Snooze++: Day One!

Today's Schedule

9:00 - 9:??	• Assessment

9:?? - 11:45	• Variables, Main Function, Import Lesson
	• Complete Game Plan: Getting Started
	  ○ Setting Up Your First Program
	  ○ Writing C++ Code
	  ○ Variables
	  ○ Naming and Using Variables
	  ○ Variable Types
	• Read and Complete Worksheet Sections I-IV
	• Input/Output Lesson

11:45 - 1:00	• Lunch

1:00 - 2:30	• Complete Game Plan: Getting Started
	  ○ Input
	  ○ ** Optional: Using Header Files
	• Complete Game Plan: Story Teller
	  ○ Creating a Story Program
	  ○ Replacing Words
	  ○ User Input

2:30 - 3:15	• Outdoor Break

3:15 - 4:45	• Conditionals (if/else) Lesson
	• Complete Game Plan: Control Flow
	  ○ Arithmetic Operators
	  ○ If Statements
	  ○ Conditions
	• Complete Worksheet Section V

I. How these Worksheets Work

In addition to Game Plan, you will be using this worksheet as a supplement to fully understand the material. After finishing a challenge, please raise your flag and I will come check.

The bonus challenges are **optional**, and are meant to **challenge you** if you would like to apply your new knowledge. Do NOT work on the bonus challenges until you have finished all the regular challenges. Do NOT work on past bonus challenges unless you are completely finished with everything else on the schedule block.

II. Assessment

Before we start, we're going to do a quick assessment to see where everyone is. This assessment is meant to be challenging, so don't worry if you cannot answer most or any of the questions!

III. Challenge One: Making New Projects

This challenge is meant to introduce you to Visual studio and how to make and name new projects and classes.

1. Create a new C++ project from Visual Studio, and call it "Setup1."
2. Create another project from Visual Studio and call it "Setup2."
3. Open up your finder. Your projects should be saved in a folder called "repos" which is pinned to the left hand side.

IV. Challenge Two: Main Function

1. Create a new file. Import the correct headers (you need **#include "pch.h"**, **#include <iostream>**, **#include <string>**, and **using namespace std;**). Inside the main function, copy and paste the following code:

   ```
   cout << "Hello, world!" << endl;
   ```

   Run your program!

V. Challenge Three: Variables

1. Write a program that declares the following variables by choosing the correct data types. Fill out the information however you please.
   a. **name**: your first and last name
   b. **age**: your age

c. **likesDogs**: whether or not you like dogs

2. **Bonus Challenge**: ageDetailed: your age, except using decimals to be more precise. (*Hint: you can use this calculator to see how many days it has been since your last birthday. Remember, there are 365 days in a year, so you might have to use some division!)*
3. **Bonus Challenge**: Add your own variables!

VI. Challenge Four: Conditionals (if/else Statements)

1. Rate my Dog: Ask the user to rate dogs from 1-10. If the user rates a number less than 1 or greater than 10, print that the rating is out of bounds. If the user rates dogs as 7 or under, print “cat nerd.” If the user rates dogs as a number 8-10, print “smart answer!”
2. **Bonus Challenge**: Write your own text-based adventure game, using at least one switch statement and one if-else statement!

Congrats on finishing Day One! See you tomorrow!