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Date:

I can use switches to control lights and motors on the Crumble.

LessonID: 47

We can use switches as triggers within an IF or IF ELSE statement. Simple 'On Off' switches send voltage as contact is made. This is registered as 'HI' on the input on the crumble. Activity 1 See if you can use your switch to create a multifunction torch. When the button is not pressed, the Sparkle must light white in the normal way, but when it is pressed, the Sparkle must flash a blue warning light to attract help. Either draw or snapshot and print the code used, then describe how it works. Activity 2 Racing car drivers often have access to a 'Boost' button which will give them a surge of power. See if you can program a motor so that, for five seconds, it runs at a quicker speed after a button has been pressed. Try making your own simple 'On Off' switch. See if you can use it to turn a light on and off, or to make a motor spin one way then the other. It's safe doing this with the Crumble as it's low voltage. Never try this with mains electricity.

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