

Coding For Good Badges

Glossary

Algorithm - a list of steps to solve a problem or complete a task. For example, when you follow the steps of a recipe, you're using an algorithm.

App (short for application) - a software program that runs on your computer, tablet, or phone.

App features - parts of an app. They could be things like using the camera, a welcome video, a help page, or a way for app users to connect with friends.

Code - the language that computer scientists create and use to tell computers what to do. Beginning programmers usually start coding with block-based coding (visual blocks that link together) to build their algorithms. As they progress, they'll move into using written coding languages such as JavaScript or Python.

Computer - any device that stores information and follows instructions from a program. For example, a laptop is a computer; so is a coffee maker that can be programmed.

Conditionals - statements that only run under certain conditions or situations. Conditionals are written with if/else statements (see definitions below).

Decomposition - to break down a problem into smaller steps or pieces to solve.

Development - when you create something new.

Digital games - games you can play on your phone, computer, TV, tablet, or digital gaming machine. Also called video games.

Efficient Programs - programs that respond more quickly and take less memory and power.

Else Statement - when an IF action isn't met, the ELSE action will run.

Event - an action that causes something to happen.

Frustration - feeling annoyed or angry because something is not the way you want it.

Game Design Process - the process of imagining, creating, and improving a design to create a video game.

If Statements - statements/actions that occur only IF the specified condition is met.

Iterate - when you repeat a process many times to make something better.

Loop - a set of instructions that is repeated over and over again.

Nested Loop - a loop within a loop, an inner loop within the body of an outer one. The first pass of the outer loop triggers the inner loop. Then the second pass of the outer loop triggers the inner loop again. This repeats until the outer loop finishes.

Perseverance - the ability to work through challenges. For example, when anyone starts to learn coding, they will find some activities challenging. When they keep trying until they succeed, they've demonstrated perseverance.

Programming - when a person creates a sequence of instructions, or an algorithm, that makes a computer or machine do something.

Sequence - the step-by-step order in which instructions or events should happen. For example: Think of the steps you do to get ready in the morning. You wouldn't get dressed before getting in the shower!

User Needs - what potential or current users need to solve a problem your tool is meant to solve.

User-Centered Design - a development life-cycle that focuses on understanding the needs of the user.