Prarthna Mohanraj 2017103062

Tanya Elizabeth Abraham 2017103068

Compiler Lab Project

This project designs a complier which is capable of performing number manipulation and Boolean comparisons. The compiler which is designed supports the basic arithmetic operations such as addition, subtraction, multiplication, and division as well as the conditional operators such as <, >, <=, >= , and ==. It is also capable of supporting variables from a to z. In addition, an intermediate code representation is produced (three address code format) in a separate text file. The text file contains information which shows how the expression is evaluated as well as the result of the program as the output.

Tools Used:

* LEX
  + Helps write programs whose control flow is directed by instances of regular expressions in the input stream
  + Main job is to break up an input stream into more usable elements (tokens)
  + well suited for editor-script type transformations and for segmenting input in preparation for a parsing routine
* YACC
  + Tool used to generate a parser
  + Translates a given Context Free Grammar specifications into a C implementation of a corresponding push down automaton
  + When the C program is compiled, it yields an executable parser

Compile instructions:

lex callex.l

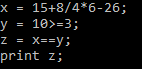
yacc calyacc.y

gcc y.tab.c -ll -ly

./a.out

Github Link: <https://github.com/TanyaAbraham/LabProject/tree/master>

Input:



Output:

