REPORT

In this assignment we need to create a backend for the functions for our sheet. We created the functions for both uranary and binary operations for the sheet.

The lexer is unchanged but the parser returns a string in place of a sheet. The sheet is a cell matrix(list of list). Cell is either None(Empty) of a Float value.

For count operations None doesn't lead to any exception but for other operations whenever the cell with None value is accessed it returns an Empty Cell exception.

If the index for storing or accessing of elements in not in the sheet then ab exception of IndexOutofRange is shown.

If the ranges of binary operations are not compatible like [0,0]:[1,1] and [0,2]:[1,2] then an exception of IncompatibleRange is shown.

For operations max and min we have used base case of (-1000000000.) and (1000000000.) respectively.

Range of storage and access might overlapp so I have given the preferene to storage in the cases

The input is read from a csv file to get the required sheet to be passed to the functions. The size of the sheet has been passed as arguments along with the file from which input is read.

The command or the formuale are parsed one by one thus returning the updated sheet.