Eli Sobylak

30-sept-15

Ch 1: 1.4, 1.5, 1.7, 1.8, 1.12

1.4

pgm1\_4.cpp

/\* This program will take a file a read through it to see if there is an #include statement, it will then output the #include into a new file called output. I wasn’t quite sure what the question was asking or and I had to clarify with multiple colleagues. I was not able to get the output file to have the whole file and the related #include statements put in its place. \*/

#include <iostream>

#include <string>

#include <string.h>

#include <iostream>

#include <stdio.h>

#include <stdlib.h>

#include <unistd.h>

using namespace std;

bool chkInclude(string in) {

const char \*cs = in.c\_str();

if (strncmp(cs, "#include", 8) == 0) {

cout << "It was true" << endl;

return true;

}

else {

cout << "it was false" << endl;

return false;

}

}

int main(int argc, char\*\* argv) {

string s;

ssize\_t ssz;

size\_t sz;

char \*buff = NULL;

if (argc != 3) {

printf("Usage: openRW infile outfile\n");

exit(1);

}

FILE \*r\_fd = fopen(argv[1], "r");

FILE \*w\_fd = fopen(argv[2], "w");

if (r\_fd == NULL || w\_fd == NULL) {

printf("Error on open file(s)\n");

exit(1);

}

while ((ssz = getline(&buff, &sz, r\_fd)) > 0) {

cout << "checking if true" << endl;

if(chkInclude(buff) == true){

fwrite(buff, ssz, sizeof(char), w\_fd);

cout << "Look in the " << argv[2] << " file for the results" << endl;

}

}

}

1.5

numOnes.cpp

/\* This program will take any number N for an input and then output it in its binary representation, when read from bottom to top. In addition, it will also output the number of 1s in N \*/

#include <iostream>

using namespace std;

/\*int userNum() {

return n;

}

\*/

int oneCounter = 1;

void numOnes(int n) {

if(n == 0) {

cout << "0\n";

}

else if(n == 1) {

cout << "1\n";

//oneCounter = oneCounter + 1;

cout << "Number of ones in the binary representation of N is: " << oneCounter << "\n";

}

else {

cout << n % 2 << "\n";

if(n % 2 == 1) {

oneCounter = oneCounter + 1;

}

//oneCounter = oneCounter + 1;

numOnes(n/2);

//cout << n % 2 << "\n";

//numOnes(n%2);

//cout << main(n%2);

}

}

int main() {

int n;

cout << "Enter a number: ";

cin >> n;

//int n = 5;

numOnes(n);

return 0;

}

See hw2\_part2\_sobylak.txt for problems 1.7,1.8,1.12