Experiment

Due: 06.12.2024, 23:59

You are given two projects in the following slides.

For these question, write separate Java programs.

Then, generate test cases

- using decision table testing technique
- using equivalence testing techniques
- using boundary value testing techniques

Make sure you measure test generation time per test.

Implement test cases using Junit.

Run the tests.

Compare and discuss the results within each project with respect to

- The number of tests
- Test execution time per test
- and others are left to your research

Lastly, compare and discuss the results of two project with each other.

Project 1

Assume that a shipping company calculates the shipping cost using the following decision table.

Shipping Cost Calculation N = number of items				
Purchase Amount	**<= $100**		**> $100**	
Number of Items (N)	**<= 3**	**> 3**	**<= 3**	**> 3**
Delivery in Next Day	*25*	*N * $6.00*	*35*	*N * $7.50*
Delivery in 2nd Day	*10*	*N * $2.50*	*15*	*N * $3.50*
Delivery in a week	*N * $1.50*	*Free*	*10*	*N * $2.50*

Project 2

Access is allowed if and only if:

- the subject is an employee

AND current time is between 9 am and 5 pm

AND it is not a weekend

OR

- the subject is an employee with a special authorization code

OR

- the subject is an auditor

AND the time is between 9 am and 5 pm (not constrained to weekdays).