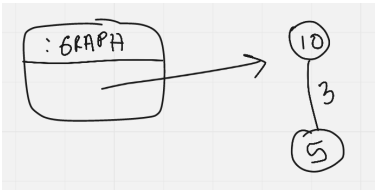
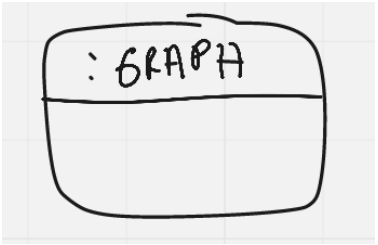
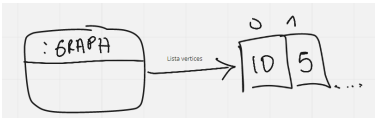
Test Cases Design

GraphTest

Name	Class	Scene
sc1	Graph	
sc2	Graph	
sc3	Graph	 No hay aristas

Create Vertex Method Test

Objective: Validate the correct creation of a vertex when the graph is empty

Class	Method	Scene	Entries	Result
Graph	createVertex	sc2	Vertex(5)	After creating the vertex(5) the Graph is not going to be empty so the test will show false for finalEmptyState because it is not empty

Remove Vertex Method test

Objective: Validate if removing a vertex algorithm is working correclty.

Class	Method	Scene	Entries	Result
Graph	removeVertex	sc2	vertex(5)	The test creates the vertex first and then delete it, at the end the graph is not empty before removing the vertex, after that the graph has to be empty.

Get Vertex Method test

Objective: Validate if when getting a vertex depending on the vertex name it returns the correct one

Class	Method	Scene	Entries	Result
Graph	getVertex	sc1	none	The returned vertex is the same that the consulted.

Create edge Method test

Objective: Validate if the process to create a new edge is correct

Class	Method	Scene	Entries	Result
Graph	createEdge	sc3	none	The edge is created and the adjacentList is not empty but before creating it the adjacentList is empty cuz nothing have been added to it

Remove edge Method test

Objective: Validate if the process to remove a edge is correct

Class	**Method**	**Scene**	**Entries**	**Result**
Graph	createEdge	sc1	adjacentList	The edge is removed from the adjacentList, so the adjacentList is empty now because when vertex 3 is eliminated vertexed 5 and 10 are not adjacent vertexes anymore.