

# Assignment 4

Please submit solutions on Blackboard by Monday, 24.03.2020 23:59h

## 4.1 Practical Assignment: Symbol Table Construction

This assignment requires you to construct the symbol table after the construction of the syntax tree. The following has to be done.

### 4.1.1 15%

Implement the function `find_globals` in `ir.c` to populate the global symbol table with

- a. Global Variables (5%)
- b. Functions (10%)

### 4.1.2 45%

Implement the function `bind_names` in `ir.c` to populate the local symbol tables with

- a. Parameters (15%)
- b. Local Variables (15%)

and link the entry pointers in its syntax tree nodes to their appropriate symbols (15%)

### 4.1.3 10%

Extend `bind_names` to create a global table of strings.

### 4.1.4 5%

Implement the function `destroy_symtab` to remove dynamically allocated symbol table data at the end of the compilation.