

The „Capri Battery“ of Joseph Beuys (1921-1986) is considered as a modern metaphor of the ecological balance of civilization. 200 pieces were manufactured as a limited edition in 1985. The vitrine, in which Beuys displayed a Capri battery, is considered to be one of his last works before he died. Twenty years later, this guide serves to get the Capri Battery to work.

«COME ON BEUYS, SHINE», ROMAN KELLER, 2005*



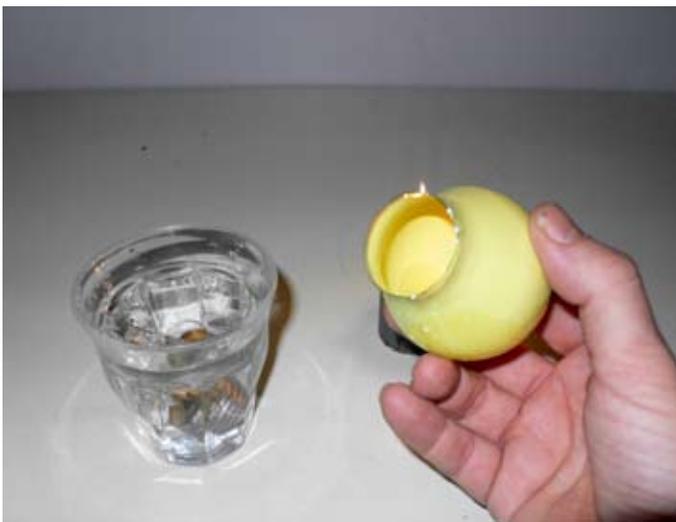
1. MATERIAL

Lemon, yellow light bulb, yellow high-performance LED (2,4 V, 20 mA), screw (M4, 20 mm) with washer screw nut, luster terminal (hole diameter: 3,5 mm), lamp socket E27, 15 cm copper wire, 15 cm magnesium wire, 2 x 10 cm copper cord 1,5 m2.



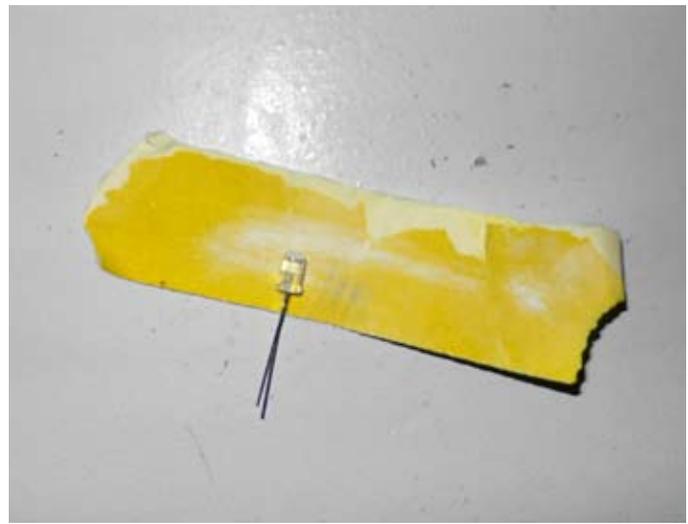
2. HEATING UP THE SOCKET OF THE LIGHT BULB

Heat up the Socket of the light bulb with a candle or a gas burner.



3. SEPARATING THE SOCKET OF THE LIGHT BULB

Cool down the socket shock wise in a glass of water. The glass of the light bulb should split near the socket.



4. SANDING THE TOP PART OF THE LED

In order that the arising light doesn't come out at the top of the LED, you should sand the top of the LEDs head.



5. CUTTING OFF THE SPIRAL-WOUND FILAMENT

Cut off the spiral-wound filament and the associated supporting wires of the light bulb with an edge cutter.



6. SANDING THE CONTACTS

To simplify the soldering of the LEDs you should sand the contacts (otherwise the solder won't bind properly with the contacts).



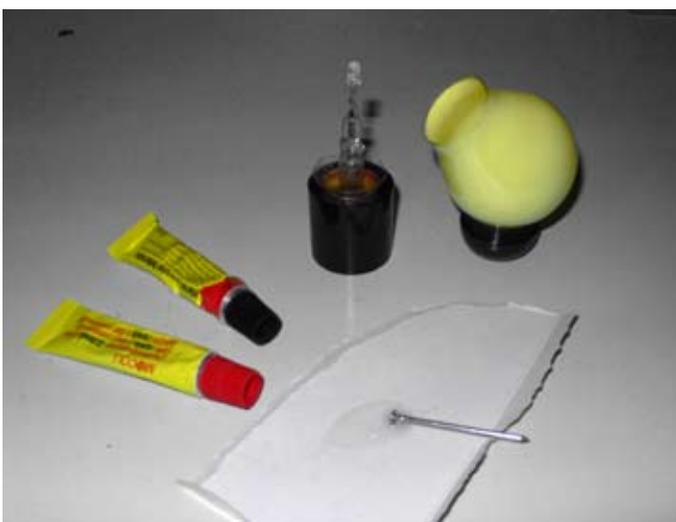
7. ISOLATE AND MOUNT LED CONTACTS

Isolate the LED contacts at the bottom with a short piece of insulating tape. After that, fix the LED in the round opening in the middle between the two contacts.



8. SOLDERING THE LED

Solder the LED with a soldering tool to the contacts that used to hold the spiral-wound filament.



9. GLUE THE LIGHT BULB TOGETHER

Use some two-component adhesive (e. g. Araldit) to glue the bulb together.

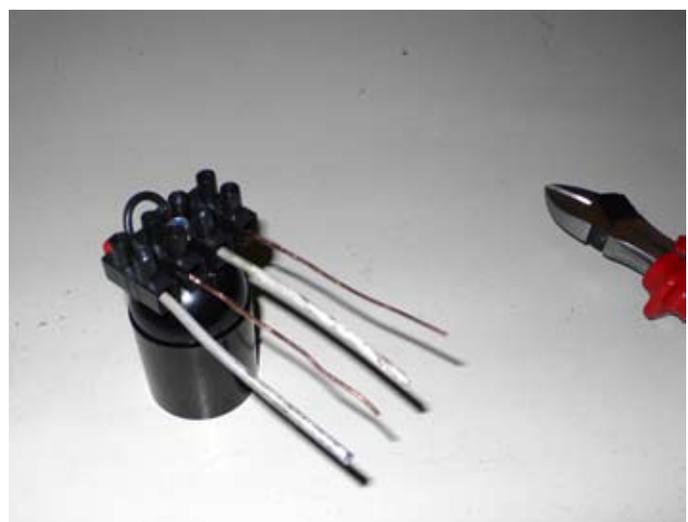


10. COMPLETED LIGHT BULB WITH EMBEDDED LED



11. ASSEMBLING THE SOCKET

The M4-screw is used to hold together the E27 light bulb socket with the luster terminal.



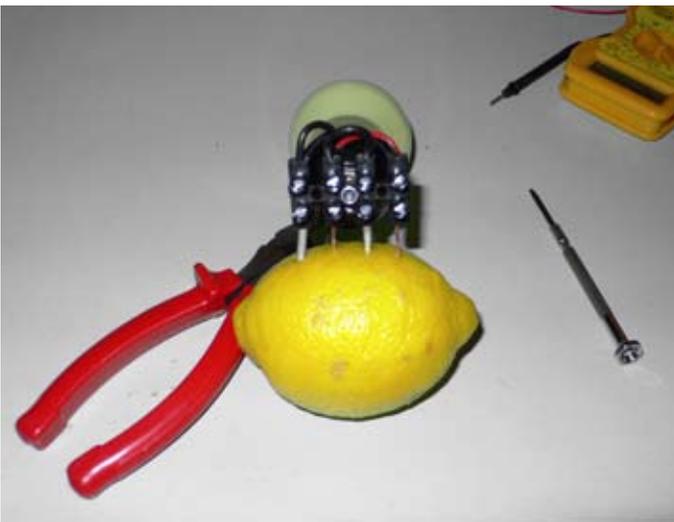
12. ASSEMBLING THE ELECTRODES

Put the copper and magnesium wires alternating into the luster terminator. The middle wires are connected at the back side with a short piece of flexible wire.



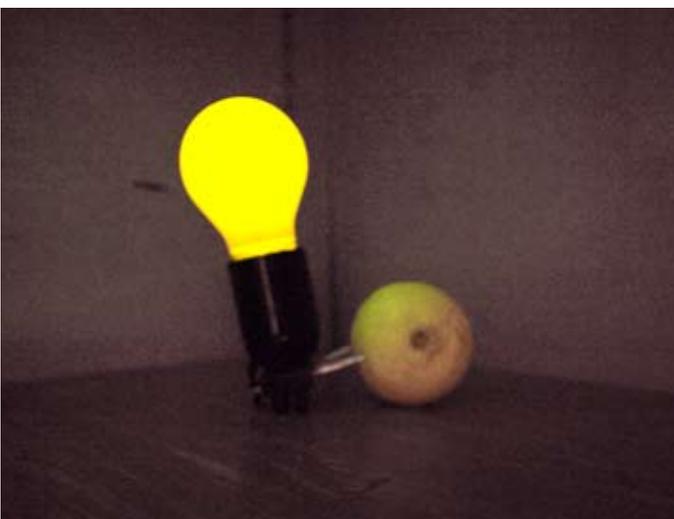
13. ATTACHING THE LEMON

The Lemon is attached orthogonal to the wires.



14. BOTTOM VIEW

Here you can see the final design from the bottom.



15. OPERATING TEST

As the power capacity of the lemon battery is very low, the LED will emit only a pale, subdued shine. You can see it best in a dark room or cupboard.