# Passenger Class – Abstract Class

## Variables

String forename

String surname

float discount

String type

## Functions

### String getForename()

### String getSurname()

### float getDiscount()

### void displayDetails()

# Ordinary Passenger Class

## Variables

String promotion

## Functions

### Constructor OrdinaryPassenger(String forename, String surname, float discount)

Assign passed parameters to local variables

### Constructor OrdinaryPassenger()

Call functions to gather passenger information and store the returned values as local variables

### String getForename()

Ask for the passenger’s forename and return the result

### String getSurname()

Ask for the passenger’s surname and return the result

### float getDiscount()

Ask if the passenger gets a discount and return the correct discount amount based on the response

### void displayDetails()

Display customer forename, surname and discount rate

# Island Passenger Class

## Variables

String island

## Functions

### Constructor IslandPassenger(String forename, String surname, String island)

Assign passed parameters to local variables and set discount to 0.1

### Constructor IslandPassenger()

Call functions to gather passenger information and store the returned values as local variables

### String getForename()

Ask for the passenger’s forename and return the result

### String getSurname()

Ask for the passenger’s surname and return the result

### float getDiscount()

Ask if the passenger which island they’re from and return the correct discount amount when they enter a valid response

### void displayDetails()

Display customer forename, surname, island name and discount rate

# Business Passenger Class

## Variables

String company

## Functions

### Constructor BusinessPassenger(String forename, String surname, String company)

Assign passed parameters to local variables and set discount to 0.25

### Constructor BusinessPassenger()

Call functions to gather passenger information and store the returned values as local variables

### String getForename()

Ask for the passenger’s forename and return the result

### String getSurname()

Ask for the passenger’s surname and return the result

### float getDiscount()

Ask if the passenger which company they’re from and return the correct discount amount when they enter a valid response

### void displayDetails()

Display customer forename, surname, company name and discount rate

# Seat Class

## Variables

String seatNo

float cost

float price

int status

float takings

Passenger occupier

## Functions

### Constructor Seat(String seatNo)

Set status, price and takings to 0, set occupier to null and seatNo to passed value

### void displaySeat()

if status is 0

say seat is free

if status is 1

say seat is reserved and display customer information

if status is 2

say seat is booked and display customer information and seat price

### void bookSeat()

if status is 0

set status to 2

ask which passenger type they are and call the correct constructor

set price to cost - (cost \* passenger discount)

set takings to takings + price

call display seat function

if status is 1

ask for passenger forename and surname

confirm passenger forename and surname against stored values

set status to 2

set price to cost – (cost \* passenger discount)

set takings to takings + price

call display seat function

if status is 2

say seat already booked

### void reserveSeat()

if status is 0

set status to 1

ask which passenger type they are and call the correct constructor

call display seat function

if any other status

say seat unavailable

### void cancelSeat()

set status and price to 0, set passenger to null

### float getTakings()

return takings