

**SESSION: 2023-24**

**SUBJECT : INFORMATICS PRACTICES (065)**

**PROJECT TITLE: “Railway Management System”**

**PREPARED by : 1. Shalu Vishwakarma**

**2. Shaurya Pratap Singh**

**3. Shivansh Mishra**

**Class : XII**

**AISSCE Roll no :**

**Submitted to : SHRI S.P. TIWARI SIR**

**CERTIFICATE**

This is to certify that **Shalu Vishwakarma, Shaurya Pratap Singh and Shivansh Mishra** of class XII has successfully completed the project on the topic “**Railway Management System”** in partial fulfilment of the requirement for the Practical Examination of the subject Informatics Practices (065).

The project work reported here is as per the guidelines of CBSE for AISSCE (XII) Practical Examination and it is done under my supervision.

S.P. Tiwari

PGT, Informatics Practices

BVB Prism School, Satna

Madhya Pradesh

# ACKNOWLEDGEMENT

We would like to express a deep sense of thanks & gratitude to our

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We also thanks to our parents for their motivation & support. We must thanks to our class mates for their timely help & support for completion of this project.

**Last but not the least We would like to thanks all those who had helped directly and indirectly towards the completion of this project.**

**SOFTWARE & HARDWARE REQUIREMENT**

**SOFTWARE SPECIFICATION:**

Operating System : Windows 10

Platform : Python IDLE 3.7

Language : Python

**HARDWARE SPECIFICATION:**

Processor : i3 & Above

Hard Disk : 500 GB or More

RAM : 4 GB or More

**BRIEF OVERVIEW**

Railway Management System is developed using python. While using this customers for IRCTC can easily book,access and edit train journeys in a very hassle free manner.

All you have to do is to just fill the questions asked by the computer like Name, No of Passengers, class preffered for travelling etc. The program will display final fare based on the trip details and also update it into the Railway database ( made using MYSQL).

There is no error and warning content in this project. This design is so simple that user won’t find it difficult to use and navigate

**Project On “RAILWAY RESERVATION SYSTEM”**

**DBMS: MySQL**

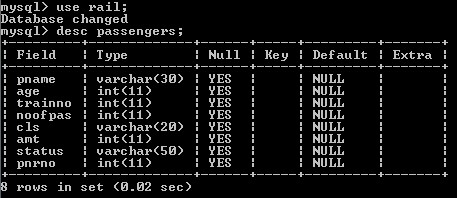
**Host : localhost**

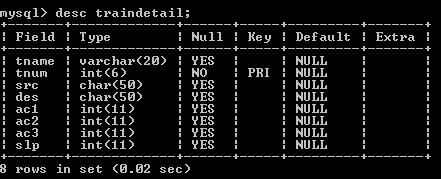
**User: root**

**Password: cement**

**DataBase: RAIL**

**Table Structure: (Images Bellow)**





**PYTHON CODE:**

import mysql.connector

mydb=mysql.connector.connect(host="localhost",user="root",passwd="cement13",database="rail",auth\_plugin='mysql\_native\_password');

mycursor=mydb.cursor()

def railresmenu():

print("--------------------------------------------------------\nRailway Reservation\n--------------------------------------------------------")

print("1.Train Detail")

print("2.Reservation of Ticket")

print("3.Cancellation of Ticket")

print("4.Display PNR status")

print("5.Passengers Detail")

print("6.Quit")

def traindetail():

print("--------------------------------------------------------\nTrain Details\n--------------------------------------------------------")

ch='y'

while (ch=='y'):

l=[]

name=input("enter train name :")

l.append(name)

tnum=int(input("enter train number :"))

l.append(tnum)

ac1=int(input("enter number of AC 1 class seats :"))

l.append(ac1)

ac2=int(input("enter number of AC 2 class seats :"))

l.append(ac2)

ac3=int(input("enter number of AC 3 class seats :"))

l.append(ac3)

slp=int(input("enter number of sleeper class seats :"))

l.append(slp)

train=(l)

sql="insert into traindetail(tname,tnum,ac1,ac2,ac3,slp)values(%s,%s,%s,%s,%s,%s)"

mycursor.execute(sql,train)

mydb.commit()

print("insertion completed")

print("Do you want to insert more train Detail")

ch=input("enter yes/no")

print('\n')

print("===================================================================")

railresmenu()

def reservation():

print('--------------------------------------------------------\nWELCOME\nto\nTRAIN RESERVATION SYSTEM\n--------------------------------------------------------')

pnr=1024

l1=[]

pname=input("enter passenger name=")

l1.append(pname)

age=input("enter age of passenger =")

l1.append(age)

trainno=input("enter train number")

l1.append(trainno)

np=int(input("Enter number of passanger:"))

l1.append(np)

print("select a class you would like to travel in")

print("1.AC FIRST CLASS")

print("2.AC SECOND CLASS")

print("3.AC THIRD CLASS")

print("4.SLEEPER CLASS")

cp=int(input("Enter your choice:"))

if(cp==1):

amount=np\*1000

cls='ac1'

elif(cp==2):

amount=np\*800

cls='ac2'

elif(cp==3):

amount=np\*500

cls='ac3'

else:

amount=np\*350

cls='slp'

l1.append(cls)

print("Total amount to be paid:",amount)

l1.append(amount)

pnr=pnr+1

print("PNR Number:",pnr)

print("status: confirmed")

sts='conf'

l1.append(sts)

l1.append(pnr)

train1=(l1)

sql="insert into passengers(pname,age,trainno,noofpas,cls,amt,status,pnrno)values(%s,%s,%s,%s,%s,%s,%s,%s)"

mycursor.execute(sql,train1)

mydb.commit()

print("insertion completed")

print("Go back to menu")

print('\n')

print("===================================================================")

railresmenu()

def cancel():

print("--------------------------------------------------------\nTicket cancel window\n--------------------------------------------------------")

pnr=input("enter PNR for cancellation of Ticket")

pn=(pnr,)

sql="update passengers set status='ticket cancelled' where pnrno=%s"

mycursor.execute(sql,pn)

mydb.commit()

print("Deletion completed")

print("Go back to menu")

print("===================================================================")

railresmenu()

def displayPNR():

print("--------------------------------------------------------\nPNR Status window\n--------------------------------------------------------")

pnr=input("enter PNR NUMBER")

pn=(pnr,)

sql="select \* from passengers where pnrno=%s"

mycursor.execute(sql,pn)

res=mycursor.fetchall()

print("PNR STATUS are as follows : ")

print("(pname,age,trainno, noofpas,cls,amt,status, pnrno)")

for x in res:

print(x)

print("Go back to menu")

print('\n') print("===================================================================")

railresmenu()

def psgdetail():

print("--------------------------------------------------------\nPassengers Detail Window\n--------------------------------------------------------")

mycursor.execute('select \* from passengers')

for i in mycursor:

print(i)

print("Go back to menu")

print('\n')

print("===================================================================")

railresmenu()

railresmenu()

n=int(input("enter your choice :"))

if(n==1):

traindetail()

elif(n==2):

reservation()

elif(n==3):

cancel()

elif(n==4):

displayPNR()

elif(n==5):

psgdetail()

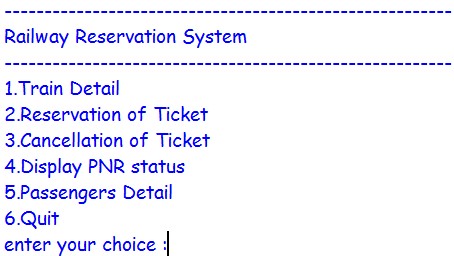
elif(n==6):

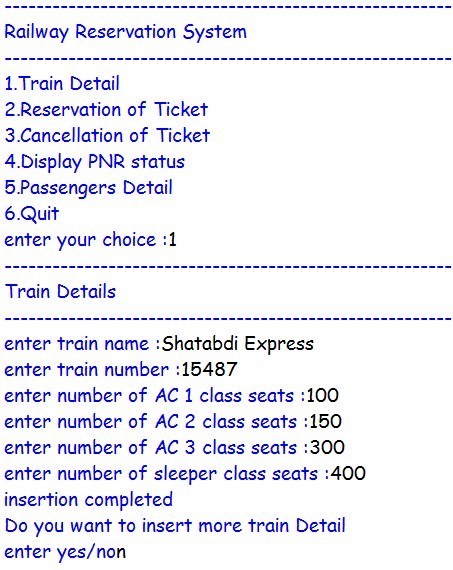
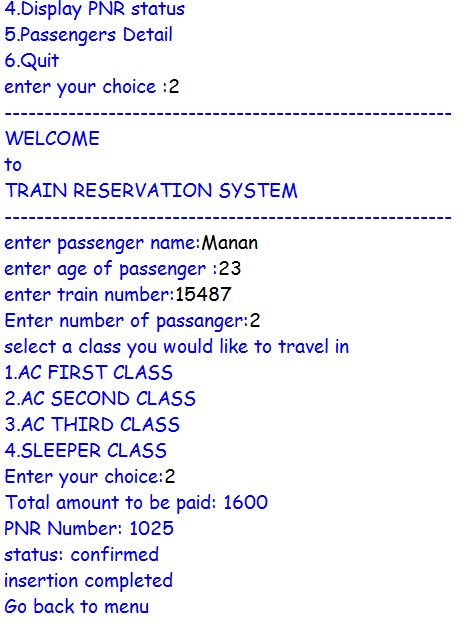
exit(0)

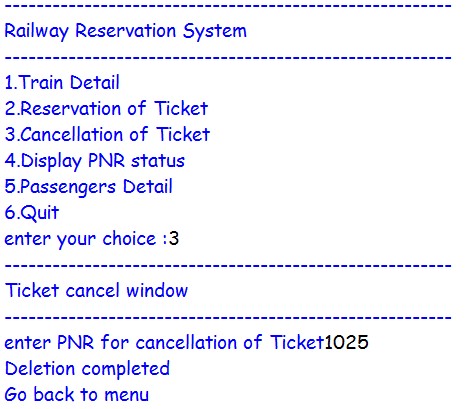
else:

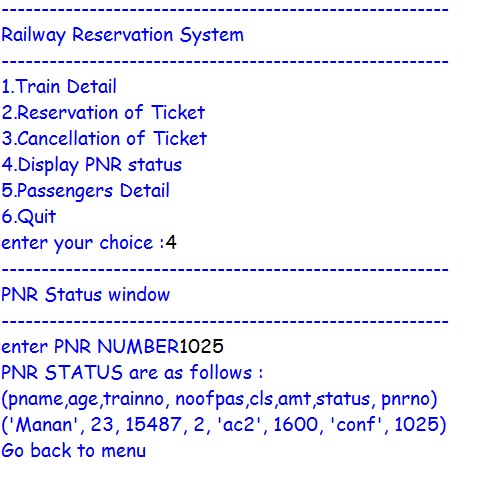
print("\_\_\_\_\_\_\_\_wrong choice\_\_\_\_\_\_\_\_")

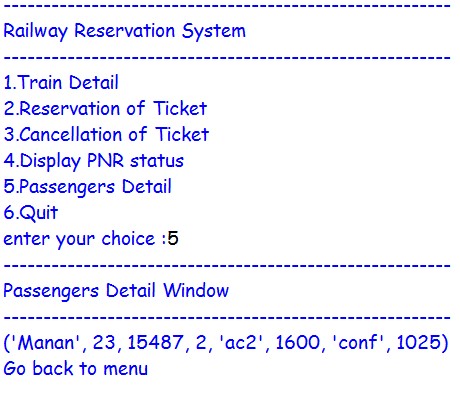
**OUTPUT SCREEN:**



* **Choice 1 - Train detail window**
* **Choice 2- Reservation window**

* **Choice 3 - Cancellation of ticket window**
* **Choice 4- Display PNR status window**



**Choice 5- passengers details**

## BIBLIOGRAPHY

1. Sumita Alora (Python)
2. www.python.com
3. pythontrends.wordpress.com