Test case ID	Description	Pre-condition	Test data	Expected result	Actual data	Pass/Fail
1	Get input from the file input.txt, convert the comma separated input structure in to 3X3 matrix	The values in the input file need to be properly structured with 9 entries only	1,1,1 0,2,5 2,5,-1	A list with 3 rows 3 columns	[[1.0, 1.0, 1.0], [0.0, 2.0, 5.0], [2.0, 5.0, -1.0]]	Pass
2	Use the parsed list to obtain corresponding minors of all the values in 0^{th} row.	Requires a parsed 3X3 matrix as input.	[[1.0, 1.0, 1.0], [0.0, 2.0, 5.0], [2.0, 5.0, -1.0]]	A list with three 2X2 matrices. Each is the corresponding matrix of values in the 0^{th} row.	[[[2.0, 5.0], [5.0, -1.0]], [[0.0, 5.0], [2.0, -1.0]], [[0.0, 2.0], [2.0, 5.0]]]	Pass
3	Calculate determinant based on the input by user and calculated minor matrices of each values in 0^{th} row.	Requires a parsed 3X3 matrix and a list of 2X2 minor matrices of each values in 0^{th} row	>Parameter input one: [[1.0, 1.0, 1.0], [0.0, 2.0, 5.0], [2.0, 5.0, -1.0]] >Parameter input two: [[[2.0, 5.0], [5.0, -1.0]], [[0.0, 5.0], [2.0, -1.0]], [[0.0, 2.0], [2.0, 5.0]]]	A determinant value of the 3X3 matrix	-21.0	Pass
4	Take a 2X2 matrix as input and return its determinant. Determinant can be calculated by ad – bc where: [[a, b], [c, d]]	Minor matrices are needed to be calculated before this function.	[[2.0, 5.0], [5.0, -1.0]]	A determinant of 2X2 matrix	-27.0	Pass
5	Take calculated determinant and return Boolean value. Return True if value is 0 (singular) and False if value is non-zero (non-singular)	Requires a calculated determinant of a matrix	-21.0	If the determinant is non-zero it should return False or else return True	False	Pass