

```
// Student.java
package Assign3;

public class Student {
    private int prn;
    private String name;
    private String dob;
    private float marks;

    Student(int prn, String name, String dob, float marks) {
        this.prn = prn;
        this.name = name;
        this.dob = dob;
        this.marks = marks;
    }

    public void setPrn(int prn) {
        this.prn = prn;
    }

    public int getPrn() {
        return prn;
    }

    public void setName(String name) {
        this.name = name;
    }

    public String getName() {
        return name;
    }

    public void setDob(String dob) {
        this.dob = dob;
    }

    public String getDob() {
        return dob;
    }

    public void setMarks(float marks) {
        this.marks = marks;
    }

    public float getMarks() {
        return marks;
    }
}
```

//UserInput.java

```
package Assign3;

import java.util.ArrayList;
import java.util.Scanner;

public class UserInput {
    ArrayList<Student> student = new ArrayList<Student>();
    public void addStudent() {
        Scanner sc = new Scanner(System.in);
        System.out.println("Enter number of students: ");
        int n = sc.nextInt();
        sc.nextLine();
        for (int i = 0; i < n; i++) {
            System.out.println("Enter details of student " + (i + 1) + ": ");
            String input = sc.nextLine();
            String[] details = input.split(" ");
            if (details.length >= 4) {
                int prn = Integer.parseInt(details[0]);
                String name = details[1];
                String dob = details[2];
                float marks = Float.parseFloat(details[3]);

                Student s = new Student(prn, name, dob, marks);
                student.add(s);
            } else {
                System.out.println("Invalid input format. Please enter details in the format: PRN Name DOB Marks");
                i--;
            }
        }
    }

    public void display(){
        for(int i = 0; i < student.size(); i++){
            System.out.println(student.get(i).getPrn() + " " +
student.get(i).getName() + " " + student.get(i).getDob() + " " +
student.get(i).getMarks());
        }
    }
}
```

```
//Main.java
package Assign3;

import java.util.Scanner;

public class Main {
    public static void main(String[] args) {
        Scanner sc = new Scanner(System.in);
        UserInput user = new UserInput();
        while (true) {
            System.out.println("Menu:");
            System.out.println("1. Add Student");
            System.out.println("2. Display Students");
            System.out.println("3. Search by PRN");
            System.out.println("4. Search by Name");
            System.out.println("5. Update Student Details");
            System.out.println("6. Delete Student");
            System.out.println("7. Exit");
            System.out.print("Enter your choice: ");
            int choice = sc.nextInt();

            switch (choice) {
                case 1:
                    user.addStudent();
                    break;
                case 2:
                    System.out.println("Student Details:");
                    user.display();
                    break;
                case 7:
                    System.out.println("Exiting program. Goodbye!");
                    System.exit(0);

                default:
                    System.out.println("Invalid choice. Please try again.");
            }
        }
    }
}
```

Output:

```
Enter details of student 1:
117 suyash 10-02-04 80
Enter details of student 2:
109 arun 10-03-04 87
Menu:
1. Add Student
2. Display Students
3. Search by PRN
4. Search by Name
5. Update Student Details
6. Delete Student
7. Exit
Enter your choice: 2
Student Details:
117 suyash 10-02-04 80.0
109 arun 10-03-04 87.0
Menu:
1. Add Student
2. Display Students
3. Search by PRN
4. Search by Name
5. Update Student Details
6. Delete Student
7. Exit
```

Github link: <https://github.com/suyashtambe/PIJ>