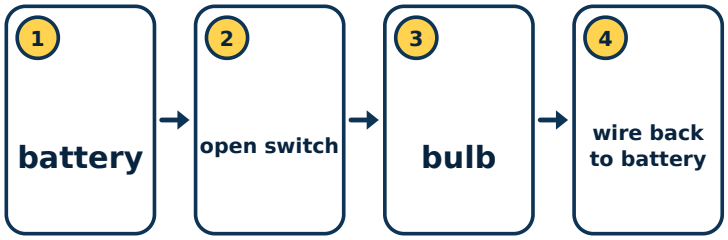
Simple Circuits

Grade 4 Science Worksheet - Challenge Me

Name _____ Date _____

Circle the answer.

1. The bulb in this circuit does not light. Which card shows the problem?

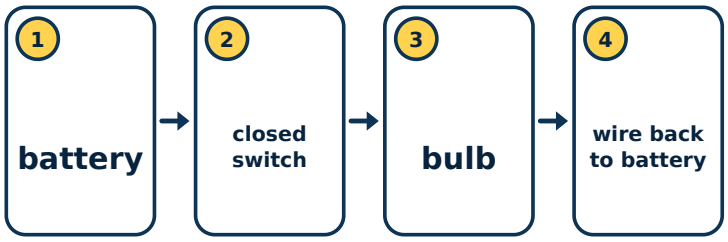


open switch bulb battery wire back to battery

2. Why are the metal prongs of a plug safe to hold by the plastic part?
plastic is a conductor that soaks up current
plastic makes the current turn into light
plastic is an insulator, so current does not reach your hand
the prongs carry no current at all

3. A student says, "The battery makes the bulb light, so the wire back to the battery is not needed." Why is this wrong?
the bulb needs two batteries to light
current needs a complete loop back to the battery
the battery only works when it is warm
the extra wire makes the bulb brighter

4. A circuit goes battery, closed switch, bulb, then back to the battery. The bulb stays dark. The battery is new. What should you test next?



whether the bulb is burned out
whether the wires are too shiny
whether the switch is open
whether the battery is too new

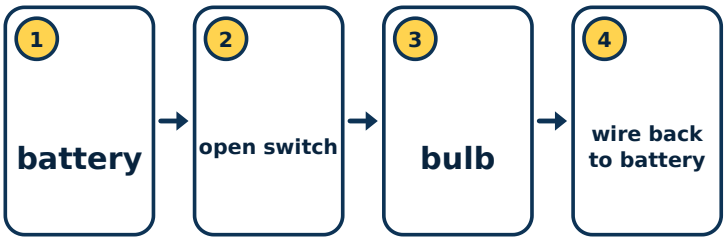
5. A loop with a battery, a closed switch and a bulb works. Ty adds a buzzer into the same loop. Now nothing works. What is most likely?
the battery got stronger with the buzzer
the buzzer is broken and leaves a gap in the loop
the switch opened when the buzzer was added
the bulb now blocks all sound energy

Simple Circuits

Answer Key - Grade 4 Science Worksheet - Challenge Me

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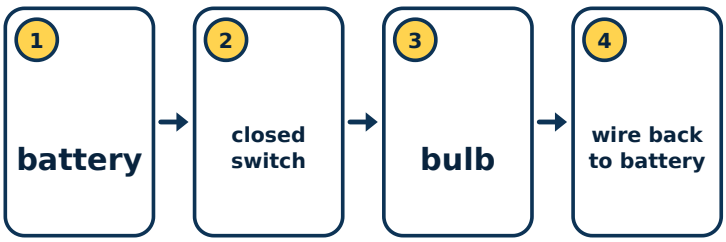
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