

CS 311: Design and Development of Programming Languages

Assignment 2

1) Chapter 4, problem numbers:

1, 3, 5

2)

- a. Design a state diagram to recognize one form of the comments of the C-based programming languages, those that begin with `/*` and end with `*/`.
- b. Write and test the code to implement the state diagram of part a.

3) Write and test a lexical analyzer (`lex`) similar to the one given in section 4.2. To test `lex`, write a test application that receives a simple program as its input (as a string) and calls `lex` to analyze all the lexemes of the input program (this application is similar to a syntax analyzer—but do not develop syntax analyzer’s functionalities!). You have to define a small set of “built in keywords” to be able to develop “lookup (lexeme)” function.