Subject code:CSA1002
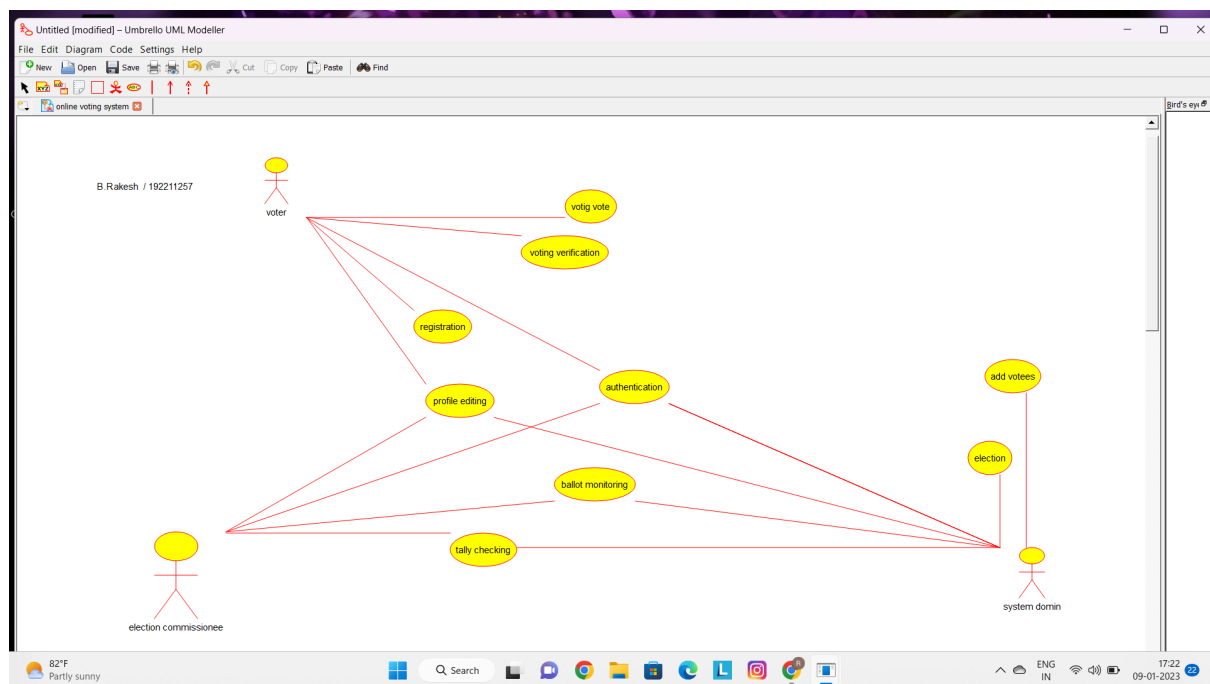**Subject:**software engineering with data analytics
Name:B.Rakesh
Register no:192211257

1. Draw a USE-CASE diagram for Online Voting System using CASE tools.
Aim: To draw a case diagram for an online voting system.
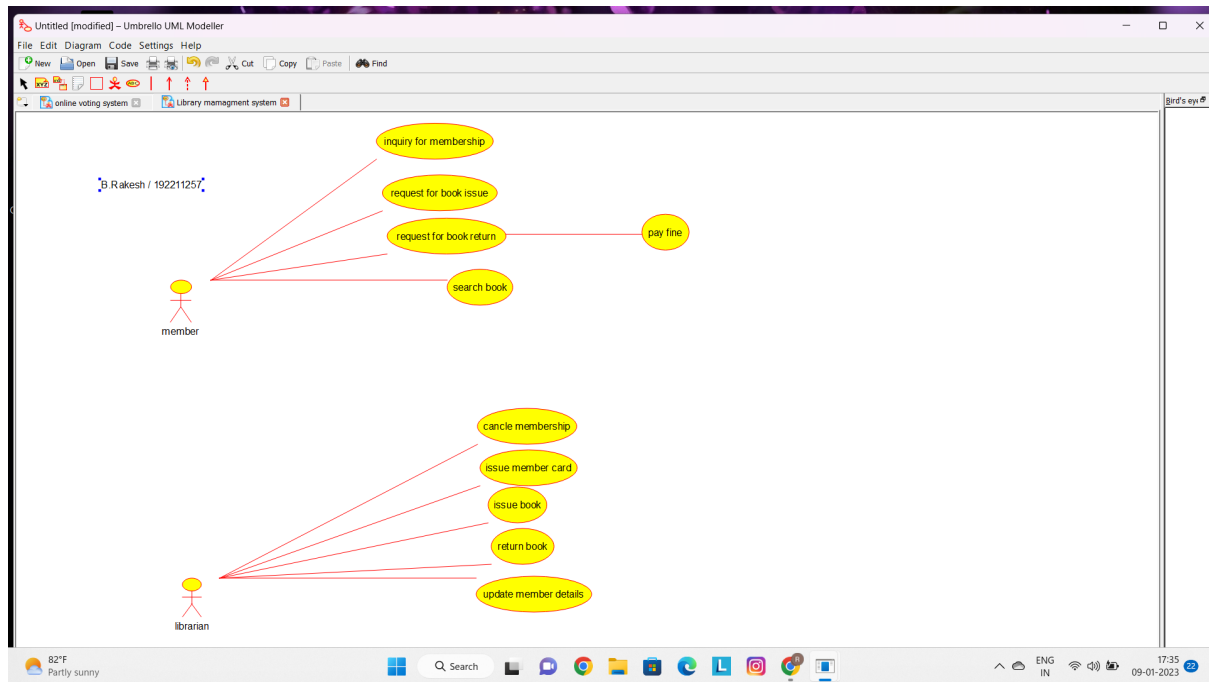**Software used:**Umbrello.

Result: Use case diagram for online voting system was successfully completed.

2. Draw a USE-CASE diagram for Library Management System using CASE tools.
Aim: To draw case diagram for Library Management system.
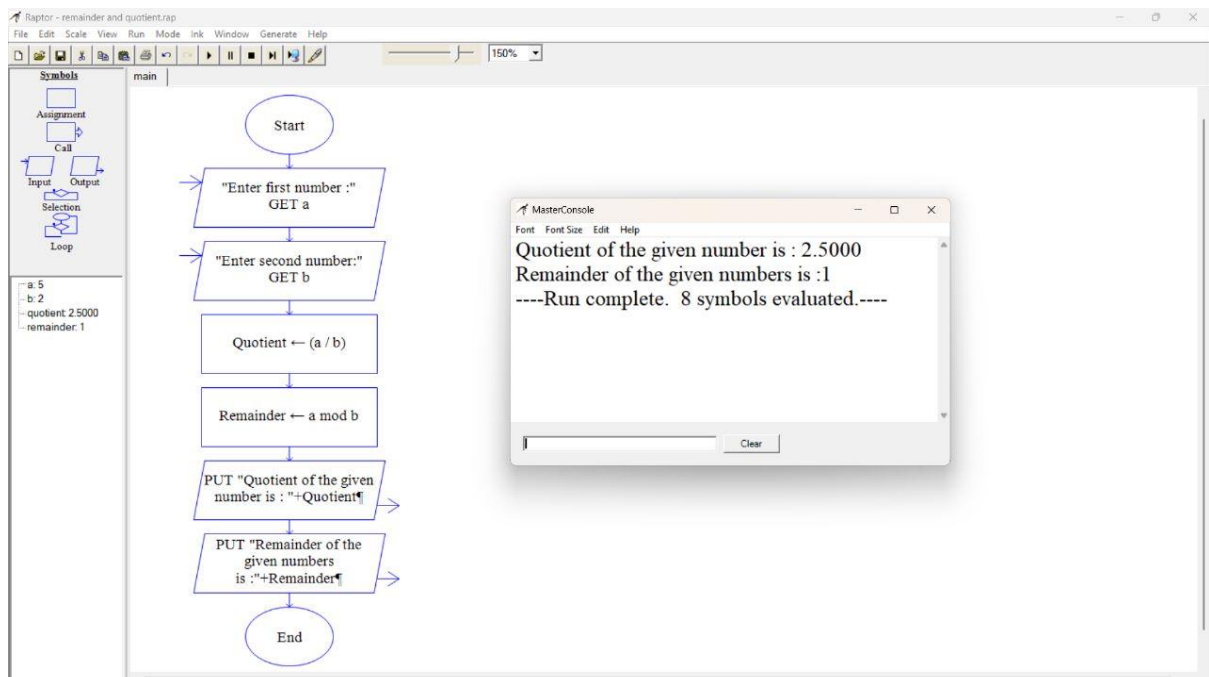**Software used:**Umbrello.

Result: Use case diagram for online library management system was successfully completed.

3. Draw and validate the flowchart to compute the quotient and remainder.
Aim: To draw a Validate the flowchart to compute the quotient and remainder
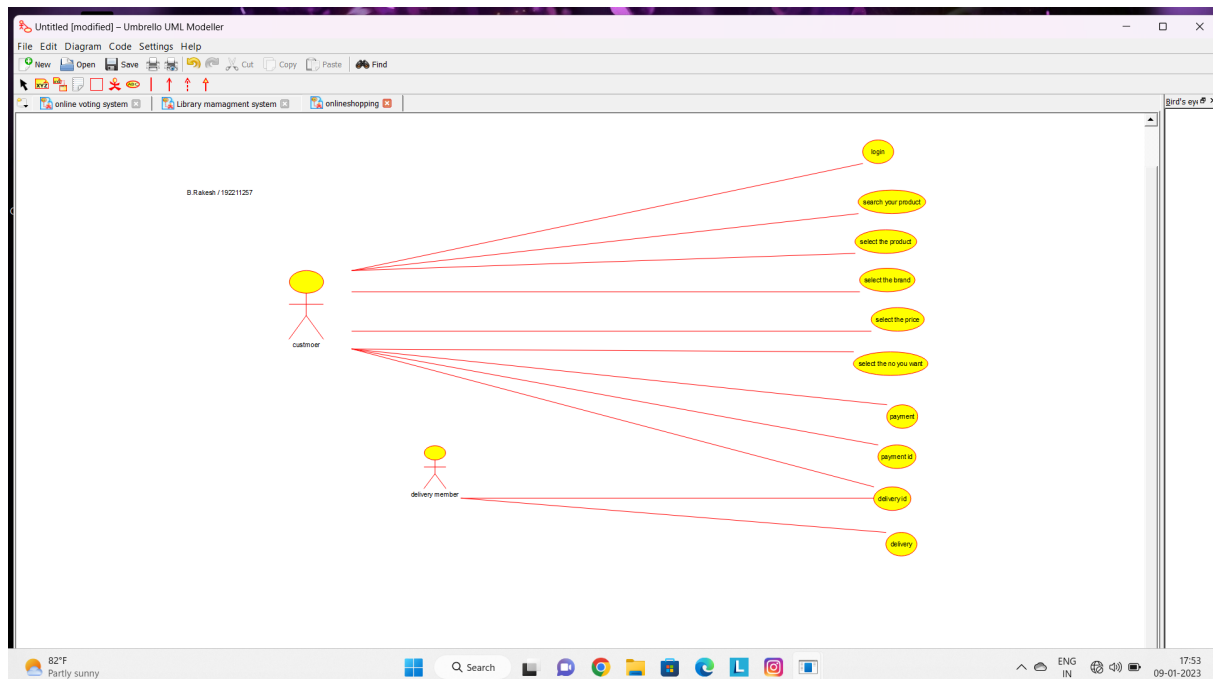**Software used:**Raptor.

Result: Flowchart to compute the quotient and remainder was completed and output verified.

4. Draw a USE-CASE diagram for online Shopping system using CASE tools.

Aim: To draw a case diagram for online shopping system.
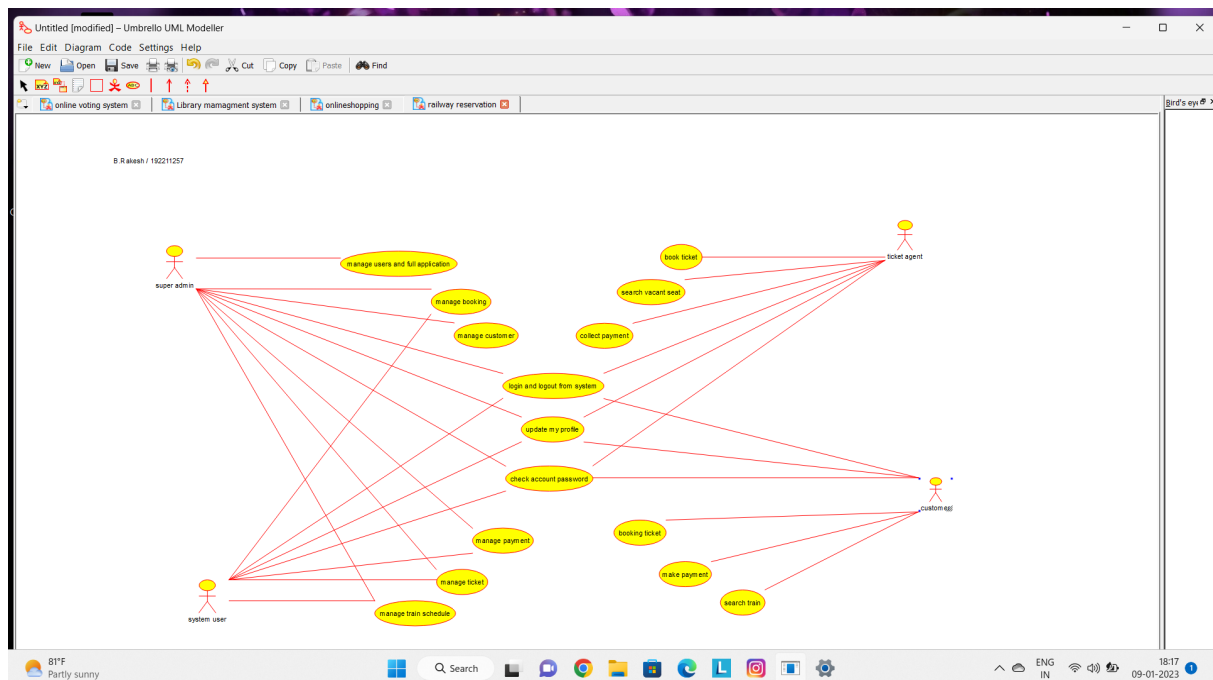
Software used: Umbrello.

Result: Use case diagram for online shopping was successfully completed.

5. Draw a USE-CASE diagram for Online Railway Reservation System using CASE tools.

Aim: To draw a use case diagram for online railway reservation system.
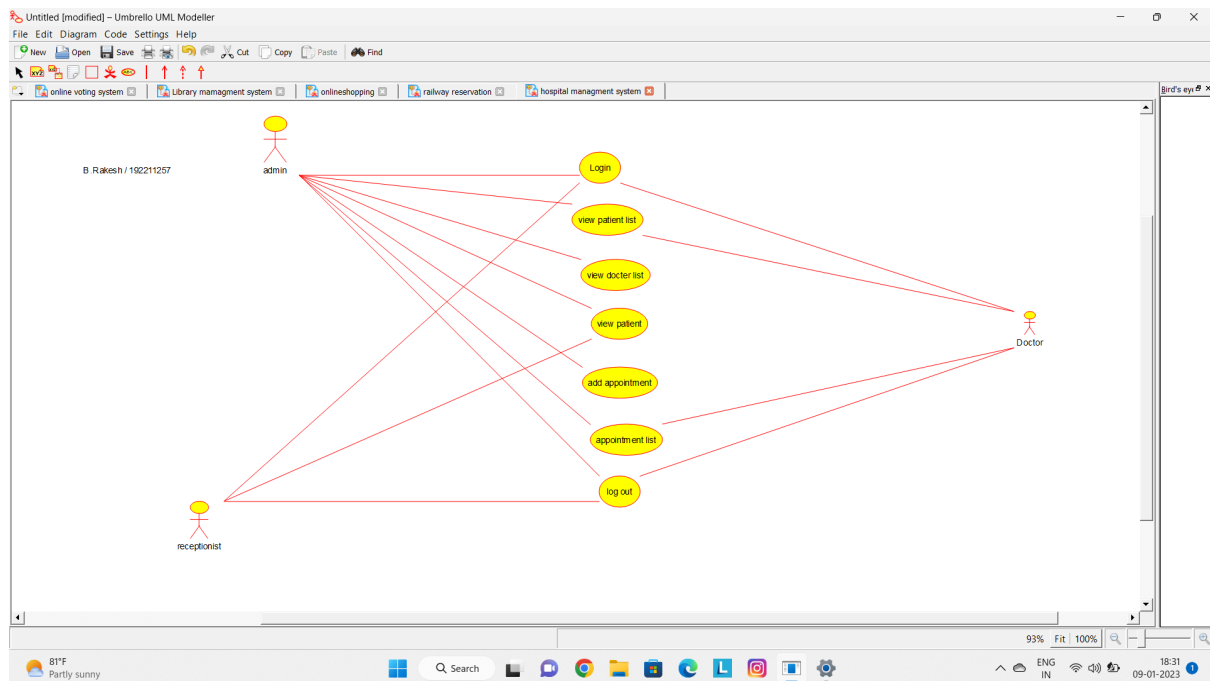
Software used: Umbrello.

Result: Use case diagram for online railway reservation was successfully completed.

6. Draw a USE-CASE diagram for Hospital Management System using CASE tools.

Aim: To draw a case diagram for hospital management system.
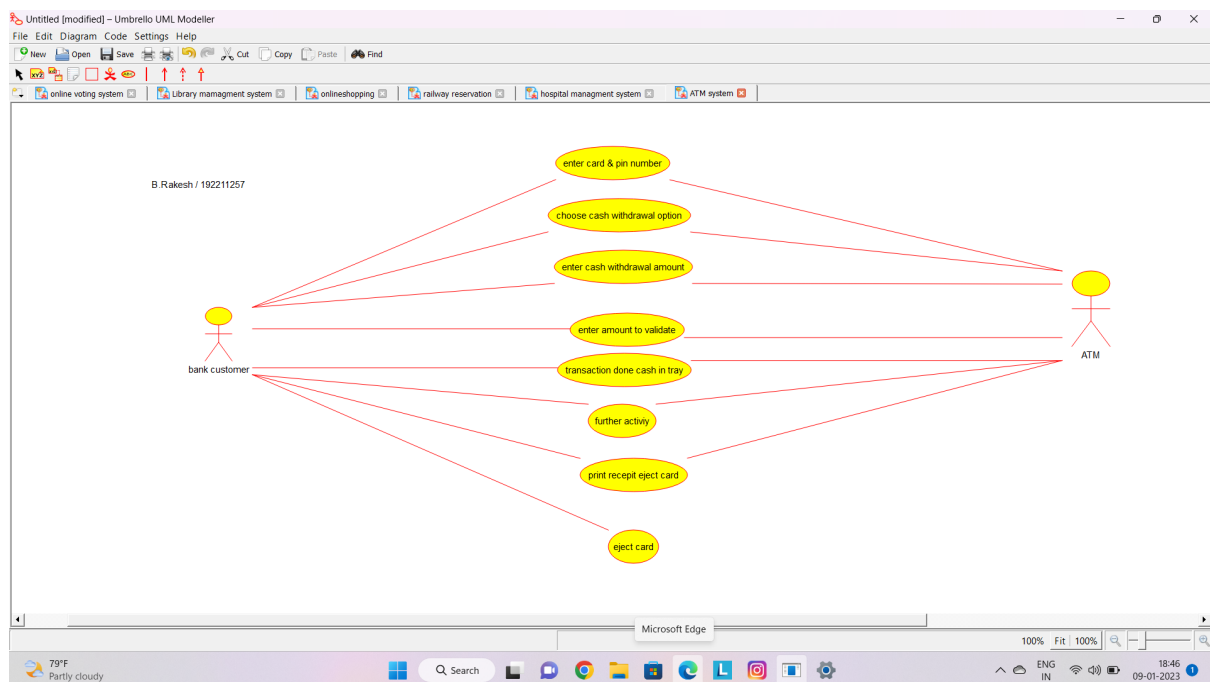
Software used: Umbrello.

Result:use case diagram for hospital management is successfully completed.

7. Draw a USE-CASE diagram for ATM System using CASE tools.

Aim: To draw a case diagram for ATM system.
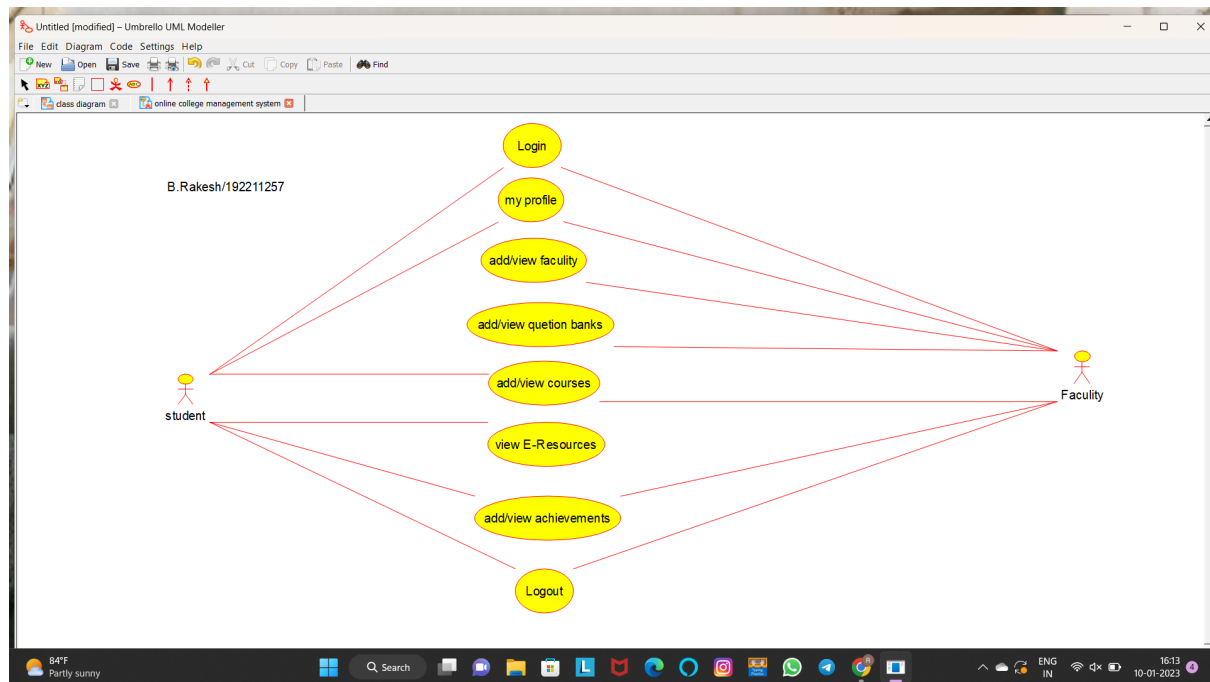
Software used: Umbrello.

Result: Use case diagram for ATM system successfully completed.

8. Draw a USE-CASE diagram for Online college management System using CASE tools.
Aim: To draw a case diagram for online college management system.
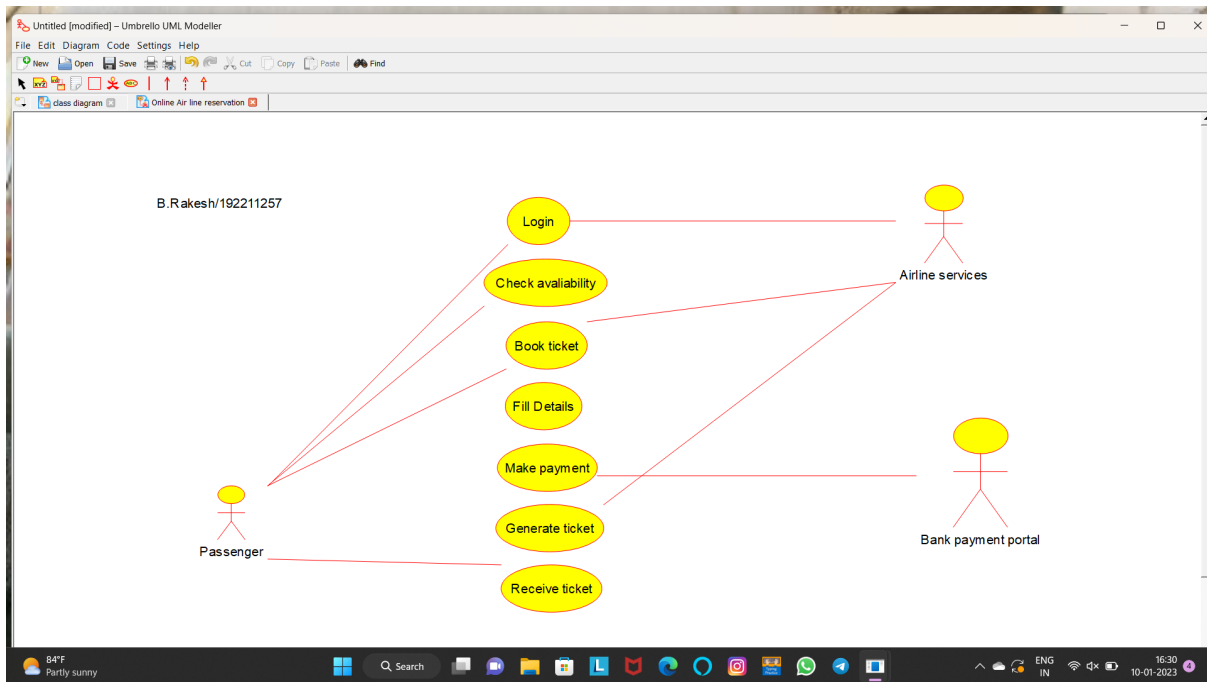**Software used:**Umbrello.

Result: Use case diagram for online college management system was successfully completed.

9. Draw a USE-CASE diagram for Online Airline Reservation System using CASE tools.
Aim: To draw a use case diagram for online Airline reservation system.
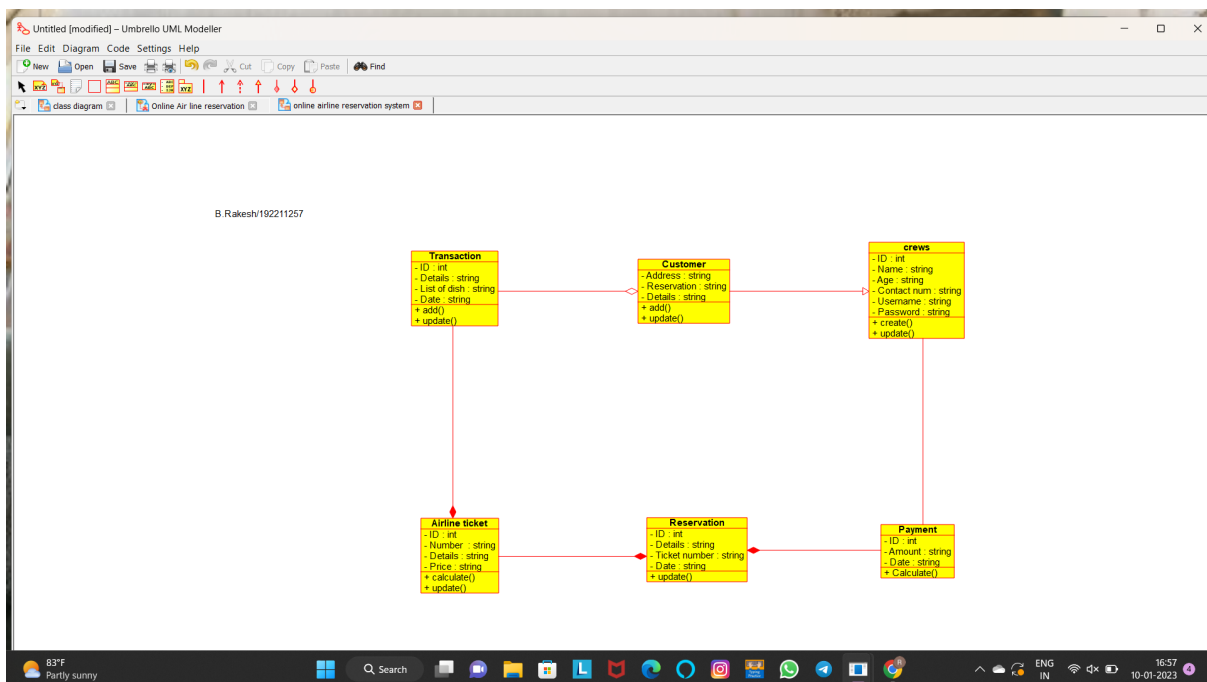**Software used:**Umbrello.

Result: Use case diagram for online Airline reservation system was successfully completed.

10. Draw a Class diagram for Online Airline Reservation System using CASE tools.

Aim: To draw a class diagram for online Airline reservation system.
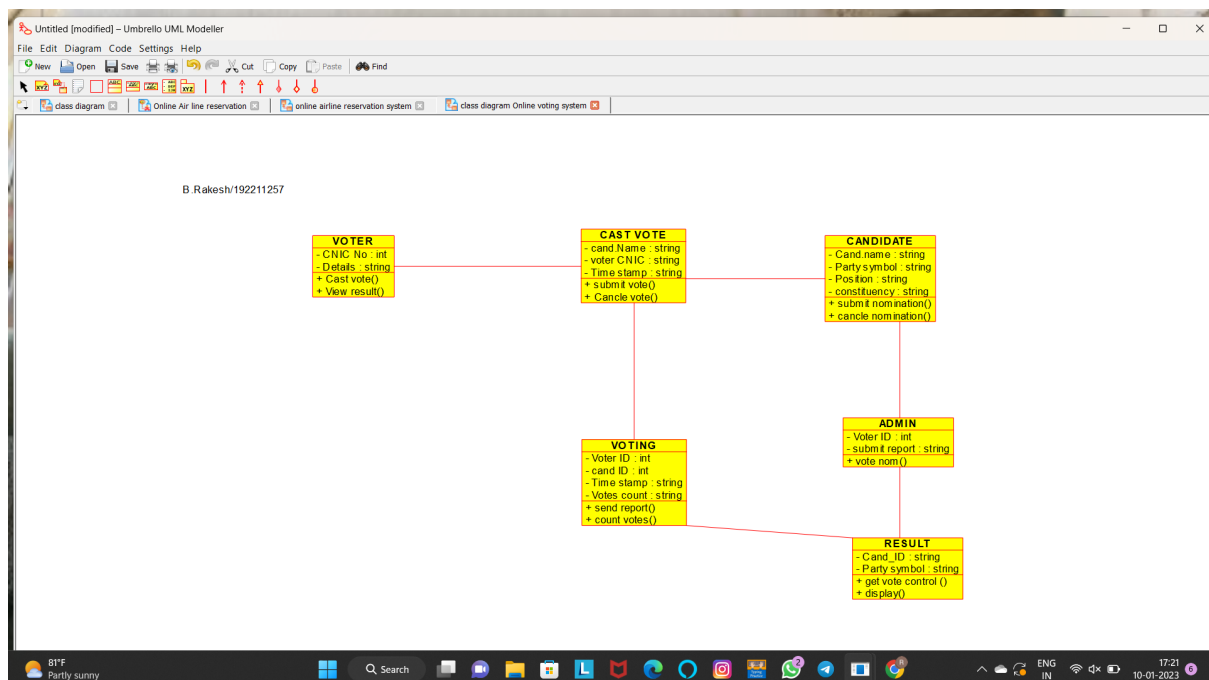
Software used: Umbrello.

Result:class diagram for online Airline reservation was successfully completed.

11. Draw a Class diagram for Online Voting System using CASE tools.

Aim: To draw class diagram for online voting system.
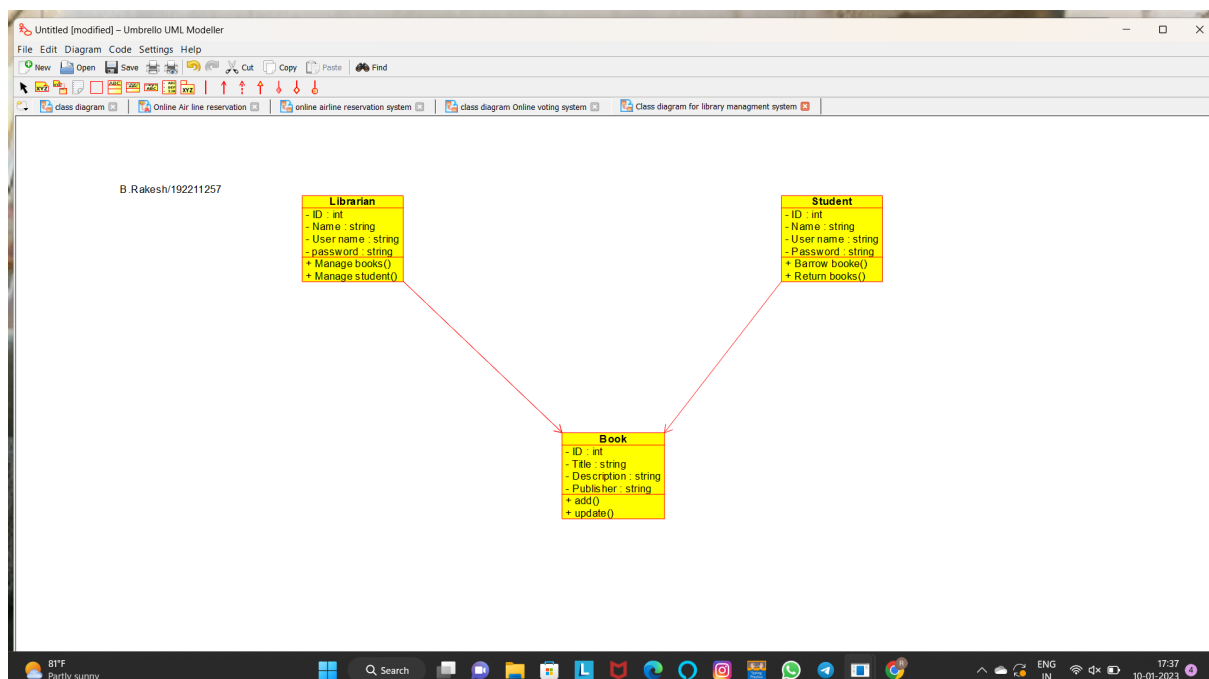
Software used: Umbrello.

Result: Class diagram for online voting system was successfully completed.

12. Draw a Class diagram for Library Management System using CASE tools.

Aim: To draw a class diagram for Library Management system.
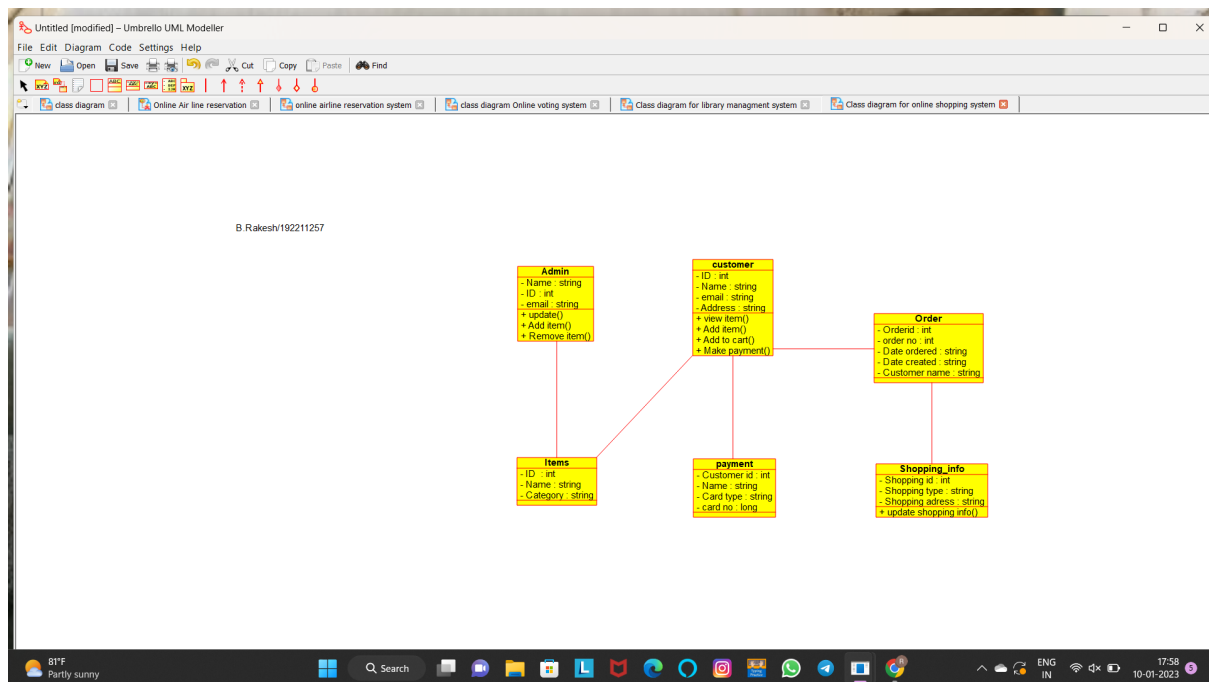
Software used: Umbrello.

Result: Class diagram for library management system was successfully completed.

13. Draw a Class diagram for Online Shopping system using CASE tools.

Aim: To draw a class diagram for online shopping system.
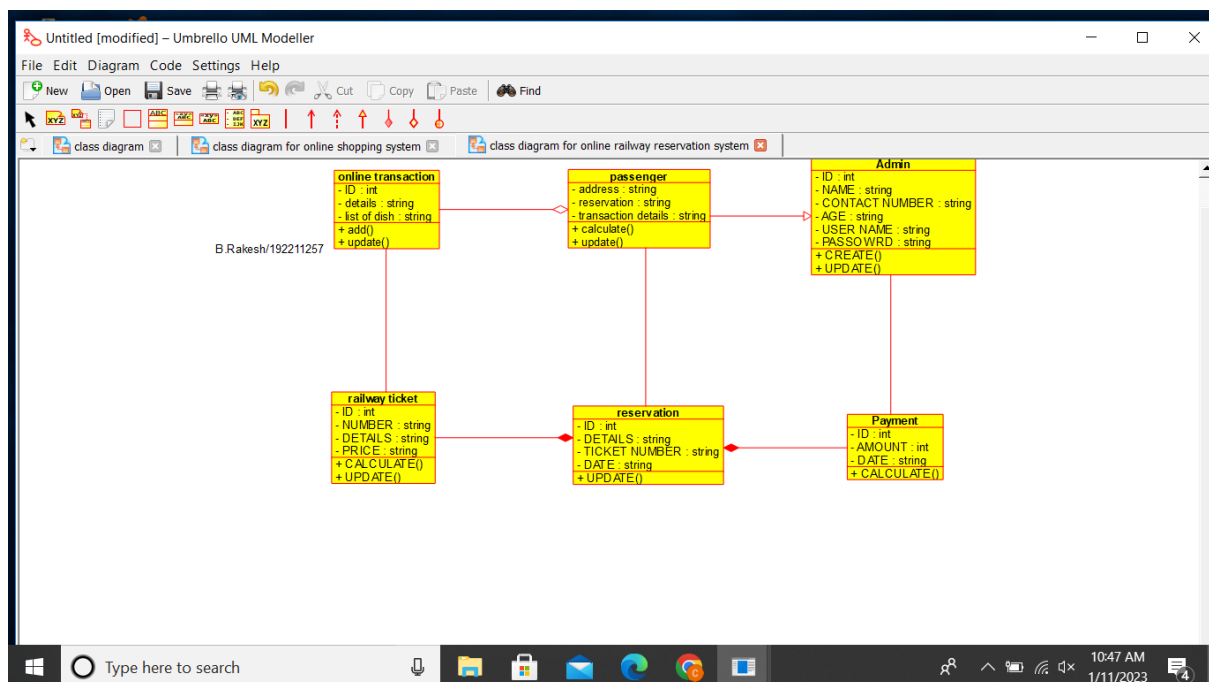
Software used: Umbrello.

Result: Class diagram for online shopping system was successfully completed

14. Draw a Class diagram for Online Railway Reservation System using CASE tools.

Aim: To draw a class diagram for online Railway Reservation system.
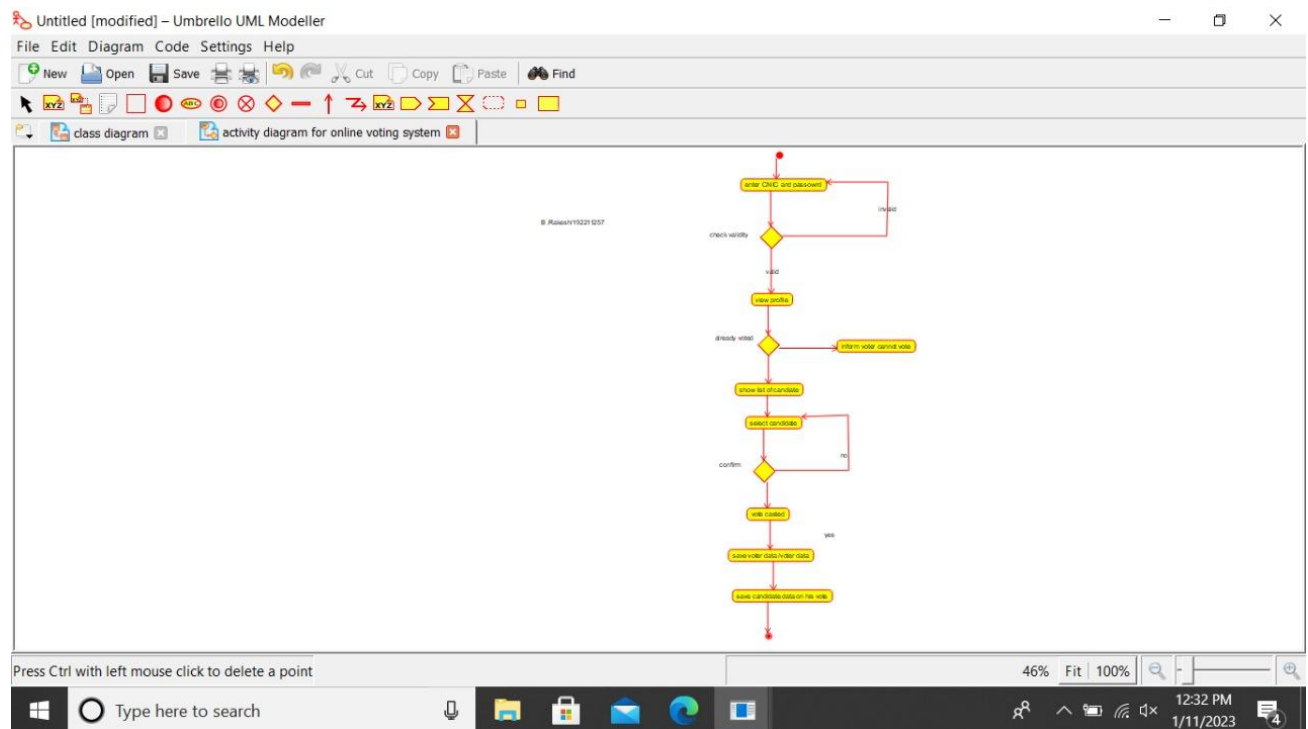
 Software used: Umbrello.

Result: Class diagram for online Railway Reservation system was successfully completed.

15. Draw a Activity diagram for Online Voting System using CASE tools.
Aim: To draw a Activity diagram for online Voting system.
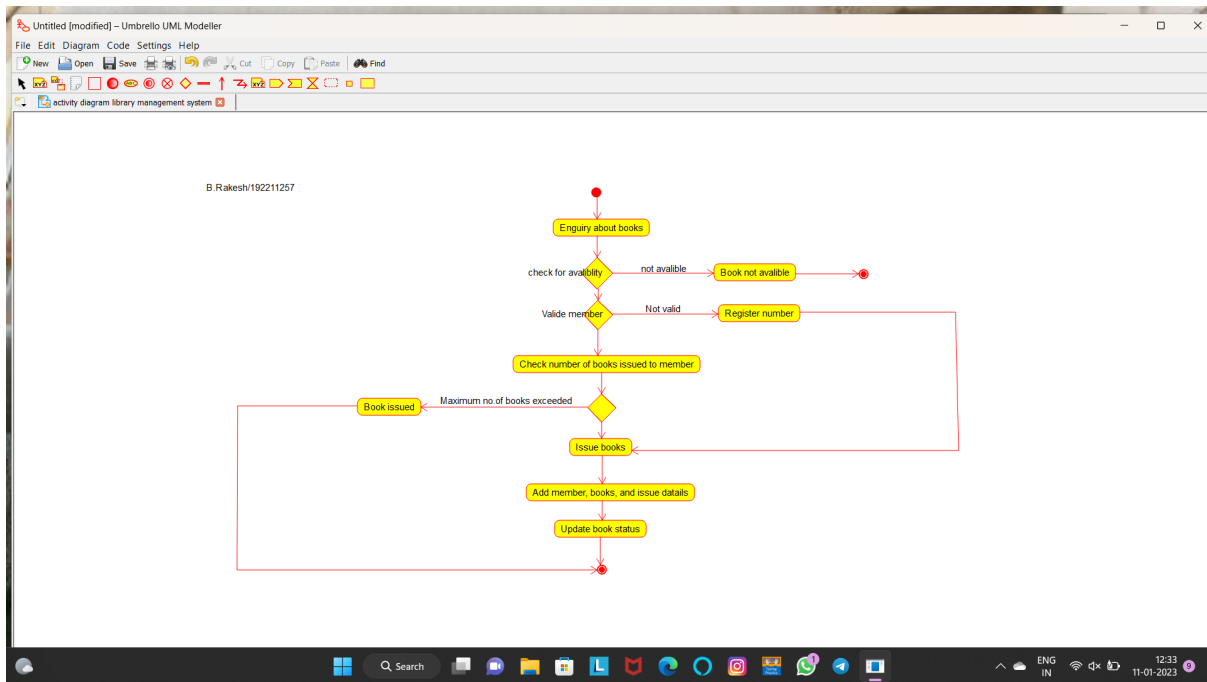**Software used:**Umbrello.

Result: Activity diagram for online voting system was successfully completed.

16. Draw a Activity diagram for Library Management System using CASE tools.
Aim: To draw a Activity diagram for Library Management system.
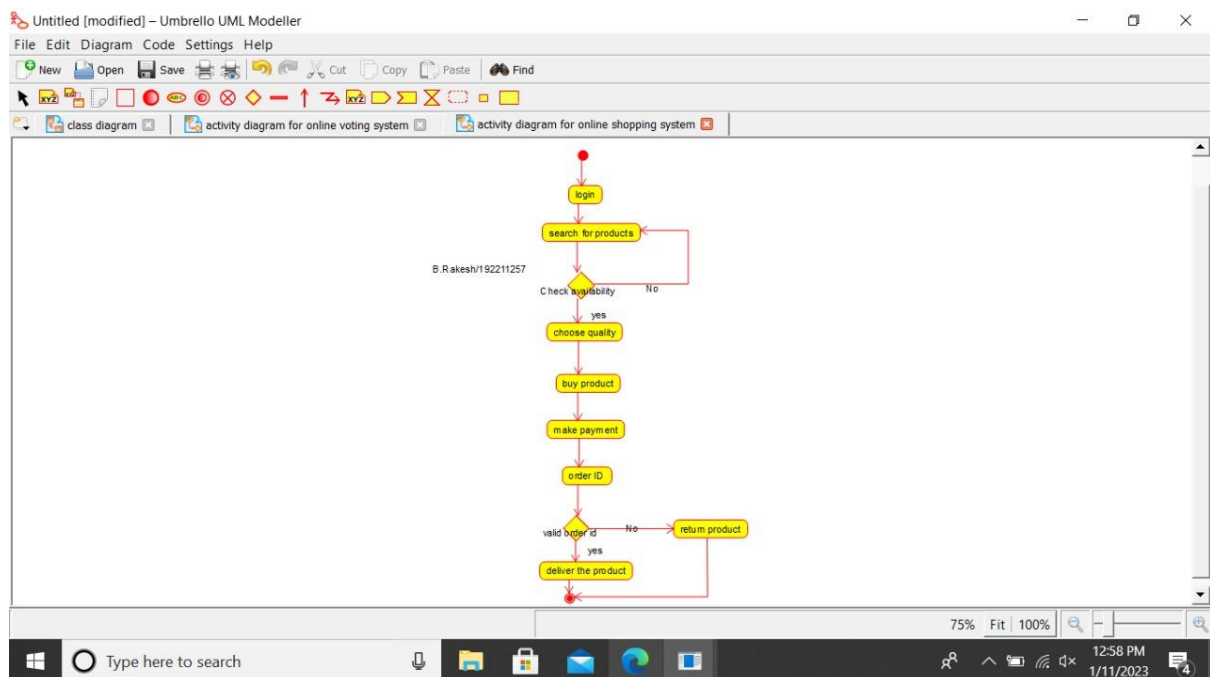**Software used:**Umbrello.

Result: Activity diagram for Library Management system was successfully completed.

17. Draw a Activity diagram for Online Shopping system using CASE tools.
Aim: To draw a Activity diagram for online shopping system.
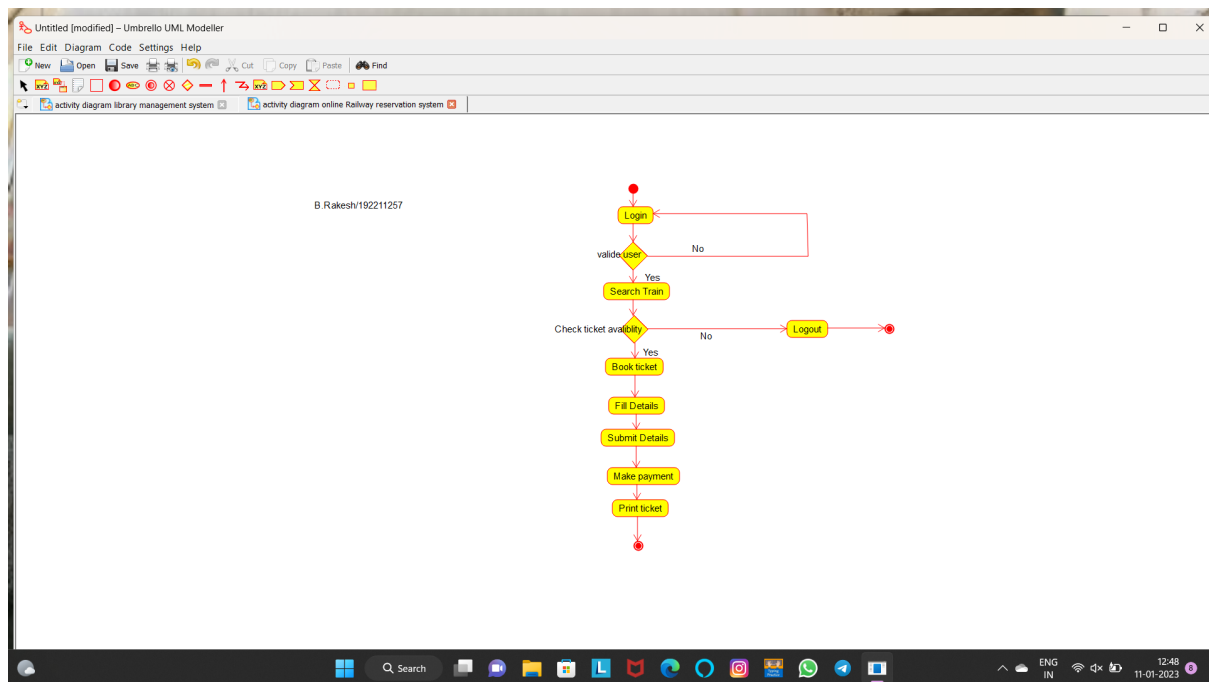**Software used:**Umbrello.

Result: Activity diagram for online Shopping system was successfully completed.

18. Draw a Activity diagram for Online Railway Reservation System using CASE tools.

Aim: To draw a Activity diagram for online Railway Reservation system.
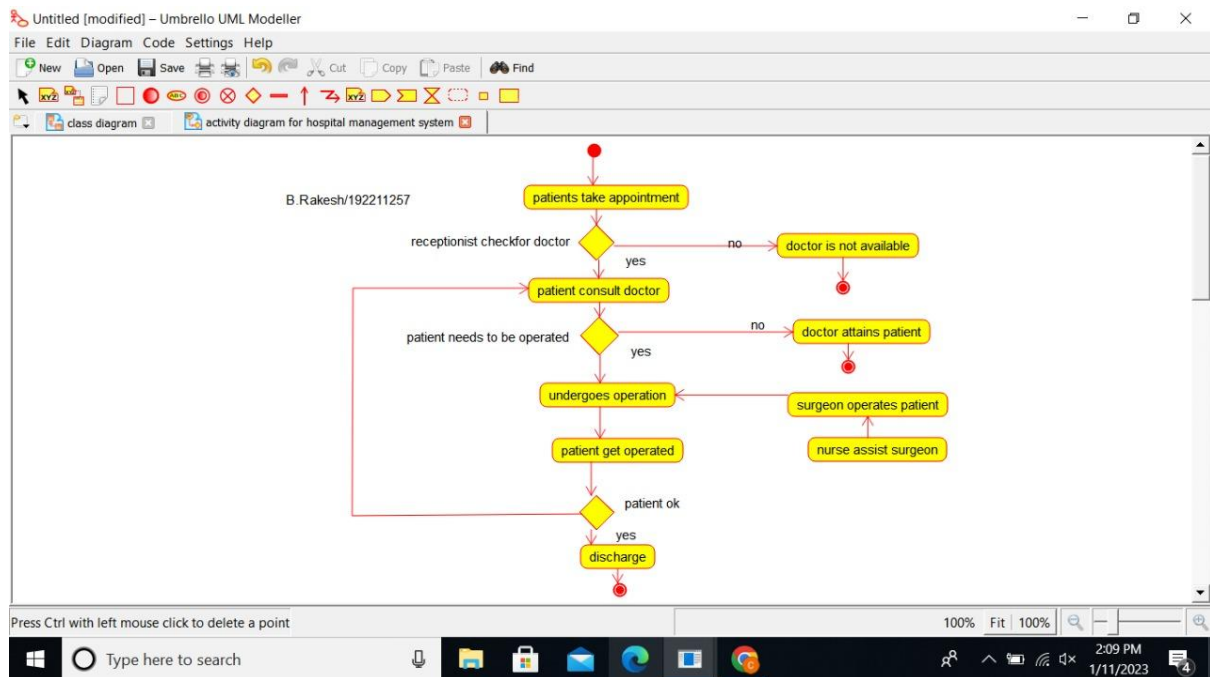
Software used: Umbrello.

Result: Activity diagram for online Railway Reservation system was successfully completed.

19. Draw a Activity diagram for Hospital Management System using CASE tools.

Aim: To draw Activity diagram for Hospital Management system.
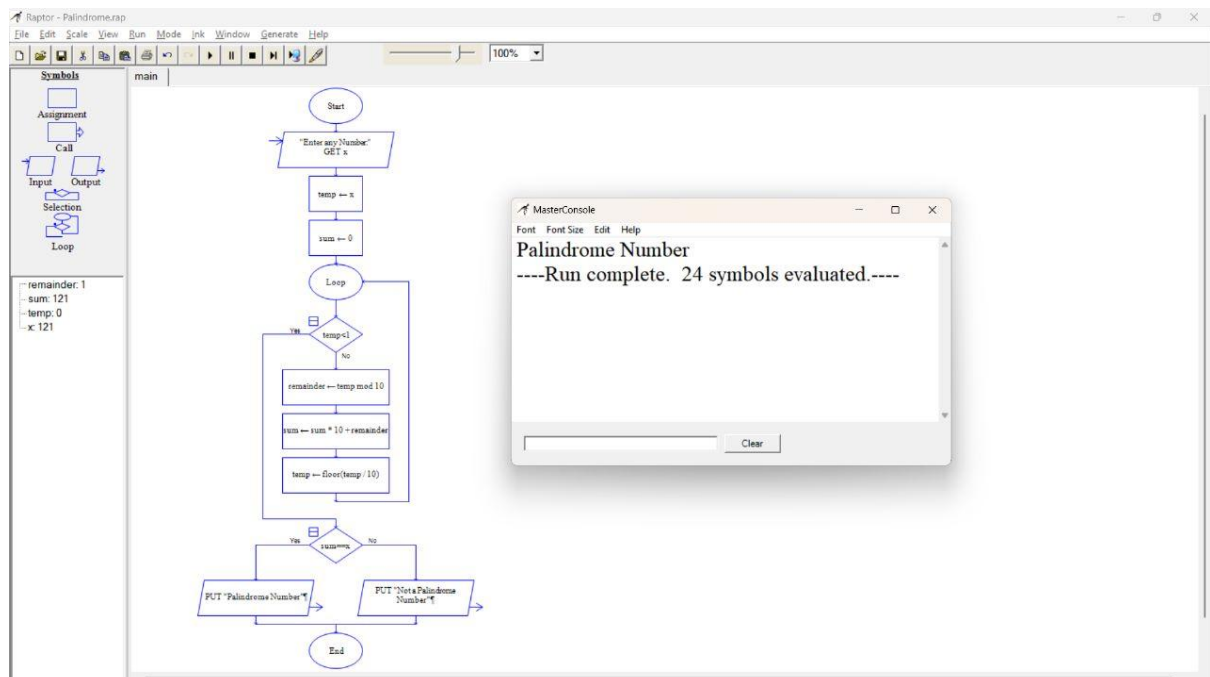
Software used: Umbrello.

Result: Activity diagram for Hospital Management was successfully completed.

20. Using Raptor- Draw the flowchart to check whether the given number is a palindrome or not.

Aim: To draw Raptor diagram the flowchart to check weather the given number is a palindrome or not.
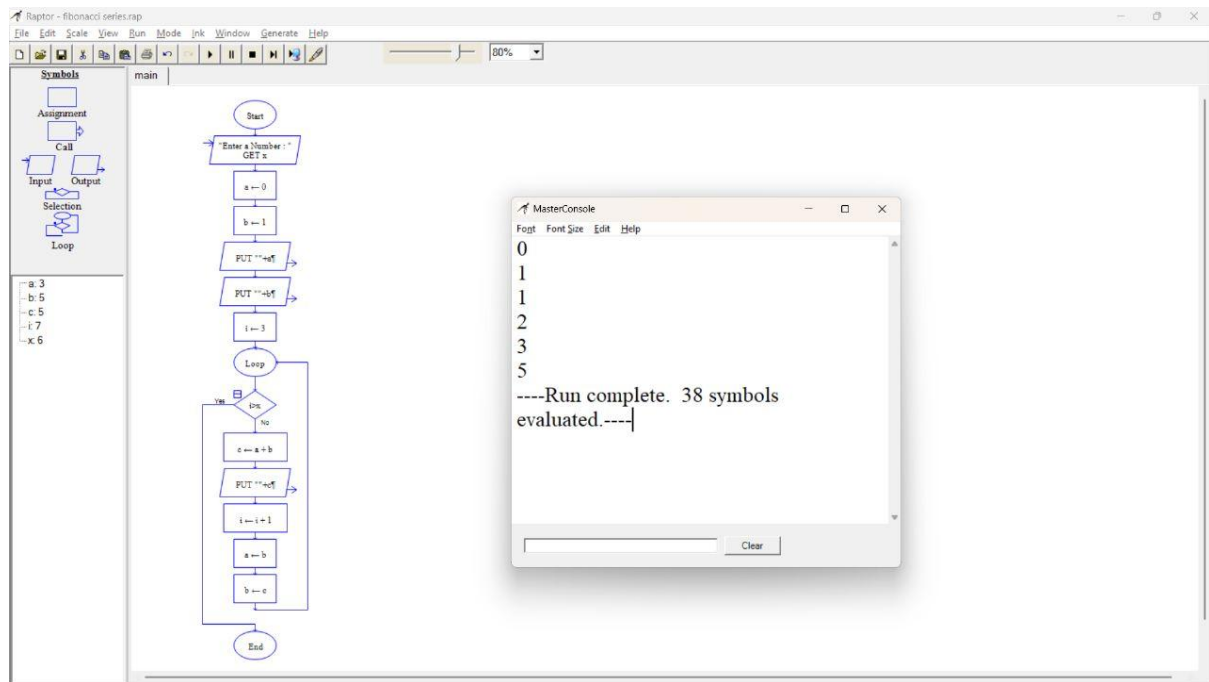
Software used: Raptor.

Result: Flowchart to check weather the given number is a palindrome or not was completed and output verified.

21. Using Raptor- Draw and validate the flowchart to calculate Fibonacci series.

Aim: To draw raptor draw and validate the flowchart to calculate Fibonacci series.

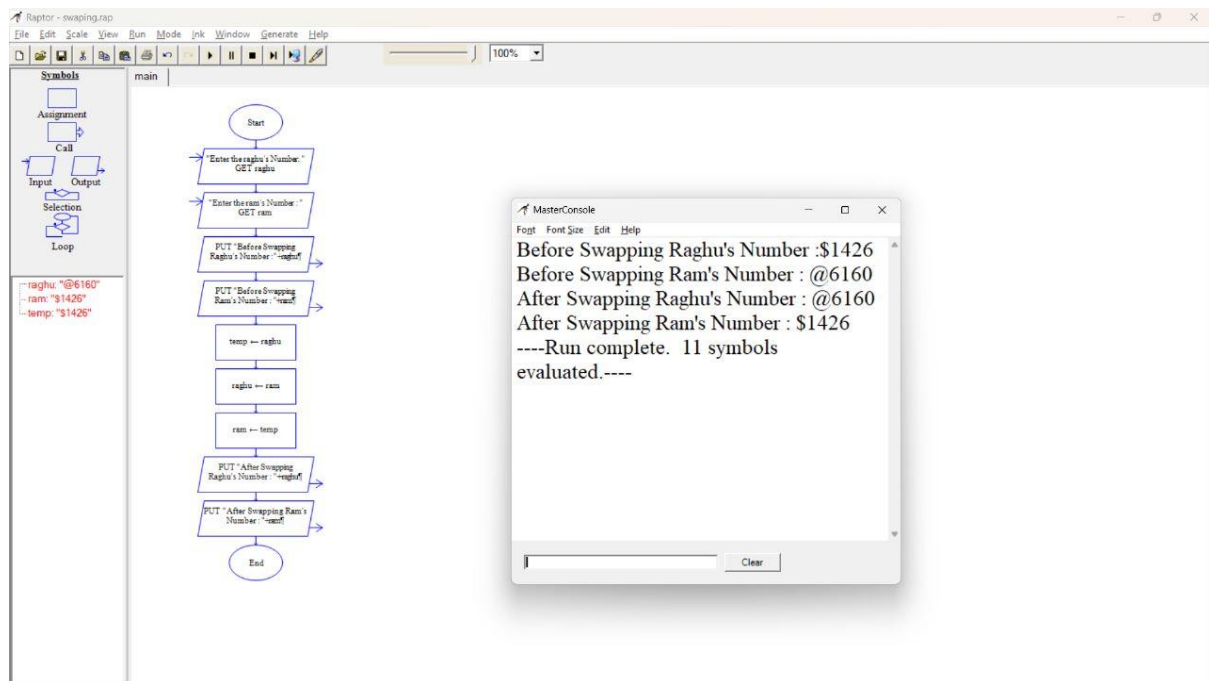**Software used:**Rapoter.

Result: Flowchart to calculate Fibonacci series was completed and output verified.

22. Using Raptor – Draw and validate the flowchart to swap two characters.

Aim: To draw Raptor draw and calculated and validate the flowchart to swap two characters.
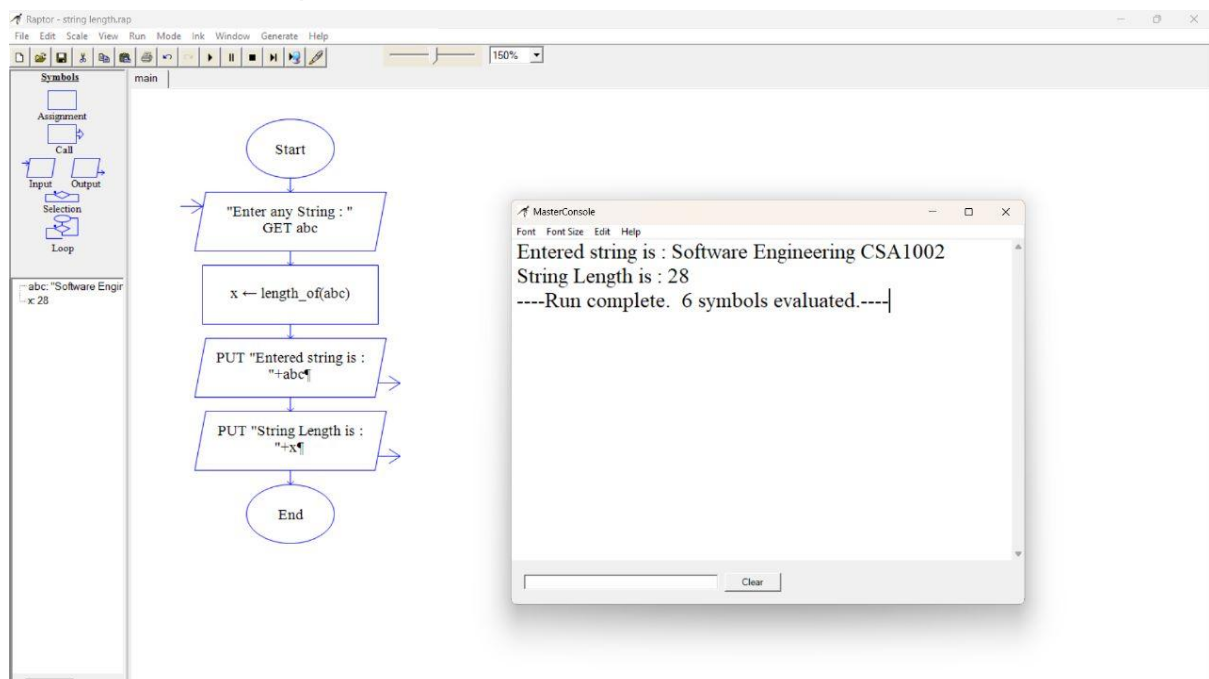
Software used: Raptor.

Result: Flowchart to swap two characters was completed and output verified.

23. Using Raptor – Draw the flowchart to display the length of the string.
Aim: To draw Raptor draw the flowchart to display the length of the string.
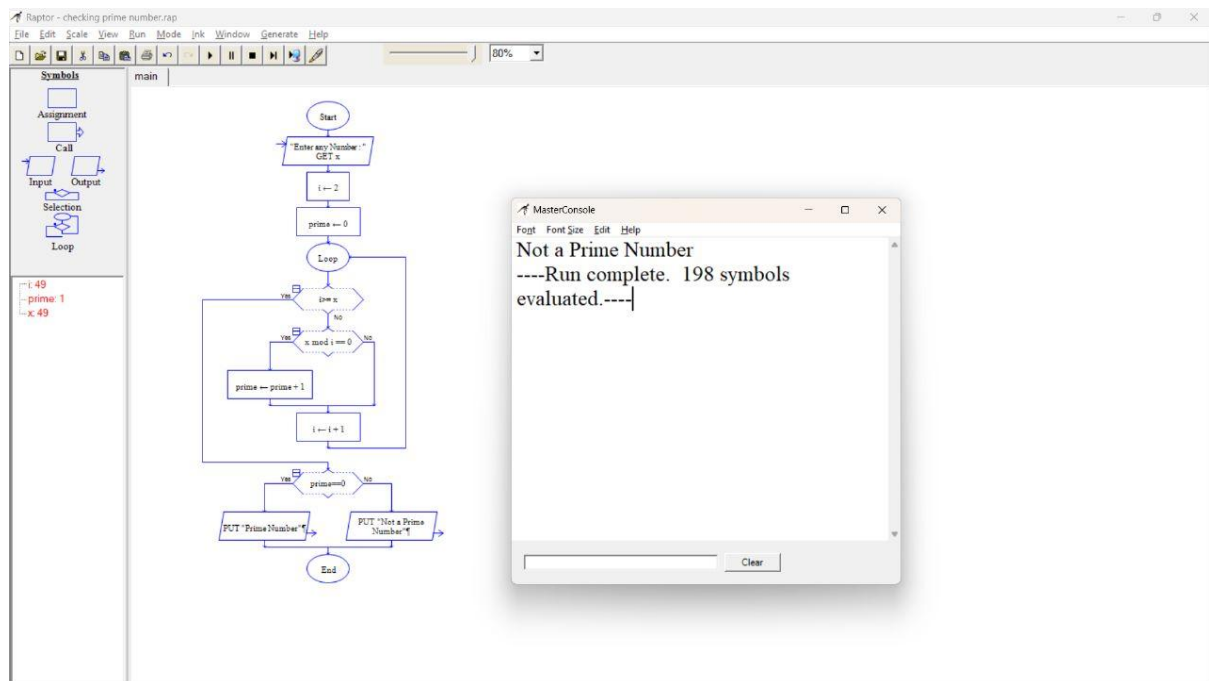**Software used:**Raptor.

Result: Flowchart to display the length of the string was completed and output
verified.

24. Using Raptor – Draw the flowchart to find whether the given number is prime or not.

Aim: To draw Raptor draw the flowchart to find whether the given number is prime or not.
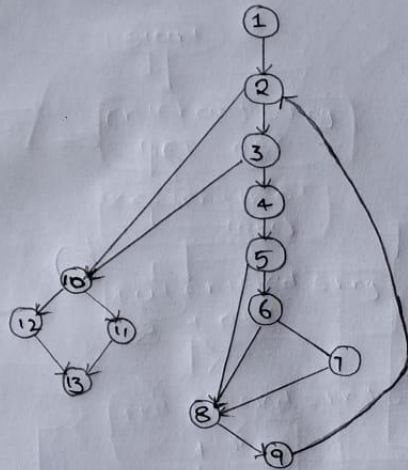
Software used: Raptor.

Result: Flowchart to find whether the given number is prime or not was completed and output is verified.

25. Find Cyclomatic Complexity for a graph having number of edges as 17, number of nodes as 13 and number of predicate nodes in the flow graph as 5.

25 find cyclomatic complexity for a graph
having number of edges as 12, number of nodes
as 13 and number of predicated node in the
following graph as 5

$V(G) = 6$ regions

$V(G) = 12$ regions $- 13$ nodes $+2 = 6$ $\Big\}$ $V(G) = E - N + 2$

$V(G) = 5$ Predicate nodes $+1 = 6$ $\Big\}$ $V(G) = P + 1$

we expected to specify six paths

Path 1:   1-2-10-11-13

Path 2:   ~~1-2-3=10-11-13~~ 1-2-10-12-13

Path 3:   1-2-3-10-11-13

Path 4:   1-2-3-4-5-8-9-2-.....

Path 5:   1-2-3-4-5-6-8-9-2----.

Path 6:   1-2-3-4-5-6-7-8-9-2-...

The ellipsis (...) following Path 4,5 and
6 indicates that any path through the
remainder of the control stricture is
acceptable.