These must be completed and shown to your lab TA by the start of your next lab, or you will not receive credit for the lab!.

Pointer introduction: http://www.functionx.com/cpp/Lesson13.htm

1. Compile and run the following program and fill in the blanks:

```
#include <iostream>
using namespace std;

int main () {
  int x = 5, y = 15;
  int * p1, * p2;

  p1 = &x;      // x contains _____; y contains _____

  p2 = &y;      // x contains _____; y contains _____

  *p1 = 5;      // x contains _____; y contains _____

  *p1 = *p2;    // x contains _____; y contains _____

  p2 = p1;      // x contains _____; y contains _____

  *p1 = *p2+10; // x contains _____; y contains _____
  return 0;
}
```

2. Examine the following code (A copy is also available in the file you downloaded):

```
#include <iostream>
using namespace std;
int a = 7;
int b = 6;
int* c = &b;
void test( int& x, int y, int*& z ) {
  x++;
  y++;
  z= &a;
}
int main() {
  test(a,b,c);
  cout << a << " " << b << " " << *c << endl;
  return 0;
}
```

What happens when you modify the test arguments? Try changing the various arguments from pass-by-reference to pass-by-value and vice versa. What happens? What happens if you make b a pointer? What happens if you make y a pointer? What other changes you made in your code in each case? (You can draw a memory diagram for yourself to keep track of contents of each memory location.)

Be sure to show your written work to your TA!

3. Complete and debug the `CDate` class (available on the course web page under Lab 2).