**Algorithm**

Algorithm Wanderlust\_Invoice

{This algorithm prompts the user to input the client’s last name, the tour booked by the client, the tour date, the number of people in their touring party as well as the new tour price of the tour booked by the client. It calculates the excursion price of the tour. A 10% discount is given to parties with 5 or more people and outputs “Group Special”. For parties with less than 5 people it outputs “Regular Price”. For all bookings it outputs an invoice which includes the client’s last name, the tour booked by the client, the tour date, and the number of people in their touring party as well as the total price for the booking along with the specified message}

{Created by Arianna St.John}

{Date: 06/03/2023}

LastName,Tour, TourDate String {Variables storing the client’s last name, the tour booked by the client and the tour date}

Entries, GroupSize Integer {Variables storing the loop variable which allows the loop to increment and the booking entries and the number of people in the client’s touring party}

NewTourPrice,ExcursionPrice,TotalPrice Real {Variables storing the new tour price of the tour booked by the client, the excursion price of the tour and total price to be paid}

Start

Entries<--1 {Initialisation of the variable to 1}

Print '\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_'

Print '\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_'

Insertline

Repeat

Print 'Enter the last name of the client ' {Prompts the user to input the client’s last name}

Read LastName {Stores the client’s last name}

Insertline

Print 'Enter the tour booked by the client ' {Prompts the user to input the tour booked by the client}

Read Tour {Stores the tour booked by the client}

Insertline

Print 'Enter the tour date ' {Prompts the user to input the tour date}

Read TourDate {Stores the tour date}

Insertline

Print 'Enter the number of people in the touring party of the client ' {Prompts the user to input the number of people in the touring party of the client}

Read GroupSize {Stores the number of people in the touring party of the client}

Insertline

Print 'Enter the new tour price of the tour $' {Prompts the user to input the new tour price of the tour}

Read NewTourPrice {Stores the new tour price of the tour}

Print '\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_'

Print '\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_'

Insertline

Print 'Date: 06/03/2023' {Outputs the date of the invoice}

Insertline

Print 'Thank you for booking a tour with Island Wanderlust.' {Outputs a message thanking the client}

Insertline

Print 'Below is your personal information as well as the total amount to be paid for the tour.' {Outputs a message indicating that the client's information is below}

Insertline

Print '------------------------------------------------------------------------------------------------------------------------'

Insertline

ExcursionPrice<--NewTourPrice\*GroupSize {Calculates the excursion price for the touring party}

If GroupSize>=5 Then {Determines whether or not the touring party has 5 or more people and gives them a 10% discount if they do,calculates the total price for the customer}

TotalPrice<--ExcursionPrice- ExcursionPrice\*0.10 {Calculates the total price to be paid for a touring party with 5 or more people}

Print 'Group Special' {Outputs a message indicating that the touring party has 5 or more people}

Else

TotalPrice<--ExcursionPrice {Calculates the total price to be paid for a touring party with less than 5 people}

Print 'Regular Price' {Outputs a message indicating that the touring party has less than 5 people}

Endif

Insertline

Print 'The last name of the client is ',LastName {Outputs the client’s last name}

Insertline

Print 'The tour booked by the client is ',Tour {Outputs the tour booked by the client}

Insertline

Print 'The tour date is ',TourDate {Outputs the tour date}

Insertline

Print 'The number of people in the touring party of the client is ',GroupSize {Outputs the number of people in the touring party of the client}

Insertline

Print 'The total price to be paid is $',TotalPrice:3:2 {Outputs the total price to be paid}

Insertline

Print '\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_'

Print '\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_'

Insertline

Insertline

Entries<--Entries+1 {Statement counting the looping variable}

Until Entries=6

Stop.