

Unused functions and source code



Tuesday, May 23, 2023

11:56 AM

A list of the unused functions:

```
grep 'called 0' *.c.gcov > unused_fxns.txt
```

```
~/code/sublimed1dc_profile/unused_fxns.txt
```

I saved the output of

```
find src/*.c -exec gcov-mp-12 -b {} \;
```

```
~/code/sublimed1dc_profile/gcov_summary.txt
```

Changing model.c

```
par->lte_only = 1;
```

```
par->useCKC = 1;
```

Running the code:

```
(base) kdarnell@gs691-kdarnell sublimed1dc_profile % ./compile_sublimed1d
(base) kdarnell@gs691-kdarnell sublimed1dc_profile % ./sublimed1dc
libgcov profiling error:/Users/kdarnell/code/sublimed1dc_profile/src/model.gcda:overwriting an existing
profile data with a different checksum
(base) kdarnell@gs691-kdarnell sublimed1dc_profile % find src/*.c -exec gcov-mp-12 -b {} \; >
gcov_summ_2.txt
src/grid2hdf5.gcno:cannot open notes file
src/grid2hdf5.gcda:cannot open data file, assuming not executed
src/grid_old.gcno:cannot open notes file
src/grid_old.gcda:cannot open data file, assuming not executed
src/gridconvert.gcno:cannot open notes file
src/gridconvert.gcda:cannot open data file, assuming not executed
src/py_main.gcno:cannot open notes file
src/py_main.gcda:cannot open data file, assuming not executed
src/py_messages.gcno:cannot open notes file
src/py_messages.gcda:cannot open data file, assuming not executed
src/py_models.gcno:cannot open notes file
src/py_models.gcda:cannot open data file, assuming not executed
src/py_utils.gcno:cannot open notes file
src/py_utils.gcda:cannot open data file, assuming not executed
src/tree_random.gcno:cannot open notes file
src/tree_random.gcda:cannot open data file, assuming not executed
(base) kdarnell@gs691-kdarnell sublimed1dc_profile % grep 'called 0' *.c.gcov > unused_fxns_2.txt
```

Using BBedit to compare, there is no difference between unused_fxns.txt and unused_fxns_2.txt. There is some difference between gcov_summary.txt and gcov_summ_2.txt, (in model.c, molinit.c, run.c, solver.c) but readckc.c is still apparently unused.

CKC Test:

Uncommented code in solver.c (in the if statement on line 712) to write to 'output/elec_data.txt'. The .gcov says it was never executed and the file was never created.

The source code that was "assumed not executed" (see code above):

- src/grid_old.c
- src/gridconvert
- src/py_main
- src/py_messages
- src/py_models
- src/py_utils
- src/tree_random

Source code in gcov_summary.txt and gcov_summ_2.txt with "Lines executed:0.00%"

- 'src/grid2fits.c'
- 'src/gridio.c'
- 'src/popsin.c'
- 'src/predefgrid.c'
- 'src/raythrucells.c'
- 'src/readckc.c'
- 'src/smooth.c'
- 'src/tcpsocket.c'

CKC Tests:

Uncommented code in solver.c to write to 'output/elec_data.txt'. The .gcov says it was never executed and the file was never created.