```
FREQ:3142
<bb 2>:
os_command = "uname -s -r";
pipe_22 = popen (&os_command, "r");
if (pipe_22 == 0B)
  goto <bb 3>; [30.00%]
else
  goto <bb 4>; [70.00%]

FREQ:2199
<bb 4>:
_25 = __fgets_alias (&os, 1024, pipe_22);
if (_25 == 0B)
  goto <bb 5>; [30.00%]
else
  goto <bb 6>; [70.00%]

FREQ:660
<bb 5>:
MEM[(char *)&os] = 0;

FREQ:2199
<bb 6>:
pclose (pipe_22);

FREQ:943
<bb 3>:
MEM[(char *)&os] = 0;
goto <bb 7>; [100.00%]

FREQ:3142
<bb 7>:
_27 = MEM[(const char *)&os];
if (_27 != 0)
  goto <bb 8>; [36.64%]
else
  goto <bb 10>; [63.36%]

FREQ:1151
<bb 8>:
_28 = strlen (&os);
_29 = _28 + 18446744073709551615;
_30 = &os + _29;
_31 = *_30;
if (_31 == 10)
  goto <bb 9>; [37.68%]
else
  goto <bb 10>; [62.32%]

FREQ:434
<bb 9>:
*_30 = 0;

FREQ:3142
<bb 10>:
_1 = strstr (&os, "Linux");
if (_1 != 0B)
  goto <bb 11>; [49.47%]
else
  goto <bb 74>; [50.53%]

FREQ:1554
<bb 11>:
MEM[(char *)&cache] = 0;
MEM[(char *)&model] = 0;
cpu_MHz[0] = 0;
model_name[0] = 0;
vendor_id[0] = 0;
info_32 = fopen ("/proc/cpuinfo", "r");
if (info_32 != 0B)
  goto <bb 55>; [73.26%]
else
  goto <bb 73>; [26.74%]

FREQ:1139
<bb 56>:
if (cpus_36 > 1)
  goto <bb 57>; [64.00%]
else
  goto <bb 60>; [36.00%]

FREQ:729
<bb 57>:
if (cpus_36 == 2)
  goto <bb 58>; [34.00%]
else
  goto <bb 59>; [66.00%]

FREQ:481
<bb 59>:
__builtin___sprintf_chk (&model, 1, 1024, "%d CPU", cpus_36);

FREQ:248
<bb 58>:
__builtin_memcpy (&model, "Dual", 5);
goto <bb 60>; [100.00%]

FREQ:1139
<bb 60>:
_79 = strlen (&model);
cp_80 = &model + _79;
_81 = vendor_id[0];
if (_81 != 0)
  goto <bb 61>; [50.00%]
else
  goto <bb 64>; [50.00%]

FREQ:569
<bb 61>:
if (&model != cp_80)
  goto <bb 62>; [70.00%]
else
  goto <bb 63>; [30.00%]

FREQ:399
<bb 62>:
cp_82 = cp_80 + 1;
*cp_80 = 32;

FREQ:569
<bb 63>:
# cp_83 = PHI <&model(61), cp_82(62)>
__builtin_strcpy (cp_83, &vendor_id);
_85 = strlen (&vendor_id);
cp_86 = cp_83 + _85;

FREQ:1139
<bb 64>:
# cp_88 = PHI <cp_80(60), cp_86(63)>
_87 = model_name[0];
if (_87 != 0)
  goto <bb 65>; [50.00%]
else
  goto <bb 68>; [50.00%]

FREQ:569
<bb 65>:
if (&model != cp_88)
  goto <bb 66>; [70.00%]
else
  goto <bb 67>; [30.00%]

FREQ:399
<bb 66>:
cp_89 = cp_88 + 1;
*cp_88 = 32;

FREQ:569
<bb 67>:
# cp_90 = PHI <&model(65), cp_89(66)>
__builtin_strcpy (cp_90, &model_name);
_92 = strlen (&model_name);
cp_93 = cp_90 + _92;

FREQ:1139
<bb 68>:
# cp_95 = PHI <cp_88(64), cp_93(67)>
_94 = cpu_MHz[0];
if (_94 != 0)
  goto <bb 69>; [50.00%]
else
  goto <bb 72>; [50.00%]

FREQ:569
<bb 69>:
if (&model != cp_95)
  goto <bb 70>; [70.00%]
else
  goto <bb 71>; [30.00%]

FREQ:399
<bb 70>:
cp_96 = cp_95 + 1;
*cp_95 = 32;

FREQ:569
<bb 71>:
# cp_101 = PHI <&model(69), cp_96(70)>
_97 = strtod (&cpu_MHz, 0B);
f_98 = (float) _97;
_99 = f_98 + 5.0e-1;
i_100 = (int) _99;
__builtin___sprintf_chk (&cpu_MHz, 1, 1024, "%dMHz", i_100);
__builtin_strcpy (cp_101, &cpu_MHz);

FREQ:1139
<bb 72>:
fclose (info_32);

FREQ:1588
<bb 74>:
model[0] = 0;
cache[0] = 0;

FREQ:1554
<bb 73>:
buffer ={v} {CLOBBER};
vendor_id ={v} {CLOBBER};
model_name ={v} {CLOBBER};
cpu_MHz ={v} {CLOBBER};
goto <bb 75>; [100.00%]

FREQ:3142
<bb 75>:
__builtin___sprintf_chk (&buffer, 1, 1024, "CPU                : %s\n", &model);
__printf_chk (1, "%s", &buffer);
if (write_to_file_9(D) != 0)
  goto <bb 76>; [36.64%]
else
  goto <bb 78>; [63.36%]

FREQ:1151
<bb 76>:
__builtin_fputs (&buffer, global_ofile_10(D));
__builtin___sprintf_chk (&buffer, 1, 1024, "L2 Cache           : %s\n", &cache);
__printf_chk (1, "%s", &buffer);
__builtin_fputs (&buffer, global_ofile_10(D));
__builtin___sprintf_chk (&buffer, 1, 1024, "OS                 : %s\n", &os);
__printf_chk (1, "%s", &buffer);
__builtin_fputs (&buffer, global_ofile_10(D));

FREQ:1991
<bb 78>:
__builtin___sprintf_chk (&buffer, 1, 1024, "L2 Cache           : %s\n", &cache);
__printf_chk (1, "%s", &buffer);
__builtin___sprintf_chk (&buffer, 1, 1024, "OS                 : %s\n", &os);
__printf_chk (1, "%s", &buffer);
goto <bb 77>; [100.00%]

FREQ:3142
<bb 77>:
buffer ={v} {CLOBBER};
os ={v} {CLOBBER};
model ={v} {CLOBBER};
cache ={v} {CLOBBER};
os_command ={v} {CLOBBER};
return;

FREQ:7591
<bb 55>:
# cpus_36 = PHI <cpus_103(54), 0(11)>
_75 = __fgets_alias (&buffer, 1024, info_32);
if (_75 != 0B)
  goto <bb 12>; [85.00%]
else
  goto <bb 56>; [15.00%]

FREQ:6452
<bb 12>:
_33 = strlen (&buffer);
buffer_end_34 = &buffer + _33;
_35 = strncmp (&buffer, "processor", 9);
if (_35 == 0)
  goto <bb 13>; [50.00%]
else
  goto <bb 14>; [50.00%]

FREQ:3226
<bb 14>:
_38 = strncmp (&buffer, "vendor_id", 9);
if (_38 == 0)
  goto <bb 15>; [34.00%]
else
  goto <bb 24>; [66.00%]

FREQ:2129
<bb 24>:
_47 = strncmp (&buffer, "model name", 10);
if (_47 == 0)
  goto <bb 25>; [34.00%]
else
  goto <bb 34>; [66.00%]

FREQ:1405
<bb 34>:
_56 = strncmp (&buffer, "cpu MHz", 7);
if (_56 == 0)
  goto <bb 35>; [34.00%]
else
  goto <bb 44>; [66.00%]

FREQ:927
<bb 44>:
_65 = strncmp (&buffer, "cache size", 10);
if (_65 == 0)
  goto <bb 45>; [34.00%]
else
  goto <bb 54>; [66.00%]

FREQ:316
<bb 45>:
# cp_222 = PHI <&MEM[(void *)&buffer + 10B](44)>
if (buffer_end_34 > cp_222)
  goto <bb 46>; [92.50%]
else
  goto <bb 51>; [7.50%]

FREQ:479
<bb 35>:
# cp_78 = PHI <&MEM[(void *)&buffer + 7B](34)>
if (buffer_end_34 > cp_78)
  goto <bb 36>; [92.50%]
else
  goto <bb 41>; [7.50%]

FREQ:726
<bb 25>:
# cp_102 = PHI <&MEM[(void *)&buffer + 10B](24)>
if (buffer_end_34 > cp_102)
  goto <bb 26>; [92.50%]
else
  goto <bb 31>; [7.50%]

FREQ:1100
<bb 15>:
# cp_233 = PHI <&MEM[(void *)&buffer + 9B](14)>
if (buffer_end_34 > cp_233)
  goto <bb 16>; [92.50%]
else
  goto <bb 21>; [7.50%]

FREQ:292
<bb 46>:
_223 = *cp_222;
_221 = _223 == 32;
_220 = _223 == 58;
_218 = _221 | _220;
_219 = _223 == 9;
_217 = _218 | _219;
if (_217 != 0)
  goto <bb 47>; [96.25%]
else
  goto <bb 49>; [3.75%]

FREQ:443
<bb 36>:
_24 = *cp_78;
_142 = _24 == 32;
_23 = _24 == 58;
_120 = _142 | _23;
_26 = _24 == 9;
_224 = _120 | _26;
if (_224 != 0)
  goto <bb 37>; [96.25%]
else
  goto <bb 39>; [3.75%]

FREQ:672
<bb 26>:
_182 = *cp_102;
_180 = _182 == 32;
_139 = _182 == 58;
_138 = _180 | _139;
_21 = _182 == 9;
_20 = _138 | _21;
if (_20 != 0)
  goto <bb 27>; [96.25%]
else
  goto <bb 29>; [3.75%]

FREQ:1018
<bb 16>:
_232 = *cp_233;
_231 = _232 == 32;
_230 = _232 == 58;
_229 = _231 | _230;
_84 = _232 == 9;
_91 = _229 | _84;
if (_91 != 0)
  goto <bb 17>; [96.25%]
else
  goto <bb 19>; [3.75%]

FREQ:2560
<bb 47>:
# cp_193 = PHI <cp_67(48), cp_222(46)>
cp_67 = cp_193 + 1;
if (buffer_end_34 > cp_67)
  goto <bb 48>; [92.50%]
else
  goto <bb 51>; [7.50%]

FREQ:2367
<bb 48>:
_68 = *cp_67;
_69 = _68 == 32;
_70 = _68 == 58;
_71 = _69 | _70;
_239 = _68 == 9;
_236 = _71 | _239;
if (_236 != 0)
  goto <bb 47>; [96.25%]
else
  goto <bb 49>; [3.75%]

FREQ:3878
<bb 37>:
# cp_212 = PHI <cp_58(38), cp_78(36)>
cp_58 = cp_212 + 1;
if (buffer_end_34 > cp_58)
  goto <bb 38>; [92.50%]
else
  goto <bb 41>; [7.50%]

FREQ:3586
<bb 38>:
_59 = *cp_58;
_60 = _59 == 32;
_61 = _59 == 58;
_62 = _60 | _61;
_72 = _59 == 9;
_242 = _62 | _72;
if (_242 != 0)
  goto <bb 37>; [96.25%]
else
  goto <bb 39>; [3.75%]

FREQ:5876
<bb 27>:
# cp_215 = PHI <cp_49(28), cp_102(26)>
cp_49 = cp_215 + 1;
if (buffer_end_34 > cp_49)
  goto <bb 28>; [92.50%]
else
  goto <bb 31>; [7.50%]

FREQ:5433
<bb 28>:
_50 = *cp_49;
_51 = _50 == 32;
_52 = _50 == 58;
_53 = _51 | _52;
_54 = _50 == 9;
_63 = _53 | _54;
if (_63 != 0)
  goto <bb 27>; [96.25%]
else
  goto <bb 29>; [3.75%]

FREQ:8903
<bb 17>:
# cp_216 = PHI <cp_40(18), cp_233(16)>
cp_40 = cp_216 + 1;
if (buffer_end_34 > cp_40)
  goto <bb 18>; [92.50%]
else
  goto <bb 21>; [7.50%]

FREQ:8233
<bb 18>:
_41 = *cp_40;
_42 = _41 == 32;
_43 = _41 == 58;
_44 = _42 | _43;
_76 = _41 == 9;
_45 = _44 | _76;
if (_45 != 0)
  goto <bb 17>; [96.25%]
else
  goto <bb 19>; [3.75%]

FREQ:99
<bb 49>:
# cp_210 = PHI <cp_67(48), cp_222(46)>
if (buffer_end_34 > cp_210)
  goto <bb 50>; [100.00%]
else
  goto <bb 51>; [0.00%]

FREQ:151
<bb 39>:
# cp_228 = PHI <cp_58(38), cp_78(36)>
if (buffer_end_34 > cp_228)
  goto <bb 40>; [100.00%]
else
  goto <bb 41>; [0.00%]

FREQ:229
<bb 29>:
# cp_213 = PHI <cp_49(28), cp_102(26)>
if (buffer_end_34 > cp_213)
  goto <bb 30>; [100.00%]
else
  goto <bb 31>; [0.00%]

FREQ:347
<bb 19>:
# cp_214 = PHI <cp_40(18), cp_233(16)>
if (buffer_end_34 > cp_214)
  goto <bb 20>; [100.00%]
else
  goto <bb 21>; [0.00%]

FREQ:104
<bb 50>:
__builtin___strcpy_chk (&cache, cp_210, 1024);

FREQ:158
<bb 40>:
__builtin___strcpy_chk (&cpu_MHz, cp_228, 1024);

FREQ:239
<bb 30>:
__builtin___strcpy_chk (&model_name, cp_213, 1024);

FREQ:362
<bb 20>:
__builtin___strcpy_chk (&vendor_id, cp_214, 1024);

FREQ:315
<bb 51>:
_74 = MEM[(const char *)&cache];
if (_74 != 0)
  goto <bb 52>; [33.00%]
else
  goto <bb 54>; [67.00%]

FREQ:478
<bb 41>:
_64 = MEM[(const char *)&cpu_MHz];
if (_64 != 0)
  goto <bb 42>; [33.00%]
else
  goto <bb 54>; [67.00%]

FREQ:724
<bb 31>:
_55 = MEM[(const char *)&model_name];
if (_55 != 0)
  goto <bb 32>; [33.00%]
else
  goto <bb 54>; [67.00%]

FREQ:1097
<bb 21>:
_46 = MEM[(const char *)&vendor_id];
if (_46 != 0)
  goto <bb 22>; [33.00%]
else
  goto <bb 54>; [67.00%]

FREQ:104
<bb 52>:
_116 = strlen (&cache);
_117 = _116 + 18446744073709551615;
_118 = &cache + _117;
_119 = *_118;
if (_119 == 10)
  goto <bb 53>; [37.68%]
else
  goto <bb 54>; [62.32%]

FREQ:158
<bb 42>:
_112 = strlen (&cpu_MHz);
_113 = _112 + 18446744073709551615;
_114 = &cpu_MHz + _113;
_115 = *_114;
if (_115 == 10)
  goto <bb 43>; [37.68%]
else
  goto <bb 54>; [62.32%]

FREQ:239
<bb 32>:
_108 = strlen (&model_name);
_109 = _108 + 18446744073709551615;
_110 = &model_name + _109;
_111 = *_110;
if (_111 == 10)
  goto <bb 33>; [37.68%]
else
  goto <bb 54>; [62.32%]

FREQ:362
<bb 22>:
_104 = strlen (&vendor_id);
_105 = _104 + 18446744073709551615;
_106 = &vendor_id + _105;
_107 = *_106;
if (_107 == 10)
  goto <bb 23>; [37.68%]
else
  goto <bb 54>; [62.32%]

FREQ:39
<bb 53>:
*_118 = 0;

FREQ:59
<bb 43>:
*_114 = 0;
goto <bb 54>; [100.00%]

FREQ:90
<bb 33>:
*_110 = 0;
goto <bb 54>; [100.00%]

FREQ:136
<bb 23>:
*_106 = 0;
goto <bb 54>; [100.00%]

FREQ:3226
<bb 13>:
cpus_37 = cpus_36 + 1;
goto <bb 54>; [100.00%]

FREQ:6451
<bb 54>:
# cpus_103 = PHI <cpus_36(21), cpus_37(13), cpus_36(23), cpus_36(31), cpus_36(33), cpus_36(41), cpus_36(43), cpus_36(44), cpus_36(51), cpus_36(53), cpus_36(22), cpus_36(32), cpus_36(42), cpus_36(52)>
```