

# CS 149 Logic Exercises

1. Rewrite each of the following code snippets in a simpler form.

(a)

```
if (!isDone == false) {  
    doSomething();  
}
```

(b)

```
if (a < b) {  
  
} else {  
    doSomething();  
}
```

(c)

```
if (!(a < b || a <= c)) {  
    doSomething();  
}
```

(d)

```
if (isDone) {  
    a = 7;  
} else if (!isDone) {  
    a = 12;  
}
```

(e)

```
if ((a < 100 || a > 50) || isDone)
{
    doSomething();
}
```

2. Explain why the following methods will not compile.

(a)

```
public static int getIntegerFromUser(Scanner in) {

    int nextInt;

    if (in.hasNextInt()) {
        nextInt = in.nextInt();
        in.nextLine(); // Deal with "scanner bug".
        return nextInt;
    }

}
```

```
public static int tripleIfMoreThan10(int number) {

    int result;

    if (number > 10) {
        result = number * 3;
    }

    return result;

}
```