322 Compilers Assignment: 3-test Testing linearization

Your job: Write (at least) 15 test L3 programs and equivalent L2 programs.

Handin instructions:

Hand in your assignment by uploading it to the server at http://penghu.eecs.northwestern.edu:8123/. The uploaded file should be a gzipped tar file named name.3-test.tar.gz. The name should be your family name in all lowercase letters (except for the names He, Liu, or Wang, see below) unless you are pair programming, in which case it should be both family names in alphabetical order, separated by +. If your name has any non-alphabetic characters, remove them first. For example, if Conan O'Brien and Shawn Knowles-Carter were pair programming and handing in this assignment, they'd send in a tarfile named obrien+kowlescarter.3-test.tar.gz. If your family name is He, Liu, or Wang, then include your first name as well, but also without any spaces. For example, if your name is Liu Bolin, then use bolinliu as your name. And if Bolin and and Shawn team up, they'd submit bolinliu+kowlescarter.3-test.tar.gz.

The file must contain a single directory named 3-test containing the test cases.

The directory should contain triples of files, an input L3 program with the suffix .L3, a equivalent output L2 program with the suffix .L2, and an input file with the suffix .in. The .L2 file does not have to match exactly what your compiler ends up producing, but the two programs should behave equivalently in the two interpreters. The input .in file is optional; if it is not present the input will be empty (and thus read will always return 0). Note that the programs should behave equivalently on all inputs; the .in file is merely one example input to be used in testing.