```
RegexStartUp.cpp
                        Wed Apr 26 20:07:12 2017
    1: // Copyright 2017 Patrick Muldoon
    2: #include <vector>
    3: #include <iostream>
    4: #include <fstream>
    5: #include <string>
    6: #include "intouch.hpp"
    7:
    8: int main(int argc, char* argv[]) {
               if(argc != 2) {
    9:
   10:
                        throw std::runtime error("Wrong number of arguments.");
                        std::cout << "Usage " << argv[0] << "logfile" << std::end
   11:
1;
   12:
                        exit(1);
   13:
   14:
               std::string logfile = argv[1];
   15:
   16:
               std::ifstream fin;
   17:
               fin.open(logfile);
   18:
               if(fin.fail()) {
                        std::cerr << "Error opening file " << logfile << std::end</pre>
   19:
1;
   20:
                        exit(1);
   21:
               }
   22:
   23:
               std::string outfile(argv[1]);
               outfile += ".rpt";
   24:
               std::ofstream fout;
   25:
   26:
               fout.open(outfile.c str());
   27:
               if(fout.fail()) {
   28:
                        std::cerr << "Error opening output file" << outfile << st</pre>
d::endl;
   29:
                        exit(1);
   30:
               }
   31:
   32:
               unsigned int lines scanned = 0, boots started = 0, boots finished
   0;
               unsigned int services started = 0, services completed = 0;
   33:
               int count = 0, counter = 0;
   34:
   35:
               std::string line;
               std::vector<Intouch> bootups;
   36:
   37:
               std::vector<Softload> softloads;
   38:
               int size = 0;
   39:
   40:
               while(std::getline(fin, line)) {
   41:
                        ++lines scanned;
                        if(regex match(line, StartRegex)) {
   42:
   43:
                                ++boots started;
   44:
                                Intouch it(line, logfile, lines_scanned);
   45:
                                bootups.push back(it);
   46:
                                while(std::getline(fin, line) && count == 0){
   47:
                                         ++lines_scanned;
   48:
                                         if(regex_match(line, StartRegex)){
   49:
                                                 ++boots_started;
   50:
                                                 Intouch its(line, logfile, lines_
scanned);
   51:
                                                 bootups.push_back(its);
   52:
                                         }else if(regex_match(line, ServiceStart))
{
   53:
                                                 ++services started;
```

Services s(line, logfile, lines_s

bootups.back().a.push back(s);

}else if(regex_match(line, ServiceSuccess

++services_completed;

54:

56:

)){ 57:

canned);
55:

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                         Wed Apr 26 20:07:12 2017
                                                            2
   58:
                                                   std::string compare;
   59:
                                                   boost::smatch sm;
   60:
                                                   boost::regex_match(line, sm, Serv
iceSuccess);
   61:
                                                   compare = sm[1];
                                                   for(int i = 0; i < bootups.back()</pre>
   62:
.a.size(); ++i){
                                                            if(bootups.back().a[i].ge
   63:
tServiceName() == compare){
                                                                     bootups.back().a.
at(i).ServiceBoot(line, lines scanned);
                                                            }
   66:
   67:
                                           }else if(regex match(line, SucceededRegex
))
   {
   68:
                                                   ++boots finished;
                                                   bootups.back().BootSuccess(line,
   69:
lines_scanned);
   70:
                                                   ++lines scanned;
                                                   count++;
   71:
   72:
                                                   services_started = 24;
   73:
                                                   services completed =24;
   74:
                                           }
   75:
                         }else if(regex match(line, SucceededRegex)) {
   76:
   77:
                                                   ++boots finished;
                                                   bootups.back().BootSuccess(line,
   78:
lines scanned);
   79:
                                                   ++lines scanned;
   80:
                                                   count++;
   81:
                         } else if(regex_match(line, SoftLoadBegin)){
   82:
                                  std::cout << "softload start\n";</pre>
   83:
                                  Softload soft(line, logfile, lines_scanned);
   84:
                                  softloads.push_back(soft);
                                  while(softloads.back().getSuccess() == false){
   85:
   86:
                                           std::getline(fin, line);
   87:
                                           ++lines scanned;
   88:
                                           if(regex match(line, Original)){
                                                   softloads.back().Originalver(line
   89:
);
   90:
                                           } else if(regex match(line, New)){
   91:
                                                   softloads.back().Newver(line);
   92:
                                           } else if(regex_match(line, SoftLoadEnd))
                                                   softloads.back().SoftloadSuccess(
line, lines scanned);
   94:
                                                   counter++;
   95:
                                           }
   96:
                                  }
   97:
                         }
   98:
   99:
                         count = 0;
  100:
                }
  101:
                std::cout << "here\n";</pre>
  102:
                for(unsigned int j = 0; j < bootups.size()-1; ++j) {
                         fout << bootups[j] << std::endl;
fout << "Services" << std::endl;</pre>
  103:
  104:
                         if(bootups[j].a.empty()){
  105:
                                  std::cout << "no services\n";</pre>
  106:
  107:
                                  fout << "There is no services due to an incomplet
e boot\n";
  108:
                         }
  109:
                         else{
                                  for(unsigned int i = 0; i < bootups[j].a.size();</pre>
  110:
++i){
```

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  111:
                                             fout << bootups[j].a[i];</pre>
  112:
  113:
  114:
                                   fout << "\t*** Services not successfully started:</pre>
  115:
                                   for(unsigned int i = 0; i < bootups[j].a.size()-1</pre>
; ++i){
  116:
                                            if(bootups[j].a[i].getSuccess() == false)
  117:
                                                      fout << bootups[j].a[i].getServic</pre>
eName();
  118:
                                            }
  119:
                                   }
  120:
                          if(size < counter){</pre>
  121:
                                   if(bootups[j].getEndLine() < softloads.at(size).g</pre>
  122:
etStartLine()){
  123:
                                            fout << std::endl;</pre>
                                            fout << "=== Softload ===" << std::endl;</pre>
  124:
  125:
                                            fout << softloads.at(size).getStartLine()</pre>
 << "(" << softloads.at(size).getFileName()</pre>
                                             << ")" << " : " << softloads.at(size).get</pre>
  126:
StartTime() << " Softload Start" << std::endl;</pre>
                                            fout << "\t0riginal Version ==> " << soft</pre>
loads.at(size).getOriginal() << std::endl;</pre>
                                            fout << "\tNew Version ==> " << softloads</pre>
.at(size).getNew() << std::endl;</pre>
                                            fout << "\tElapsed Time ==> " << std::end</pre>
  129:
1;
  130:
                                            fout << softloads.at(size).getEndLine() <</pre>
< "(" << softloads.at(size).getFileName()</pre>
                                             << ")" << " : " << softloads.at(size).get</pre>
  131:
EndTime() << "Softload Completed" << std::endl;</pre>
  132:
                                            size++;
  133:
                                   }
  134:
  135:
                          fout << std::endl;</pre>
  136:
                 fout << bootups[bootups.size() - 1] << std::endl;</pre>
  137:
                 fout << "Services" << std::endl;</pre>
  138:
                 for(unsigned int i = 0; i < bootups[bootups.size() -1].a.size();</pre>
  139:
++i){
                          fout << bootups[bootups.size()-1].a[i];</pre>
  140:
  141:
                 }
                 fout << "\t*** Services not successfully started: ";</pre>
  142:
                 for(unsigned int i = 0; i < bootups[bootups.size()-1].a.size(); +</pre>
  143:
+i){
  144:
                          if(bootups[bootups.size()-1].a[i].getSuccess() == false){
  145:
                                   fout << bootups[bootups.size()-1].a[i].getService</pre>
Name();
  146:
                          }
  147:
  148:
                 fin.close();
  149:
                 fout.close();
  150: }
```