

1 Program float_scan

1.1 Purpose

Scans the input file of IEEE floating point numbers for illegal values: infinities and not-a-number (NaN) values.

1.2 Usage

```
float_scan [options] input_filename
```

1.3 Options

-fix = Writes a copy of the input file to stdout (which should be redirected using '>'), replacing illegal values with 0. If this option is not used, the program just prints out a report.

-v = Verbose mode: print out index of each illegal value.

-skip n = Skip the first n floating point locations (i.e., the first 4*n bytes) in the file

1.4 Notes

N.B.: This program does NOT work on compressed files, nor does it work on byte-swapped files (e.g., files transferred between Sun/SGI/HP and Intel platforms)!

The program 'exit status' is 1 if any illegal values were found in the input file. If no errors were found, then the exit status is 0. You can check the exit status by using the shell variable \$status.

1.5 Example

A C-shell example:

```
float_scan fff
if ( $status == 1 ) then
    float_scan -fix fff > Elvis.Aaron.Presley
    rm -f fff
    mv Elvis.Aaron.Presley fff
endif
```