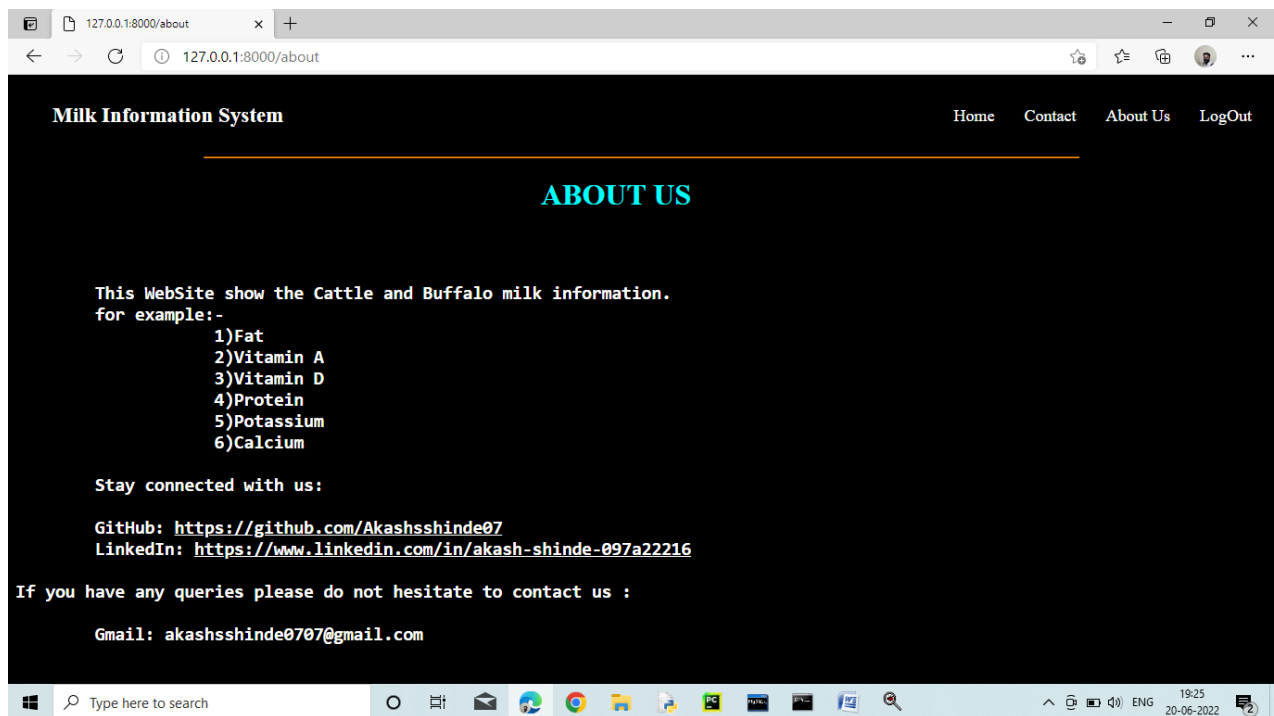
Milk Information System
HomeContactAbout UsLogOut

Nagpuri Buffalo

In 400 MiliLiter Milk.....			
Fat	=	16.0	gm
Vitamin A	=	566.43	IU
Vitamin D	=	366.97	IU
Protein	=	22.12	gm
Potassium	=	575.83	mg
Calcium	=	503.12	mg

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10:35 21-06-2022



10.REFERENCES

[1] Code With Harry

- [Django Course Announcement | Python Django Tutorials In Hindi #0 - YouTube](#)

[2] Telusko

- [#1 Django tutorials | What is Django? | Python Web Framework - YouTube](#)