

Compilers report

1) FlatB Programming Language Description

This is a subset of C.

It supports int data structure and int array data structure

There are mainly two blocks, declaration block and main statement block.

2) Syntax and Semantics (explain using CFG and examples)

3) Design of AST

There is a main class called. Astnode, all other nodes inherit from here.

4) Visitor Design Pattern and how it is used.

Visitor design pattern is used in interpreter and the

5) Design of Interpreter

6) Design of LLVM Code Generator

Code generator follows a dfs based approach,

7) Performance Comparison (in terms instructions and wall clock time) using your interpreter, lli and llc on 3 benchmark programs: bubblesort and 2 more non-trivial programs of your choice