Holding Charge

Stick a straw to the palm of your hand, a window, a door, wall, ... anywhere.

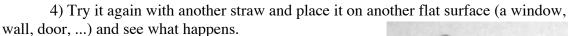
Materials:

Plastic straw in paper wrapper (if no wrapper is available, use a paper napkin)

The Recipe:

This trick works best when the air is dry (low humidity).

- 1) Before removing the wrapper on a new straw, slide the paper sleeve back and forth quickly. Slide it until the straw and wrapper feel warm (10 to 15 strokes should do the trick).
- 2) Remove the wrapper and place the straw in the open palm of your hand.
 - 3) Slowly move your hand around slow and see that the straw sticks without glue.



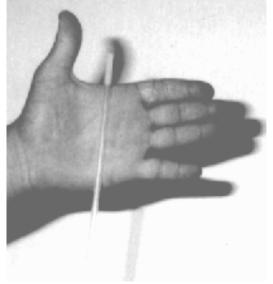
What's going on?:

Did you get a charge out of this trick? Sure you did, you electrically charged it.

You caused negative and positively charged particles to be moved around. After rubbing it in its paper sleeve, the straw has more negatively charged particles left on it. This makes your straw negatively charged.

When you bring your negatively charged straw near your palm, it makes your palm become positively charged. Since opposites attract, your straw sticks.

If anybody asks, the charge on your straw is about -40 nano coulombs!



Eric Muller While You're Waiting for the Food to Come © - 1995 Do Science