

The BBC micro:bit is a pocket-sized computer that introduces you to how software and hardware work together. It has an LED light display, buttons, sensors and many input/output features that, when programmed, let it interact with your students and their world. I find it to be a great introduction to physical computing and coding, especially since the Makecode.org website that is used to produce code in either Scratch or Java is very intuitive for students. In just a matter of minutes they can learn to light up the 25 LED's in all kinds of patterns - which is the stepping stone to some potentially very advance coding principles. The makecode.org site as well as the microbit.org sites include many great ideas for projects and step by step guides that with just a little support from a STEM4learning coach will get your class coding in no time.

In our classes we begin Microbit coding in 3rd grade, and have a continuing sequence of increasingly complex projects that are both engaging and challenging. Most of our advanced work includes some excellent external tools such as a speaker to create a gravity controlled instrument, an RGB LED to teach the basics of using variations in voltage and combinations of red, green and blue light to create any color in the visible light spectrum, and an environmental sensor that can make the microbit a simple weather station or light / sound monitor.

If this sounds interesting - just reach out via email and we can see about arranging some training to make the Microbits come alive in your classroom.