1. Textbook exercise 3.5 (assuming integer division rounds down, thus \(x/:=2\) with \(x=9\) gives \(x=4\))

2. Textbook exercise 3.9 (assuming this code occurs in a function or method body, first determine where the variables are stored)

3. Consider the following C++ program fragment:

   ```cpp
   myClass A;
   int main()
   {
   ...
   myClass *B = new myClass();
   B->data = A.data;
   myClass A;
   A.data = B->data;
   ...
   delete B;
   ...
   }
   ```

   a. What is the storage allocation (static/stack/dynamic) for the A and B objects?

   b. Draw the timeline of the binding lifetimes and object lifetimes of A and B.

4. Consider the following C program:

   ```c
   #include <stdio.h>
   int main()
   {
   int a = 2, x;
   { int b = 1;
     printf("b=%d\n", b);
   }
   { int c;
     printf("c=%d\n", c);
   }
   printf("x[1]=%d\n", (&x)[1]);
   }
   ```
a. Compile and run on linprog. What are the values printed? Explain why the value of c is not “random”. Explain why x[1] is not “random”.

b. Can you find a non-Linux platform on which the value of x[1] is different? Hint: try MSVC++, GCC or CC on Solaris, GCC on Mac OS X, …

5. Textbook exercise 3.17