GANPAT UNIVERSITY
U.V. PATEL COLLEGE OF ENGINEERING
B. Tech Semester VII
Computer Engineering/ Information Technology
2CEIT701: Compiler Design

List of Experiments

Tools – Lex - YACC

Sr. No	Experiments	CO Mapping
1	Understand modules of the compilation process with the help of a program. (Pre-processor, Compiler, Assembler, Linker/Loader)	1, 4
2	Write a lex program to count the number of lines, tabs, characters, spaces, and words from the input C program. (Note: It is compulsory to read the input from the file and display the results in another file)	1
3	Write a lex program to count positive and negative numbers from the input file. (Note: It is compulsory to read the input from the file and display the results in another file)	1
4	Write a Lex program to validate arithmetic expressions and display a separate list of the identifiers and operators.	1
5	Understand the structure of the YACC program with examples.	2
6	Write a program to validate the variable declaration statement using Lex and YACC.	2,3
7	Write a program to implement a calculator using Lex and YACC.	2,3
8	Write a program to convert infix to postfix using Lex and YACC.	2,3
9	Write a program to validate the IF…. ELSE statement using Lex and YACC.	2,3

Course Outcomes:

CO1	Develop the lexical Analyzer for specific grammar
CO2	Design top-down and bottom-up parsers for specific given grammar
CO3	Develop syntax directed translation schemes
CO4	Develop algorithms to generate code for a target machine

Mapping of CO and PO:

COs	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12	PSO1	PSO2	PS03
CO1	3	3	3	1	1	0	0	0	1	0	0	0	3	0	0
CO2	3	3	3	1	1	0	0	0	1	0	0	0	2	0	0
CO3	3	3	3	1	0	0	0	0	1	0	0	0	1	0	0
CO4	3	3	3	1	1	0	0	0	1	0	0	0	0	1	0