Subject: prepare for your upcoming CS78 cybersecurity class at Santa Monica College
From: MORGAN_DAVID@smc.edu
Date: 10/11/2017 3:44 PM
CC: dmorgan@world.oberlin.edu

Hi

The CS78 class in which you are enrolled at Santa Monica College holds its first meeting Wednesday, October 25. It is a compressed, hybrid class-- 16 weeks of material covered in 8 weeks, with 8 class meetings on campus and an equivalent amount of material delivered online. It will be concentrated/intense, so I want to get you started on some things now, that you should do before October 25:

1. two books
2. two lectures
3. five virtual machines
4. expectations/prerequisites

1. books - one you should read and another you should get before October 25

To read: Secrets and Lies, by Bruce Schneier
To get: Practical Unix & Internet Security, 3rd Edition; Garfinkel, Spafford, Schwartz; O'Reilly & Associates, 2003, ISBN 0596003234

I emailed CS78 students September 12 asking you to read the former, but the roster has grown so I repeat the request in this excerpt from the earlier email message:

"[Secrets and Lies is] narrative rather than technical, easy to read, and quite interesting. The book appeared in 2000 but there was a 2015 '15th Anniversary Edition.' The latter is preferable. I would like you to read it before the class starts next month. You'll like [it]. I look forward to seeing you."

2. two lectures you should listen to online before October 25

First, on general considerations concerning the thing we're going to study, namely
 computer security?
 information security?
 information assurance?
 computer assurance?

What to call it? Listen to the lecture here in a browser that supports Flash:

http://homepage.smc.edu/morgan_david/narrated/s02-security-general/s02-security-general.htm

Second, how users access resources. When you read a file, do you really read it? What does? What do you have to do with it? Listen to the lecture at:

http://homepage.smc.edu/morgan_david/linux/a03.2-user-process-resource.pdf

3. preparations you should make for utilizing virtual machines I'll supply

You will perform some hands-on lab exercises in prepared VMware virtual machines that I will provide. Your two tasks:

 - now, get VMware installed on a computer available to you outside class
 - soon, get my virtual machines for it to run

Information on doing both is at:

http://homepage.smc.edu/morgan_david/cs78/install-vmware.htm

The VMs are large. I will put them on a server from which you could download them. Since that may be slow, I will also bring them to class on several USB hard drives. A student could connect my drive externally to his device and copy the files directly. Several students will be able to do this simultaneously during our class meeting. I encourage you to bring your device, on which to put my VMs, to the first meeting.

4. a word on expectations/prerequisites

The SMC catalog lists for CS78 no prerequisite, and CS70 as "advisory." CS70 is the networking class I teach. For some of the things we will study, those that involve networks, you should have taken CS70 or know networking from other experience. Security is a cross-OS subject. It does not belong to Windows, OS X, linux, or any other platform. But to study it you have to run some software on some platform. I will use linux, stressing the concept more than the commands that bring it to view. But knowledge of linux, and what the commands are doing (which I will try to describe verbally as I use them), is a big plus.

David Morgan
instructor
dmorgan@world.oberlin.edu