Phase1 Feedback

General Comments	Overall Design (25 marks)
Class Diagram	• Class diagram → 5 marks (2 marks classes, 3 marks relationships)
General Class implementation • Relevant attributes • Inheritance/Aggregation/Composition/ Interface • Implemented based on Object Oriented Concepts.	• Class Admin→ 2 marks • Class Train → 3 marks • Class Passenger → 3 marks • Class Route→ 3 marks • Class Ticket → 2 marks • Class Booked_Tickets → 3 marks (different implementations are accepted) • Class Station or Main (that involves collections of trains, admins and Passengers) → 2 marks. • Any example of Inheritance/Aggregation/ Composition/ Interface. → 2 marks
Methods that should be provided for Admins	**Detailed design of each class (50 marks)** **Notes → Display methods just take maximum 1 mark** **Notes → methods should be in suitable classes according to OO concepts, not all in one class or in Main class**
• Manage Account - Search for a specific admin from the collection and update the required information.	3 marks: - 2 marks for correct search - 1 mark for correct update.
• Add Train: - The method should take the information of the new train. - Add the train as an object in the Trains collection.	4 marks: - 2 marks for taking correct information and passing correct parameters. - 2 marks for adding in trains' collection.

• Remove Train: - Search for the train to be removed within the collection. - Remove the train from the collection.	4 marks: - 2 marks for correct search - 2 marks for removing.
• Update Train stored data: - Search for the specified train within the collection. - Update the train data.	4 marks: - 2 marks for correct search. - 2 marks for update.
• Generate Reports: - The method should search in the booked collection for the booking of a certain route. - The method should calculate the total fare of this route by summing up the fares collected. - The method should display the total number of bookings and the total fare collected.	6 marks: - 2 marks for first point. - 2 marks for second point. - 2 marks for third point.
Methods that should be provided for Passenger.	
• Create Account: - The method should add the new Passenger in the collection of Passengers.	4 marks: - 2 marks for taking input. - 2 marks for adding in collection.
• Manage Account - Search for a specific passenger from the collection and update the required information.	3 marks: - 2 marks for correct search - 1 mark for correct update
• Book a ticket: - The passenger should select origin and destination of a route, timing slot and seat number from the available seats. - The method should add the new booking to the Booked collection. - The passenger should be allowed to reserve more than one seat.	6 marks: - 2 marks for first point. - 2 marks for second point. - 2 marks for third point.
• Cancel Booking: – The method should search the booked collection for the one to be canceled. – The canceled booking should be removed from the booked collection. – The seats should be made available again.	6 marks: - 2 marks for first point. - 2 marks for second point. - 2 marks for third point.
• Update Booking:	6 marks:

– The method should search the booked collection for the one to be updated. – Cancel booking method could be called (or it is implemented again). – Book a ticket method could be called (or it is implemented again)	- 2 marks for first point. - 2 marks for second point. - 2 marks for third point.
• View tickets: – The method should display for the passenger his list of booked tickets by displaying his collection of booked tickets.	4 marks
Proper use of Collections	**Proper use of Collections (12.5 marks)**
Collections needed: - A collection for Admins - A collection for Passengers - A collection for Trains - A collection of Train_routes - A collection of tickets_per_route. - A collection for Booked tickets (different implementations are accepted)	2 marks for each collection, but booked tickets 2.5
Class Implementation and Testing in main	**Class Implementation & Testing in main (12.5 marks)**
• Login: ⁻ Displaying menus should be based on the correct login	1.5 marks for two different Access level.
• Test all methods : - A scenario for calling 11 essential methods - Insert meaningful data for testing. - Using appropriate display methodology	Calling 11 essential methods in appropriate scenario → 11 marks.