

Missouri State University

Direct Instruction Lesson Plan Format (adjust as needed to fit your instructional format)

School District: Teacher's Name: Class Grade Level (s):

Lesson Name: Intro to Computers and Programming – Part 1 Lesson: Coding/Coding Accommodations: Material(s):

• "Computer Parts" worksheet

Time allotment (varies according to grade level): 50 minutes for lower levels

MLS Standards:

Learning Goal(s):

- Define the basic parts of a computer and describe their specific purposes.
- Explain how the hardware parts of the computer work together to function as a whole.

Objective(s):

- Associate the function of the following computer components with their uses.
 - o Mouse
 - Keyboard
 - o Monitor
 - o Motherboard
 - Central Processing Unit (CPU)
 - Graphic Processing Unit (GPU) for older grades or those with questions about graphics cards
 - Random Access Memory (RAM)
 - Hard drive (Storage)
 - Power Supply
 - o Fans and Heat Sinks

Background information and/or Activate Prior Knowledge:

- Ask students to tell you something they know about computers.
 - A good path to lead them down is that there are inside parts and outside parts this being for younger grades. This meaning there are parts that we can interact

Missouri State University

with (mouse, keyboard, and monitor) and parts that only the computer interacts with - everything else.

- For older grades, they may talk about storage, how the tower is separate from the screen, and what they may know about what is inside the tower case.
 - It is likely that some of these students, especially 8th graders have "built their own" computers. They would have been able to pick out a case (tower) and pick out all the specific parts to put into it. Specifically, students who play pc games may have picked out high-powered graphics cards. Those can be discussed when talking about the CPU of a computer. Graphics cards are not necessary for a functioning computer, but they serve a unique purpose.

Introduction/Anticipatory Set/Engage:

Teaching (I do):

- Go through each of the computer parts and their descriptions (below) and ask the students to fill out the "Computer Parts" worksheet as you go.
 - This lesson does provides a lot of information, but not a lot of discovery or other work, How can I fix this? Does it need to be fixed?

Guided Practice (We do):

•

Group/Independent Practice (You do):

•

Assessment (Formative or Summative) Questions/questioning strategies:

Notes, Reflections, Attachments