Activity: Building Strong Passwords

Part 1: Choosing New Passwords

Websites will sometimes require that new passwords meet certain requirements. Some websites just sest a minimum length, but others have many requirements. For example, Chase Bank requires that new passwords meet these requirements:

- ✓ Must be 8-32 characters long
- ✓ Must include at least two of the following elements:
    - o At least one letter (upper or lowercase)
    - o At least one number
    - o At least one special character from the following: # $ % ' ^ , ( ) * + . : ! = ? @ /] [_ ; { } ~
- ✓ Must be different than your previous five Passwords
- ✓ Must not match your User ID
- ✓ Must not use the name of the financial institution (for example: JPM, MORGAN, CHASE)
- ✓ Must not be a commonly used password (for example: password1)

1. Why does Chase require that passwords be at least 8 characters long? Why are longer passwords better?

2. Why does Chase require that the password have at least one letter, one number, and one special character?

3. Make up 5 new passwords that meet the requirements and write them in the first column on page 2. *(Then come back here for Question 4!)*

4. Make up a password that meets these requirements but would still be easy for someone to guess. *(For example: Think of one that someone who knows a little bit about you could guess.)*

Part 2: Measuring Password Strength

What does it mean for a password to be "strong"? The requirements from Part 1 are designed to prevent you from choosing a weak password. Some websites also have a "password meter" to tell you how strong your password is before you submit it.

A. Go to this website: https://cups.cs.cmu.edu/meter/
B. Check the box to "Show Password"
C. *Carefully* type each password from Column 1 into the password field and complete Columns 2 and 3

Password (Part 1)	What color was the bar? *(e.g. gray, red, dark green)*	What was the detailed feedback?
1.		
2.		
3.		
4.		
5.		

Part 3: Passing It On

In 2-3 sentences, **what advice would you give to someone** about choosing a password?