

TDT4205 Compiler Technology Problem Set 1

January 16, 2014

Problem 1

gcc: (Ubuntu/Linaro 4.6.3-1ubuntu5) 4.6.3

flex: 2.5.35

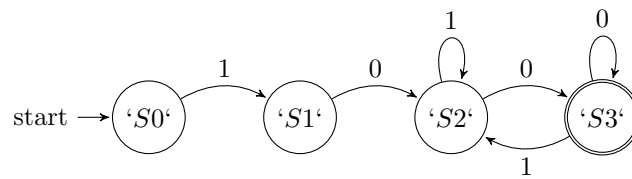
bison:(GNU Bison) 2.5

Problem 2

Compilers translate source code into executable machine code which may then be executed by separate commands, whereas an interpreter translates and executes one statement at a time. As a result, compilers perform a great deal more preprocessing than an interpreter.

Problem 3

a)



b) The language includes even binary numbers ≥ 4 , e.g. 100, 10100 or 1010101110001010010010110

	current state	input	next state
	S0	1	S1
	S1	0	S2
c)	S2	0	S3
	S2	1	S2
	S3	0	S3
	S3	1	S2

Problem 4