Assignment 6

Code Generation Part II

(Due:6/30/2013)

In programming assignment 5, we have used the parser and the type checker implemented in previous programming assignments as a base to generate real MIPS instructions for C-- programs.

Programming assignment 5 covers the basic features of code generation, including load/store instruction generation, activation record management, expression evaluation, and simple control statements. More features (as listed below) are required to be implemented in assignment #6.

* Short-circuit boolean expressions
* Variable initializations
* Procedure and function calls with parameters
* For loops
* Multiple dimensional arrays
* Implicit type conversions

PS: For variable initialization, we support only simple constant initializations, such as

Int I=1;

Float a=2.0;

PS: Extensive test cases will be posted one week before the deadline. Solution code for assignment#5 will be available after 6/15 (i.e. three days after due date).

**Submission requirements:**

1. DO NOT change the executable name.

2) Use the script file “tar.sh” to wrap up your assignment works into a single file. Then upload your packaged file to e3.

Usage: ./tar.sh source\_directory studentID1\_studentID2 (all student IDs in your team) version\_number

Example: ./tar.sh hw 9912345\_9912346 ver1

Output: 9912345\_9912346\_ver1.tar.bz2 (submit this file)

1. We grade the assignments on the linux1 server. Before summiting your assignment, you should make sure your version works correctly on linux1.
2. Please use **output.s** as the output assembly file name.

Use a separate e-mail to inform TAs about the students in your group. The TA responsible for this homework assignment is:

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