CS420: Compiler Design

Fall, 2019

Optional Feature 4 : Code Optimization

- **Code optimization**

  Students who choose this option should implement code optimization feature in the program. Both of optimizations performed before code generation and after code generation can be admitted. Students are allowed to implement optimizations only after code generation, for their convenience, because the code generation is out of scope in this option.

  The implemented feature must perform at least two optimization techniques among compile time evaluation, loop unrolling, variable propagation, dead code elimination and so on.

  Optimized code must be exported before interpretation.

- **Expected Result for the interpreter implementation**

  Results of the implemented feature can be referred in lecture slides.

Requirement Specification

Functional	
Code optimization	The interpreter must export optimized code as a .txt file before interpretation. The optimized code must be the same as the original in semantic manner. At least two optimization techniques must be implemented.