ELECTRONIC KIT

ELEKTRONICKÁ STAVEBNICE
ELEKTRONICKÁ STAVEBNICA
ZESTAW ELEKTRONICZNY
ELEKTRONIKUS ÉPÍTŐKÉSZLET

FLEG kit SCIENCE

40 PROJECTS

25 PARTS

Complete manual
(english, czech, polish, hungarian, slovakian)
download here:



CREATIVITY
ABILITY
KNOWLEDGE
SCIENCE

Distributor:
ConQuest entertainment a.s., Kolbenova 961/27d, Praha 9
info@fleg.cz, www.fleg.cz, www.gamehouse.cz
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SCIENCE ELECTRON EDUCATION BLOCKS INSTRUCTION BOOK

Warm Reminder

The following inner page legend product ratio hasfor different uses, please refer to the actual object.

CAUTION

For children over 8 years old only.Toy product use and play please read the instructions carefully.

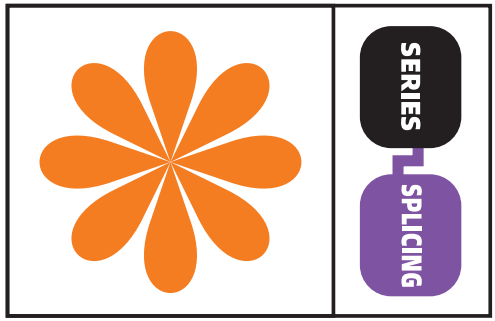
All packing materials, such as tape, plastic sheets, bags, etc., are excludedPart of the product is not suitable for children to play with, for your child's sake Safety, please pay attention to and properly dispose of the above packing materials.

Battery Installation:

1. Ensure that the power host is shut down.
2. Open the battery box cover on the back of the power host using a screwdriver.
3. The subject should follow the correct polarity (+, -). Load three new 1.5V AA batteries.
4. Place the battery case cover and tighten the screws.tt

Precautions For Battery Use:

1. Toy battery type: 3 1.5V AA non-rechargeable batteries.
2. Non-rechargeable batteries cannot be recharged.
3. Rechargeable batteries should only be charged under adult supervision.
4. The rechargeable battery should be removed from the toy before charging.
5. Do not mix old and new batteries or different types of batteries.
6. The battery should be placed with the correct polarity (+, -).
7. Used batteries should be removed from toys.
8. Do not short circuit the power terminal.
9. Take out the battery if it is not used for a long time.
10. Do not put the battery in the fire.
11. Toys with battery cases do not state that toys cannot be connected to more than the recommended amount of power.



Care And Maintenance:

1. Use a soft dry cloth to wipe the outside of the power supply host to clean it.
2. Avoid direct sunlight and any heat sources.
3. Take out the battery if it is not used for a long time.
4. Do not collide with hard objects or try to disassemble the host.
5. Do not immerse the power host in water and avoid moisture.

Common Troubleshooting:

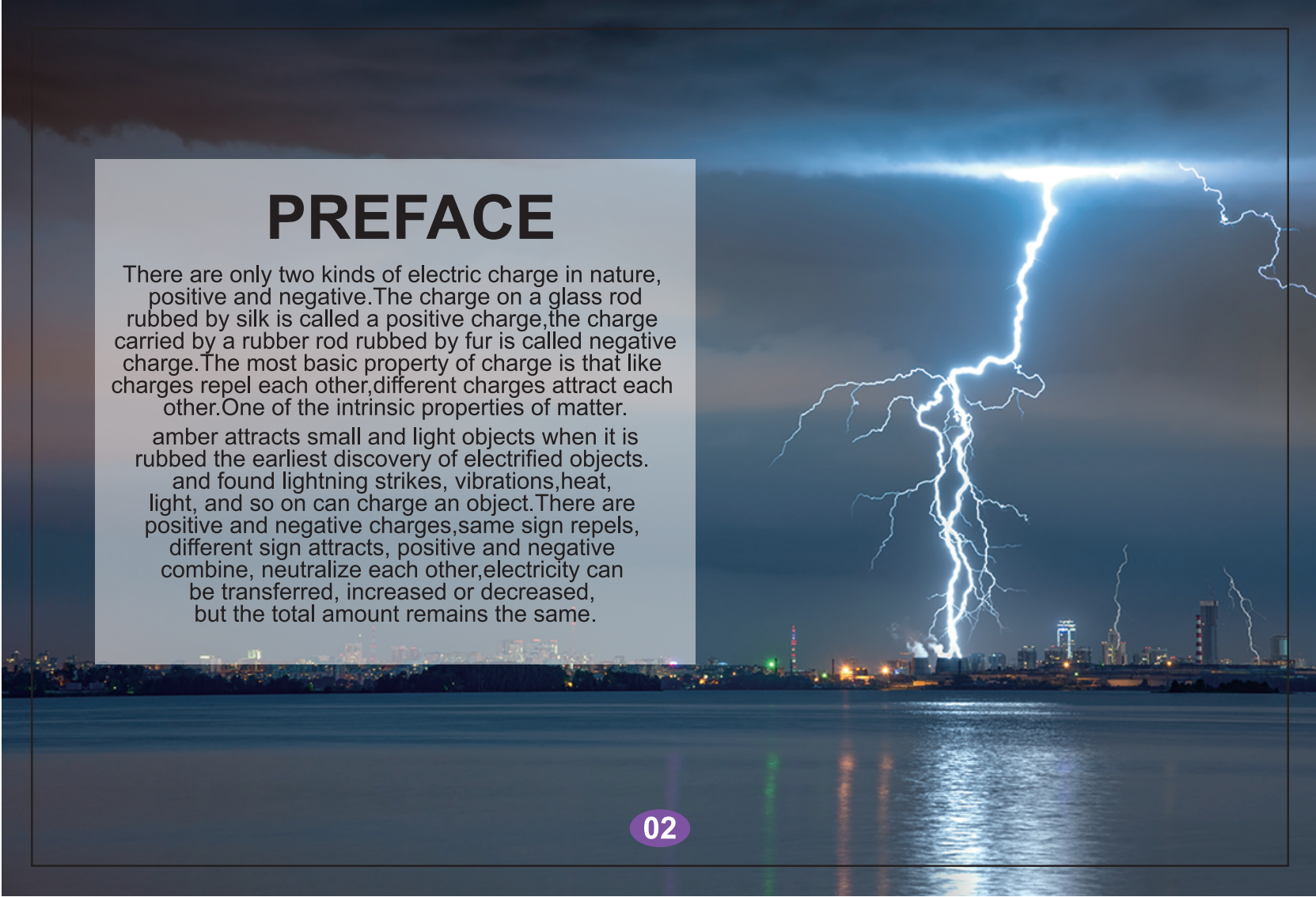
If for some reason the power host stops responding,Please follow the following steps:

1. Disconnect the cable from the power host.
2. Take out the battery.
3. Place the power host for a few minutes, and then reinstall the battery.
4. Restart the machine and use it again.
5. If the power host still cannot work, please install a new battery.

PREFACE

There are only two kinds of electric charge in nature, positive and negative.The charge on a glass rod rubbed by silk is called a positive charge,the charge carried by a rubber rod rubbed by fur is called negative charge.The most basic property of charge is that like charges repel each other,different charges attract each other.One of the intrinsic properties of matter.

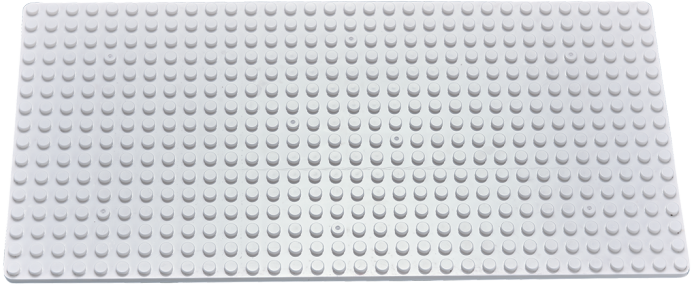
amber attracts small and light objects when it is rubbed the earliest discovery of electrified objects. and found lightning strikes, vibrations,heat, light, and so on can charge an object.There are positive and negative charges,same sign repels, different sign attracts, positive and negative combine, neutralize each other,electricity can be transferred, increased or decreased, but the total amount remains the same.



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Spare Parts List



Laminated Boardx2



Power Modulex1



Motor Modulex1



Horn Modulex1



Rotating Modulex1



Switch Modulex1



USB Modulex1



10 Resistance x1



Fan Headx1



Flying Saucer x1



Vibration Modulex1



Photosensitive Modulex1



Key Modulex1



Connecting wirex4



Three end connection wirex2



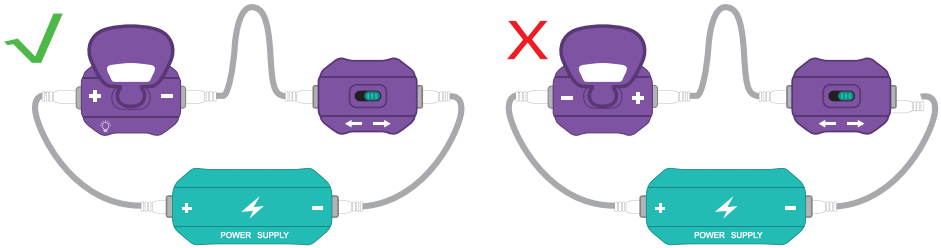
Block board Bucklex4



USB Desk Lampx1

Basic Function Introduction

Note The Positive And Negative Links





Connecting wire

The product comes with two different connecting wire,as the child accumulates knowledge,suitable link line can be selected for combination.

Connecting Wire Precautions

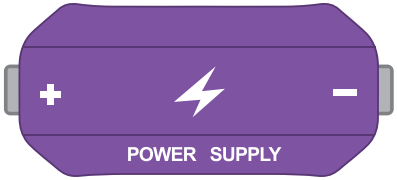
Please read the following materials carefully before the child experiment. Each child has different abilities. Parents should carefully choose the activities suitable for their children. Make sure your child understands the following:

- Only follow the instructions in the lesson plan to connect the connecting wire
- Not all links will be used in an activity
- Do not plug the cable into any outlet port in your home
- Do not connect the same cable to both ends of the power supply host at the same time to prevent battery short circuit
- Please note that the connecting wire is not placed in a humid environment to prevent water burning
- Do not insert any conductive items into the port, such as wire, key, etc., except the connecting wire
- Please do not remove or refit any electronic module at will. Refitting may cause damage or overheating of the module.
- Disconnect the circuit when it is not in use to avoid battery consumption

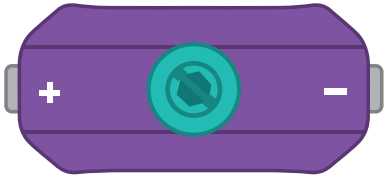
Module Function Introduction

Power Module

Install the batteries, connect the wires, provide electric energy



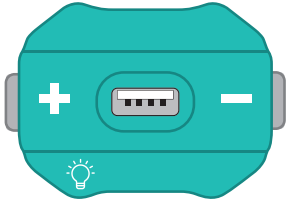
Motor Module Fan head



Positive and negative positive connection, electricity turn clockwise after.positive and negative connection,power onbackward and backward rotation

USB Module

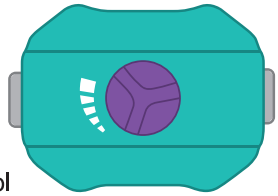
Insert table lamp through current luminescence



Rotating Module

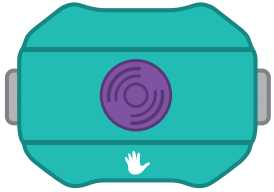
(Regardless of positive and negative poles)

Torsional rotary switch control the size of the passing current



Vibration Module

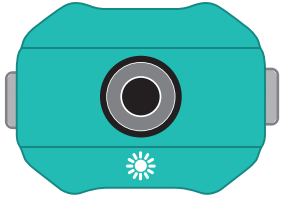
(Regardless of positive and negative poles)



The frequency of beating the vibration module It changes the amount of current that goes through it

Photosensitive Module

(Regardless of positive and negative poles)



The intensity of the light affects the circuit the amount of current passing through

Module Function Introduction

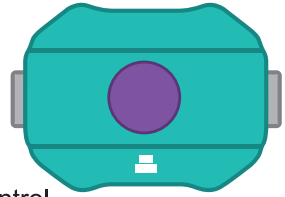
Horn Module

After power-on,
horn module It
makes a beeping sound



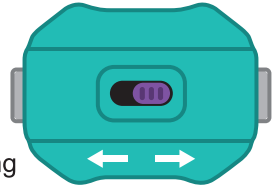
Key Module

(Regardless of positive
and negative poles)
Press the key module to control
the amount of current passing through



Switch Module

Close the toggle switch, inside
the metal touches the connecting
wire connects the circuit,the power
module starts to work



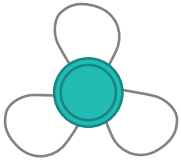
USB Module Table Lamp

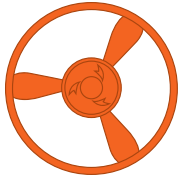
Insert the USB module port.
the electricity gives off a light



Fan head Fitting Flying saucer Fittings

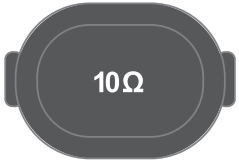
Place above the motor module



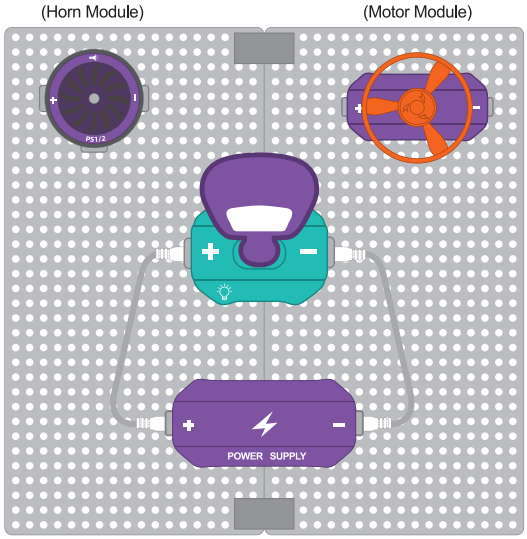


Resistance

The amount of current
through is limited by
the size of the resistance



01-03 Understanding Simple Circuit



(Motor module preinstalled with flying saucer accessories)
(USB module pre-installed table lamp accessories)

Connecting Circuit

1. Insert one end of the cable into the positive side of the power module
2. Insert the other end of the cable into the positive side of the USB table lamp
3. Insert the other end of the cable into the negative side of the USB table lamp
4. Insert the other end of the cable into the negative terminal of the power module

OPERATION:

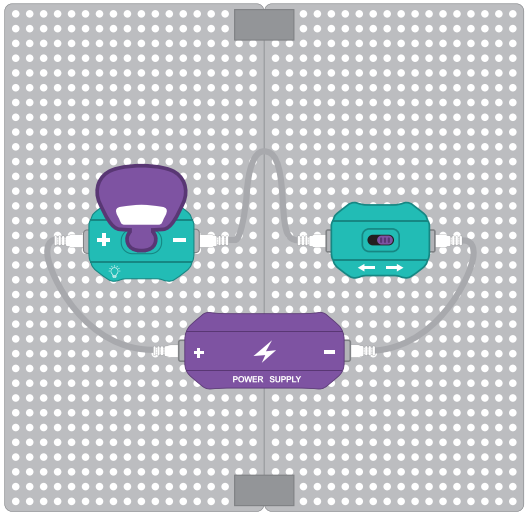
1. Is the USB light on? If not, please check to see if the circuit is connected correctly?
2. What will happen if you replace the USB desk lamp with a horn module? (Experiment 2)
3. Replace the USB desk lamp with a motor module, what will be the reaction? (Experiment 3)

TIPS: USB module can be replaced by horn module/motor module

Why is that?

Switch on the circuit, the current flows out from the positive terminal of the power supply, flows through the link line to the USB table lamp, and then flows back to the negative terminal of the power supply, forming a complete closed circuit, with electrical appliances to start working!get our little minds thinking: how does electricity come from? how is the circuit connected when the electrical appliance is used at ordinary times? what would life be like without electricity?

04 Know The Toggle Switch



(USB module pre-installed table lamp accessories)

Connecting Circuit

1. Insert the cable into the positive terminal of the power module and USB table lamp
2. Use the second link cable to plug the negative USB table lamp into the switch module
3. Connect the third cable to the negative terminal of the power module on the other side of the switch module

OPERATION:

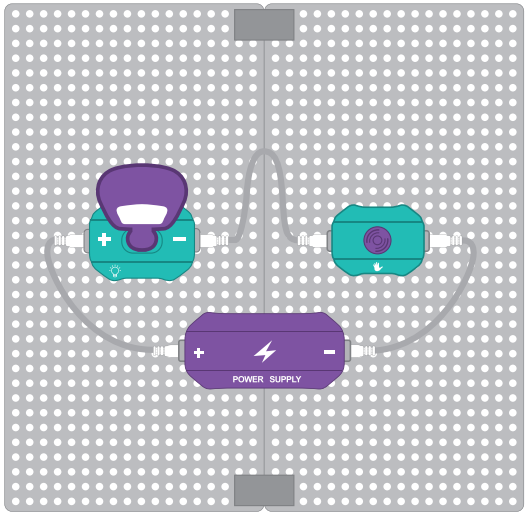
Close the toggle switch, USB desk lamp will respond to what?



Why is that?

Toggle the switch can make the circuit on or off, close the switch, inside the metal touch two wires to open the circuit.switch off, no current through.

05 Cognizant Vibration Switch



(USB module pre-installed table lamp accessories)

Connecting Circuit

1. Insert the cable into the positive terminal of the power module and USB table lamp
2. Use the second connecting cable to insert the USB table lamp negative terminal and vibration module
3. Insert the third connection wire into the negative terminal on the other side of the vibration module

OPERATION:

Slap vibration switch, USB desk lamp will have what reaction?

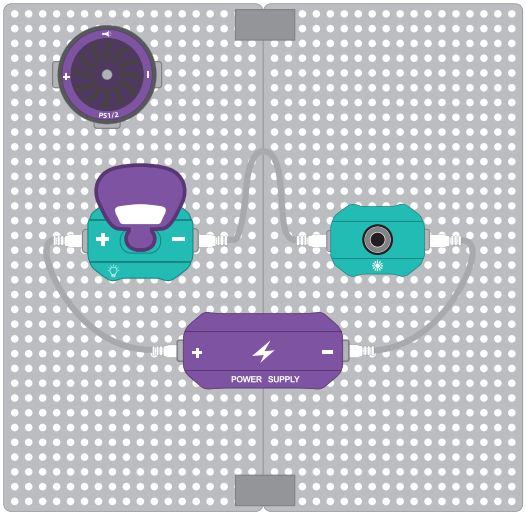


Why is that?

The induction vibration transmits the induction result to the circuit device, and the spring connects the two connecting wires, forming a closing current, and the electrical appliance starts working.

06-07 Understand The Photosensitive Switch

(Horn Module)



(USB module pre-installed table lamp accessories)

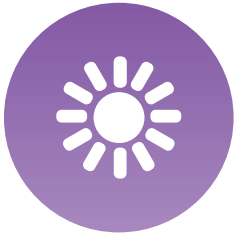
Connecting Circuit

1. Insert one end of the cable into the positive terminal of the power module and the positive terminal of the USB table lamp
2. Insert the second cable into the negative USB table lamp to the photosensitive module
3. Insert the third cable into the other side of the photosensitive module to the negative terminal of the power module

OPERATION:

1. Open the flashlight simple irradiation photosensitive module, USB table lamp brightness will have what reaction?
2. Replace the USB desk lamp with a horn module and irradiate the photosensitive module. How will the horn module react? (Experiment 7)

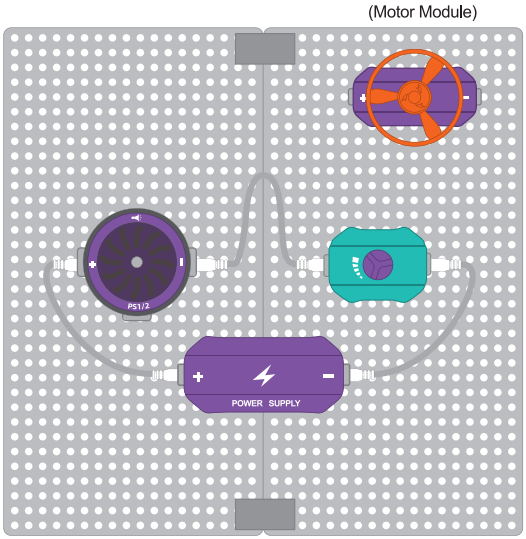
TIPS: The USB module can be replaced with the horn module



Why is that?

Photosensitive switch is a kind of resistor whose resistance value changes with the intensity of incident light by using the photoconductance effect of semiconductor.

08-09 Cognizant Rotary Switch



(Motor module preinstalled with flying saucer accessories)

Connecting Circuit

1. Insert one end of the cable into the positive terminal of the power module and the positive terminal of the horn module
2. Insert the second connector into the horn module negative terminal into the rotating module
3. Then use the third connecting cable to insert the other side of the rotating module to the negative terminal of the power module

OPERATION:

1. How will the horn module react when rotating the module?
2. Replace the horn module with the motor module and rotate the rotation module. What will the motor module respond to? (Experiment 9)

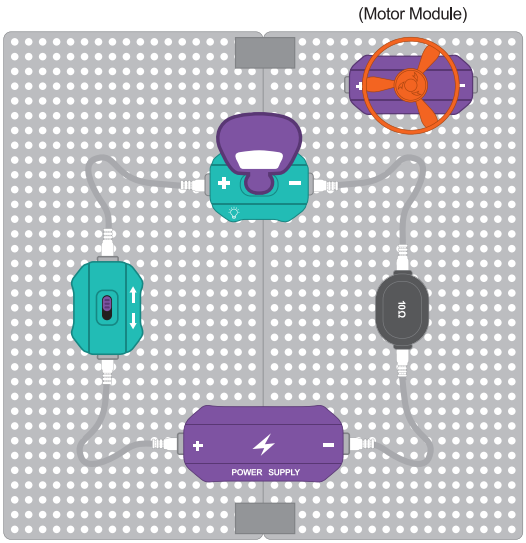
TIPS: The horn module can be replaced by the motor module



Why is that?

Rotary switch is in a certain range of conversion resistance value, through rotation to adjust the size of the gear, control the size of the current through.

10-11 Cognizant Resistance



(USB module pre-installed table lamp accessories)
(Motor module preinstalled with flying saucer accessories)

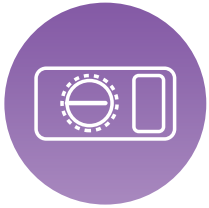
Connecting Circuit

1. Insert the cable into the positive pole and switch module of the power module
2. Use the second cable to insert the other side of the switch module to the positive USB table lamp
3. Insert the third cable into the negative terminal of the switch module and the 10Ω resistor
4. Insert the fourth cable into the other side of the 10Ω resistor to the negative terminal of the power module

OPERATION:

1. Close the toggle switch, through the resistance, what will be the reaction of the USB lamp?
2. Replace the USB desk lamp with a motor module. How will the motor module react through the resistance? (Experiment 11)

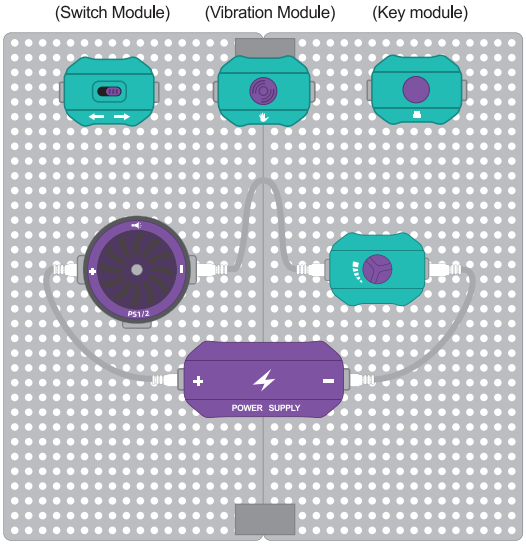
TIPS: The USB module can be replaced with the motor module



Why is that?

The resistance can limit the current through the branch, play the role of dividing voltage and shunt, and ensure the normal operation of the power module.
Ω is a unit of resistance. The larger the resistance, the smaller the current, and the lower the working efficiency of the power module

12-15 Recognition Horn Module



Connecting Circuit

1. Insert the cable into the positive terminal of the power module and horn module
2. Insert the second connector into the horn module negative terminal into the rotating module
3. Insert the third cable into the other side of the rotating module to the negative pole of the power module

OPERATION:

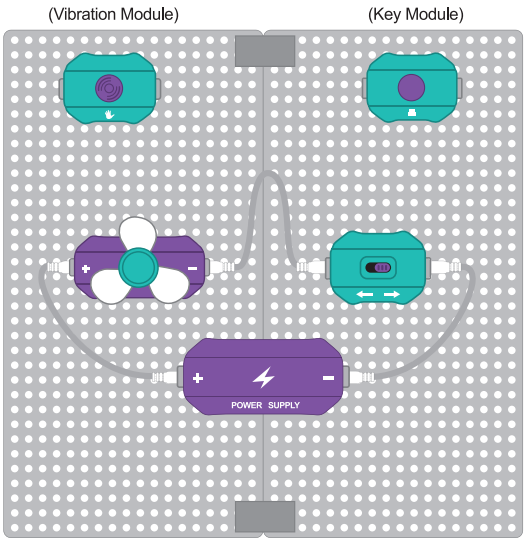
1. Rotate the module to see how the horn module responds?
2. The rotating module is replaced by the switch module. How will the horn module react when the switch is flipped? (Experiment 13)
3. The rotation module is replaced by the vibration module. How will the horn module respond to the shock? (Experiment 14)
4. Replace the rotating module with the key module. When pressing the key, how will the horn module react? (Experiment 15)

TIPS: The rotating module can be replaced by the switch module/ vibration module/key module

Why is that?

The horn is a very common electroacoustic transducer parts when the current through the coil of the horn, the corresponding magnetic field, the collision between the magnetic field will produce vibration, rotation will deliver sound.

16-18 Cognitive Motor Module



(Pre-installed fan head accessories for motor module)

Connecting Circuit

1. Insert the cable into the positive terminal of the power module and the positive terminal of the motor module
2. Insert the motor module negative terminal into the switch module with the second connecting wire
3. Connect the third cable to the negative pole of the power module on the other side of the switch module

OPERATION:

1. Close the toggle switch, how will the motor module react?
2. Replace the switch module with the vibration module. What will the motor module respond to the shock? (Experiment 17)
3. Replace the switch module with the key module. When pressing the key, how will the motor module react? (Experiment 18)

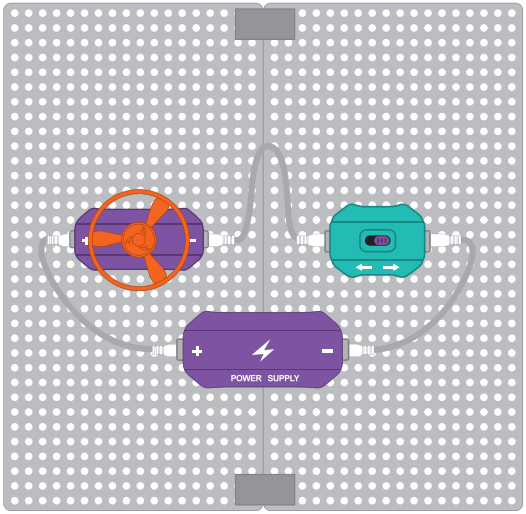
TIPS: The switch module can be replaced with the shock module/ key module



Why is that?

The motor converts electrical energy into mechanical energy, and uses the electrified coil (stator winding) to generate a rotating magnetic field and is used for the rotor. The magnetic field acts on the current to make the motor rotate.

19-20 Understand the positive and negative rotation of the motor



(Motor module preinstalled with flying saucer accessories)

Connecting Circuit

1. Insert the cable into the positive terminal of the power module and the positive terminal of the motor module
2. Insert the motor module negative terminal into the switch module with the second connecting wire
3. Connect the third cable to the negative pole of the power module on the other side of the switch module

OPERATION:

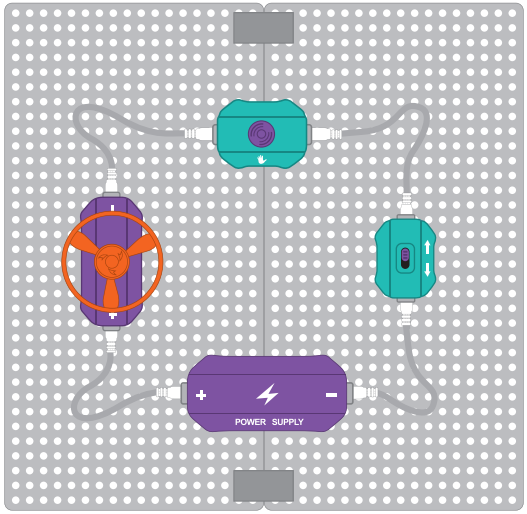
1. Close the toggle switch, how will the motor module react?
2. Convert the two correct negative poles of the motor module and close the switch. What will the motor module respond to? (Experiment 20)



Why is that?

The positive and negative rotation of the motor represents the clockwise and counterclockwise rotation of the motor. The current flows through the energized coil in different directions. If the direction of the magnetic pole of the coil changes, different rotation effects will occur.

21 Recognition Circuit Series



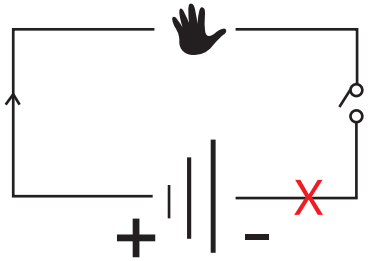
(Motor module preinstalled with flying saucer accessories)

Connecting Circuit

1. Insert the cable into the positive terminal of the power module and the positive terminal of the motor module
2. Insert the second connecting wire into the motor module negative terminal to the vibration module
3. Insert the third connecting wire into the switch module on the other side of the vibration module
4. Insert the fourth cable into the negative pole of the power module on the other side of the switch module

OPERATION:

Close the switch, gently tap the vibration module, the motor module will react?

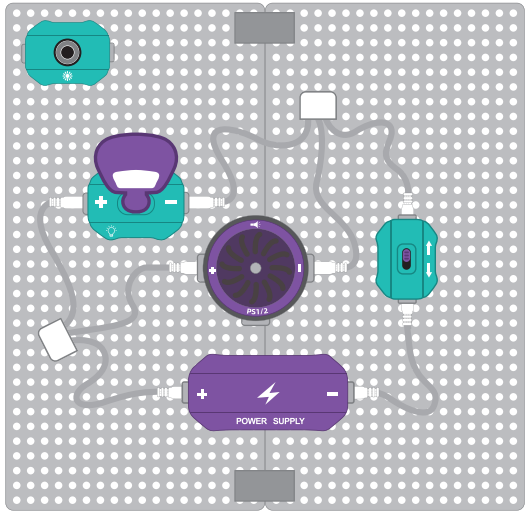


Why is that?

Series circuit is a circuit, the electrical appliances connected to each other influence each other, when there is any place short circuit or break the whole circuit will not run.and the power supply voltage will be divided by the electrical appliances, the current is weakened, the effect of electrical appliances will b e weakened.

22-23 Cognitive Circuit Parallel

(Photosensitive Module)



(USB module pre-installed table lamp accessories)

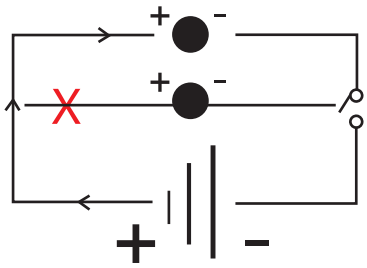
Connecting Circuit

1. Insert the three-end cable into the positive terminal of the power module, horn module and USB table lamp
2. Use the second three-end cable to insert the USB table lamp, horn module negative terminal and switch module
3. Insert another cable into the other side of the switch module to the negative terminal of the power module

OPERATION:

1. Close the toggle switch, what will be the reaction of USB table lamp and horn module?
2. Replace the switch module with a photosensitive module. What will be the reaction of USB desk lamp and horn module when the light illuminates the photosensitive module? (Experiment 23)

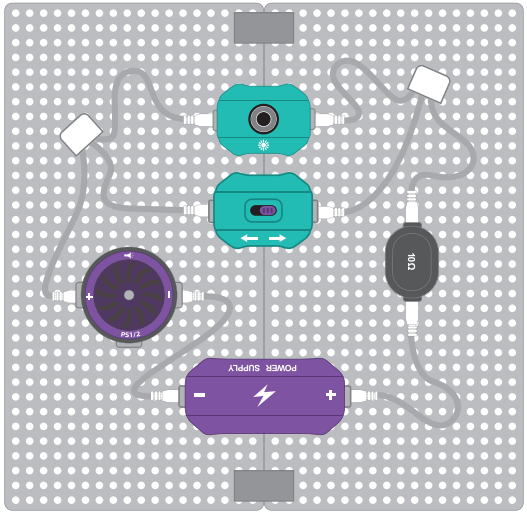
TIPS: The switch module can be replaced with a photosensitive module



Why is that?

The current of the parallel circuit passes through multiple channels and flows through multiple appliances, and finally joins the power supply.each electrical appliance in the circuit can be used separately.and the circuit regardless of voltage, electrical effect is not affected.

24 Understand Photoresistor

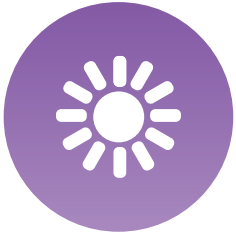


Connecting Circuit

1. Insert the cable into the negative terminal of the power module and horn module
2. Insert the positive terminal of the horn module, the switch module and the photosensitive module with another three-end connector
3. Insert the second three-end cable into the photosensitive module, the other side of the switch module and the 10Ω resistor
4. Insert the second cable into the other side of the 10Ω resistor to the positive terminal of the power module

OPERATION:

Close the switch, open the phone light irradiation photosensitive module, horn module will have what reaction?

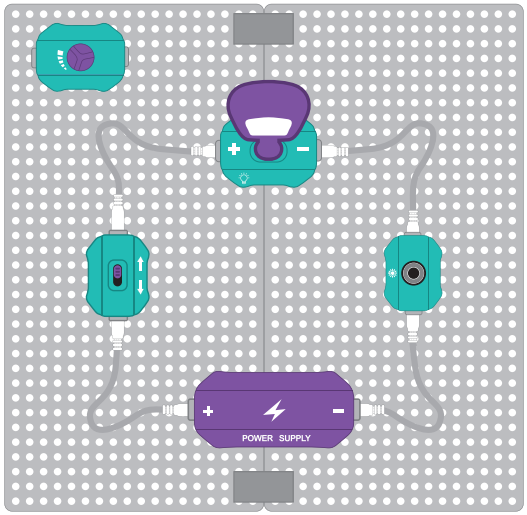


Why is that?

Photoresistor is a resistance made of photosensitive materials. The stronger the intensity of light, the smaller the resistance and the less ability to block current. the weaker the light, the greater the resistance and the greater the ability to block the current.

25-26 Recognition And Gate Circuit

(Rotating Module)



(USB module pre-installed table lamp accessories)

Connecting Circuit

1. Insert the cable into the positive pole and switch module of the power module
2. Insert the switch module into the positive USB desk lamp using the second cable
3. Insert the third cable into the negative USB table lamp to the photosensitive module
4. Insert the fourth cable into the other side of the photosensitive module to the negative terminal of the power module

OPERATION:

1. Close the switch, the light illuminates the photosensitive module, what will be the reaction of the USB desk lamp?
2. Replace the photosensitive module with a rotating module, close the switch, and twist the rotating module. What will be the reaction of the USB lamp? (Experiment 26)

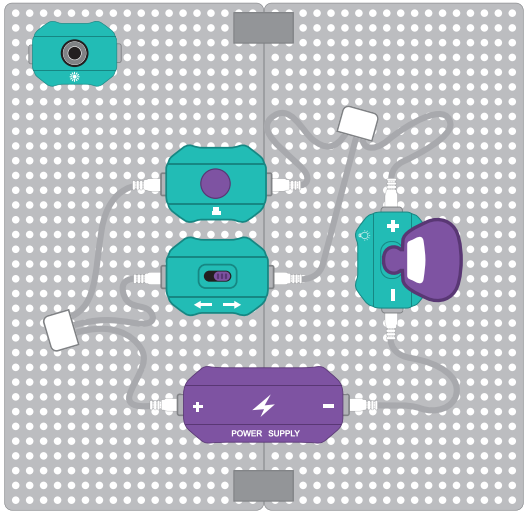
TIPS: The photosensitive module can be replaced with a rotating module

Why is that?

The two switch modules are connected in series with the gate circuit. The two switches must be opened at the same time to allow the current to flow and the USB table lamp to light up.

27-28 Recognition Or Gate Circuit

(Photosensitive Module)



(USB module pre-installed table lamp accessories)

Connecting Circuit

1. Insert the three-end cable into the positive terminal, switch module, and key module of the power module
2. Insert the key module and switch module, USB table lamp positive electrode with the second three-head connection wire
3. Insert another cable into the negative terminal of the USB table lamp to the negative terminal of the power module

OPERATION:

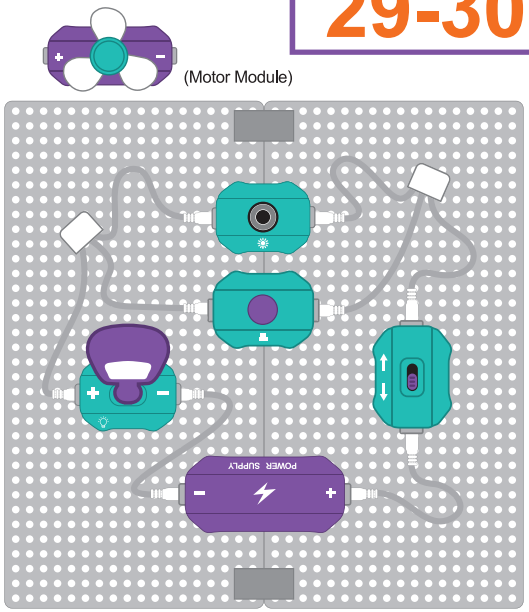
1. Close the switch and press the key. What will be the reaction of the USB lamp?
2. Replace the key module with a photosensitive module. What will be the reaction of the USB lamp when the light illuminates the photosensitive module? (Experiment 28)

TIPS: The key module can be replaced with a photosensitive module

Why is that?

Or gate circuit is two switch modules in parallel in the circuit, a switch belongs to a path, open one of the switches, the circuit can run, just like the bedside lamp at home, bedside and door are equipped with switch control lights.

29-30 What Is A Hybrid Circuit



(USB module pre-installed table lamp accessories)
(Pre-installed fan head accessories for motor module)

Connecting Circuit

1. Insert the cable into the negative terminal of the power module and the negative terminal of the USB table lamp
2. Use another three-end cable to plug in the positive electrode, key module and photosensitive module of the USB table lamp
3. Insert the second three-end cable into the photosensitive module, key module and switch module
4. Insert the switch module to the positive terminal of the power module with the second cable

OPERATION:

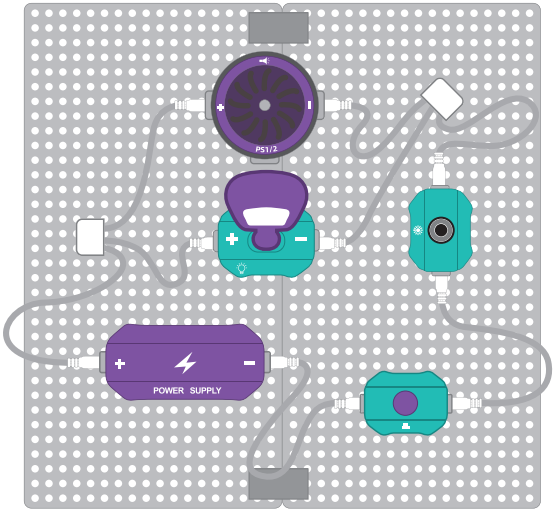
1. Close the toggle switch and press the key module. When the light illuminates the photosensitive module, what will be the reaction of the USB lamp?
2. Replace the USB desk lamp with a motor module, and add fan head accessories. Repeat the above steps, how will the motor module react? (Experiment 30)

TIPS: USB table lamp can be replaced with motor module

Why is that?

In daily production and life, in order to more convenient use, more will take the method of hybrid circuit, that is, the series circuit and parallel circuit combined, that is, to ensure the convenience of daily life, but not easily short circuit.

31 Light Of Night



(USB module pre-installed table lamp accessories)

Connecting Circuit

1. Insert the three-end cable into the positive terminal of the power supply, the positive terminal of the USB table lamp and the positive terminal of the horn module
2. Insert the second three-end connection wire into the negative terminal of the horn module, the negative terminal of the USB table lamp and the photosensitive module
3. Insert another wire into the other side of the photosensitive module to the key module
4. Insert the second cable into the other side of the key module to the negative terminal of the power module

OPERATION:

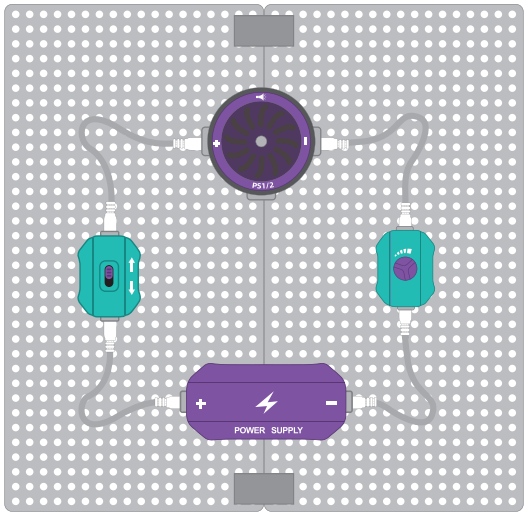
Press the key, light irradiation photosensitive module, horn module and USB desk lamp will have what reaction?



Why is that?

The horn and USB table lamp module are connected in parallel on the circuit. press the key, the current forms a loop, the light illuminates the photosensitive module two electrical appliances work at the same time, emit sound and light.

32 The Mystery Of Sound

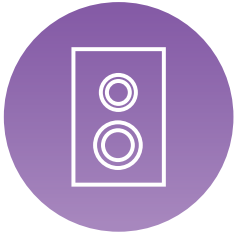


Connecting Circuit

1. Insert the cable into the positive terminal and switch module of the power supply
2. Insert the second connector into the other side of the switch to the positive terminal of the horn module
3. Then insert the third connecting wire into the horn negative terminal to the rotating module
4. Use the fourth cable to insert the other side of the rotating module to the negative terminal of the power module

OPERATION:

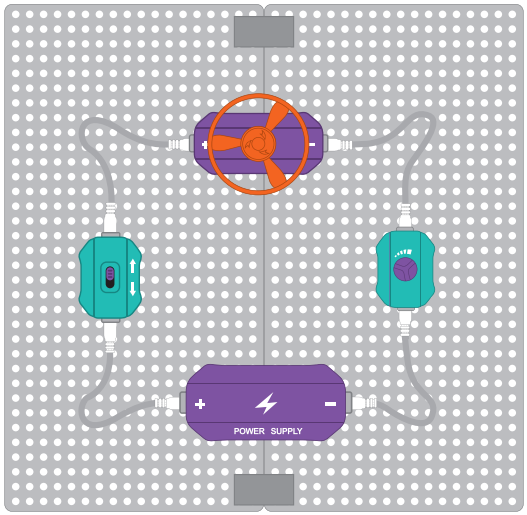
Close the switch, twist the rotating module, what happens to the horn module?



Why is that?

Rotating the module changes the size of the resistance, the current flowing through the horn module changes, and the horn moduleemits different loudness sounds.

33 Speed-controlled Flying Saucer



(Motor module preinstalled with flying saucer accessories)

Connecting Circuit

1. Insert the cable into the positive pole and switch module of the power module
2. Use the second connecting wire to insert the other side of the switch module to the positive terminal of the motor module
3. Then insert the third connecting wire into the negative electrode of the motor to the rotating module
4. Use the fourth cable to insert the other side of the rotating module to the negative terminal of the power module

OPERATION:

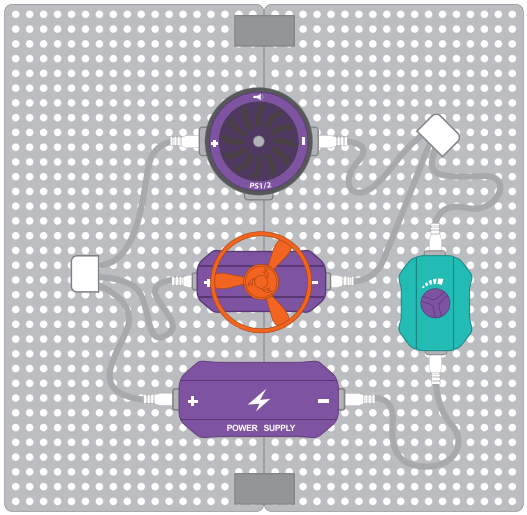
Close the switch, twist the rotating module, how will the motor module react?



Why is that?

Twisting the knob changes the size of the resistance, the current flowing through the motor module changes, the speed of the motor module changes, and the rotating speed of the flying saucer changes.

34 Flying Alarm



(Motor module preinstalled with flying saucer accessories)

Connecting Circuit

1. Insert a three-end cable into the positive terminal of the power module, the positive terminal of the motor module and the positive terminal of the horn module
2. Insert the horn module negative terminal, motor module negative terminal and rotary module with the second three-end connector
3. Use another cable to insert the other side of the rotating module to the negative terminal of the power module

OPERATION:

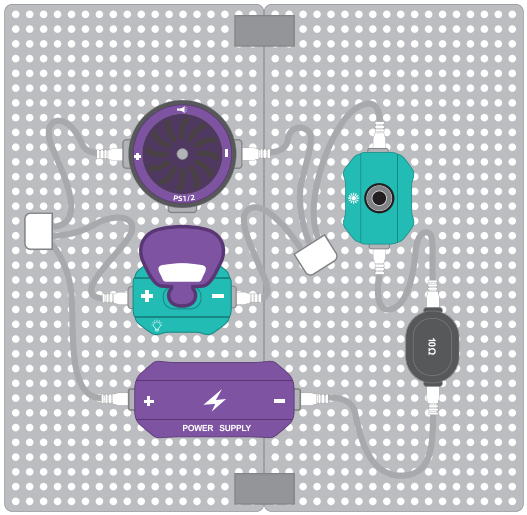
What will be the reaction of the rotary module, horn module and motor module?



Why is that?

Twist and rotate the module, the resistance in the circuit becomes smaller, the current flows through the motor module and horn module, and the power module starts to work.

35 Alarm Detector



(USB module pre-installed table lamp accessories)

Connecting Circuit

1. Insert the three-end cable into the positive terminal of the power module, the positive terminal of the USB table lamp and the positive terminal of the horn module
2. Insert the horn module negative, USB table lamp negative and photosensitive module with the second three-end cable
3. Insert another connection wire into the other side of the photosensitive module to the 10Ω resistor
4. Insert the second cable into the other side of the 10Ω resistor to the negative terminal of the power module

OPERATION:

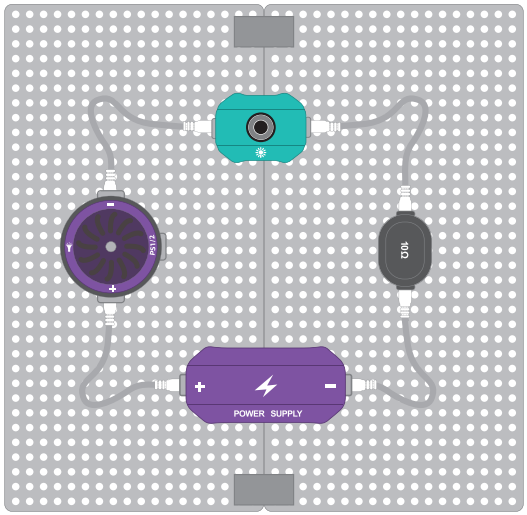
How will USB desk lamp and horn module react to light sensitive module?



Why is that?

The light shines on the photosensitive module, and the ability of the photosensitive module to block the current is reduced, and the current flows through the horn module and USB table lamp to emit bright light and sound.

36 The Cock Crows



Connecting Circuit

1. Insert the cable into the positive terminal of the power module and horn module
2. Insert the second connector into the horn module negative to the photosensitive module
3. Insert the third connection wire into the other side of the photosensitive module to the 10Ω resistor
4. Insert the fourth cable into the other side of the 10Ω resistor to the negative terminal of the power module

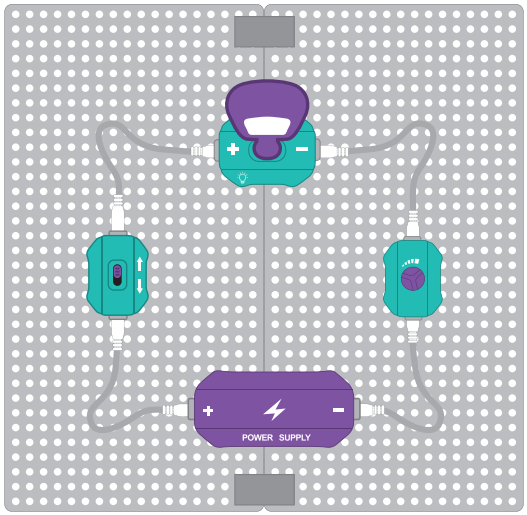
OPERATION:

How will the horn module react when the light is shone on the photosensitive module?

Why is that?

The light shines on the photosensitive module, and the ability of the photosensitive module to block the current is reduced, and the current flows through the horn module to make a sound.

37 Dim the lights



(USB module pre-installed table lamp accessories)

Connecting Circuit

1. Insert the cable into the positive pole and switch module of the power module
2. Insert the switch module into the positive USB desk lamp with the second cable
3. Insert the third cable into the USB table lamp negative terminal to the rotating module
4. Use the fourth cable to insert the other side of the rotating module to the negative terminal of the power module

OPERATION:

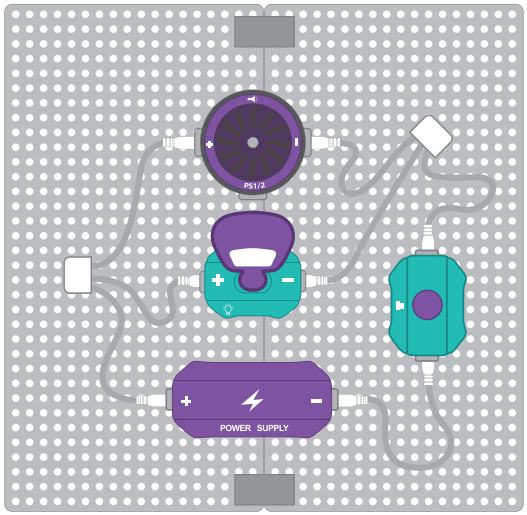
Close the switch, rotate the module, what will be the response of USB lamp?



Why is that?

The current through the USB table lamp will change with the change of the rotary module, the current through the USB table lamp increases, the USB table lamp brighter, vice versa.

38 Quick Responder



(USB module pre-installed table lamp accessories)

Connecting Circuit

1. Insert the three-end cable into the positive terminal of the power module, the positive terminal of the horn module and the positive terminal of the USB table lamp
2. Insert the horn module negative, USB table lamp negative and key module with the second three-end cable
3. Insert another cable into the other side of the key module to the negative terminal of the power module

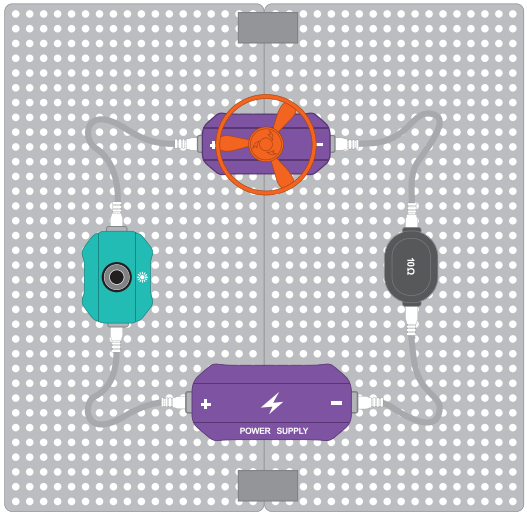
OPERATION:

Press the key, horn module and USB desk lamp will have what response?

Why is that?

The speaker and USB table lamp are connected in parallel on the circuit, press the key, the current forms a loop, the two electrical appliances work at the same time, emit sound and light.

39 Small Light controlled Windmill



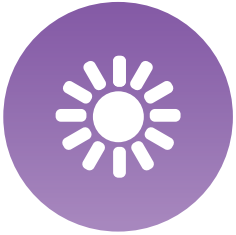
(Motor module preinstalled with flying saucer accessories)

Connecting Circuit

1. Connect the positive electrode and photosensitive module of the cable power module
2. Insert the second connecting wire into the other side of the photosensitive module to the positive electrode of the motor module
3. Insert the third connection wire into the negative end of the motor to the 10Ω resistor
4. Use the fourth cable to insert the other side of the 10Ω resistor into the negative terminal of the power module

OPERATION:

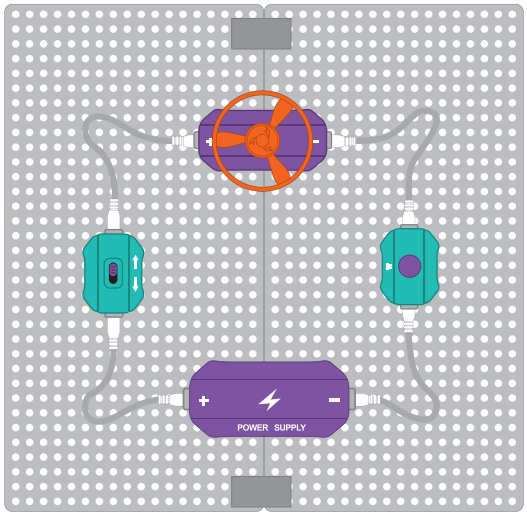
Shine light on the photosensitive module to see how the motor module responds?



Why is that?

The light hits the photosensitive module, the photosensitive module's ability to block the current is reduced, the current flows through the resistance, and the motor starts to turn.

40 Flying Saucer



(Motor module preinstalled with flying saucer accessories)

Connecting Circuit

1. Insert the cable into the positive pole and switch module of the power module
2. Insert the switch module into the positive terminal of the motor module with the second connecting wire
3. Insert the negative electrode of the motor module into the key module with the third connecting wire
4. Then insert the fourth cable into the other side of the key module to the negative terminal of the power module

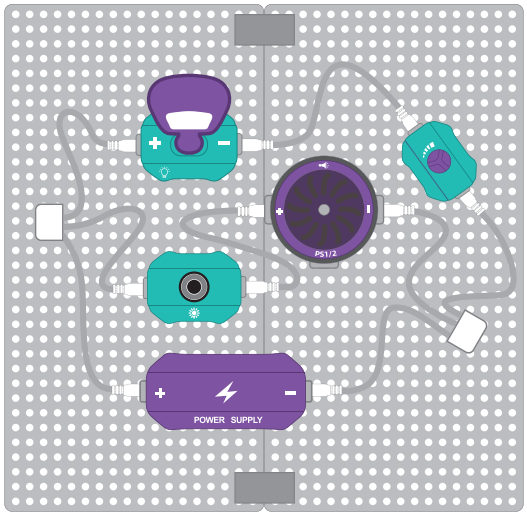
OPERATION:

Close the switch, press the key module and see how the motor module responds?

Why is that?

Close the switch, the current through the connecting line to the motor module, press the key, forming a complete closed circuit.the faster the motor rotates, the upward lift the flying saucer gets as it rotates.

41 Light Control Sound Engineer



(USB module pre-installed table lamp accessories)

Connecting Circuit

1. Insert the three-end cable into the positive terminal of the power module, the photosensitive module and the positive terminal of the USB table lamp
2. Insert another connecting wire into the other side of the photosensitive module to the positive terminal of the horn module
3. Insert the second cable into the USB table lamp negative terminal to the rotating module
4. Then insert the second three-end connecting wire into the other side of the rotating module, the negative terminal of the horn module and the negative terminal of the power module

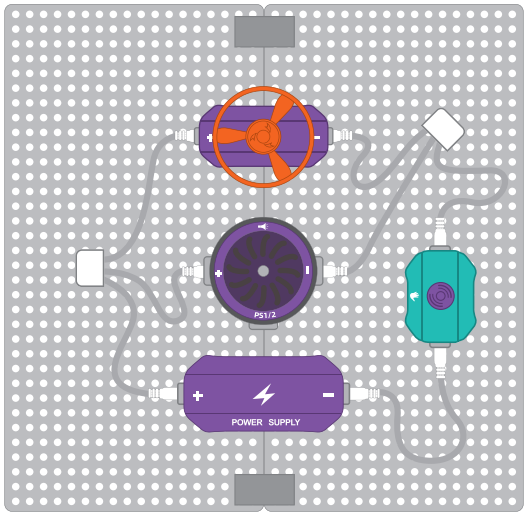
OPERATION:

1. How will the USB lamp react when rotating the module?
   (Rotating module controls USB table lamp separately)
2. How will the horn module react when the light illuminates the photosensitive module?
   (Photosensitive module operates horn module separately)

Why is that?

A rotating module and a USB table lamp, a photosensitive module and a horn module are connected in a circuit, respectively. The rotating module can control the brightness of the bulb, and the photosensitive module controls the horn sound.

42 Seismic Alarm



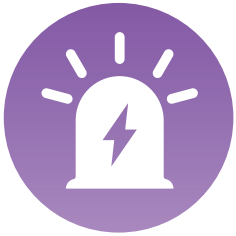
(Motor module preinstalled with flying saucer accessories)

Connecting Circuit

1. Insert the three-end connector into the positive terminal of the power module, horn module and motor module
2. Insert the motor module negative terminal, horn module negative terminal and vibration module with the second three-end connecting wire
3. Insert another cable into the other side of the vibration module to the negative terminal of the power module

OPERATION:

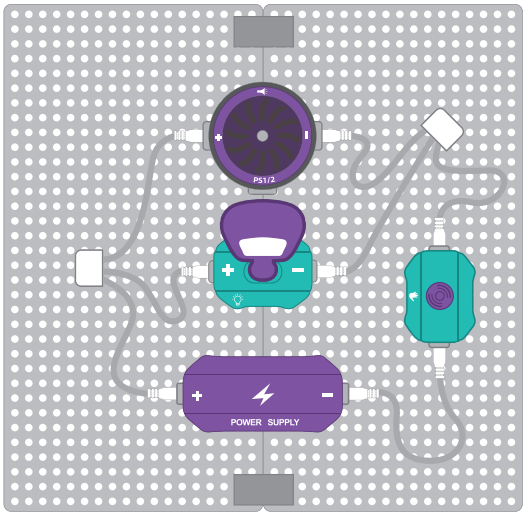
Gently tap the vibration module, horn module, motor module will have what response?



Why is that?

Earthquake will produce vibration, vibration module received signal current flow through the motor module and horn module to send alarm information.

43 Seismic Alarm2



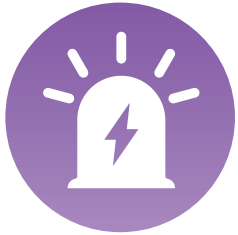
(USB module pre-installed table lamp accessories)

Connecting Circuit

1. Insert the three-end cable into the positive terminal of the power module, the positive terminal of the USB table lamp and the positive terminal of the horn module
2. Insert the horn module negative, USB table lamp negative and vibration module with the second three-end cable
3. Insert another cable into the other side of the vibration module to the negative terminal of the power module

OPERATION:

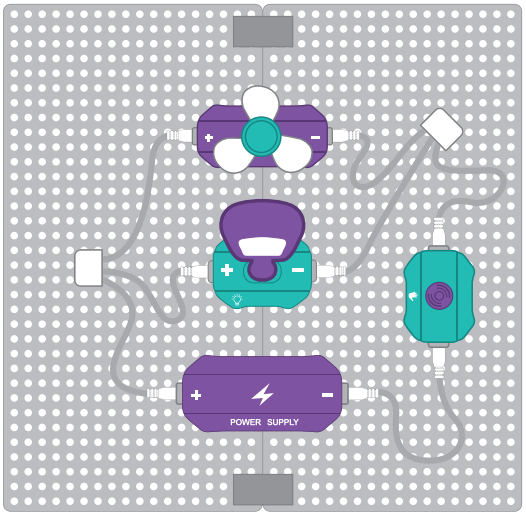
Gently pat the vibration module, horn module, USB desk lamp will have what reaction?



Why is that?

Earthquake will cause vibration, the vibration module receives the signal and current flows through the USB desk lamp and horn module to send alarm information.

44 Vibrating Pinwheel



(USB module pre-installed table lamp accessories)
(Pre-installed fan head accessories for motor module)

Connecting Circuit

1. Insert the three-end cable into the positive terminal of the power module, the positive terminal of the USB table lamp and the positive terminal of the motor module
2. Insert the negative electrode of the motor module, the negative electrode of the USB table lamp and the vibration module with the second three-end cable
3. Insert another cable into the other side of the vibration module to the negative terminal of the power module

OPERATION:

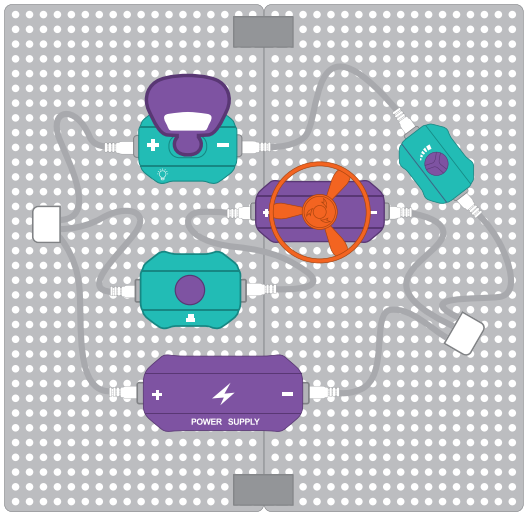
Gently pat the vibration module, motor module, USB lamp will have what reaction?



Why is that?

When the vibration is generated, the vibration module receives the signal and the current passes through the motor module and the USB table lamp. With the size of the current, the motor rotates and the USB table lamp flashes.

45 Dimming Saucer



(USB module pre-installed table lamp accessories)
(Motor module preinstalled with flying saucer accessories)

Connecting Circuit

1. Insert a three-end cable into the positive terminal of the power module, the key module and the positive terminal of the USB table lamp
2. Insert another connecting wire into the key module to the positive terminal of the motor module
3. Insert the second cable into the negative electrode of the USB table lamp to the rotating module
4. Then insert the second three-end connecting wire into the other side of the rotating module, the negative electrode of the motor module and the negative electrode of the power module

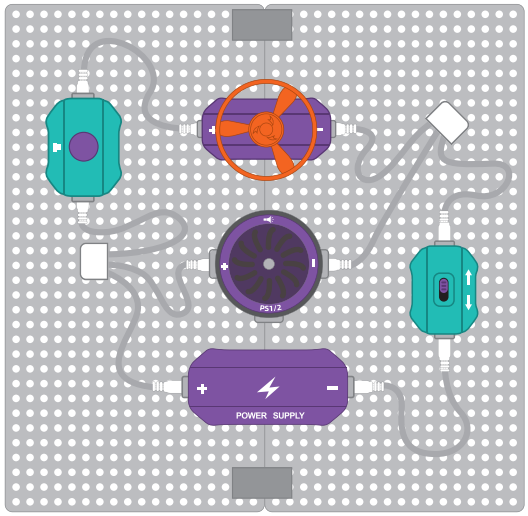
OPERATION:

1. How will the USB lamp react when rotating the module?
(Rotating module controls USB table lamp separately)
2. Press the key module, how will the motor module react?
(The key switch controls the motor module separately)

Why is that?

Slowly twist and rotate the module, the current flowing through the table lamp changes, and the brightness output of the USB table lamp also changes. Pressthe key module, the current flows through the output of the saucer to adjust thesize, and then works through the power supply.

46 Musical Windmill



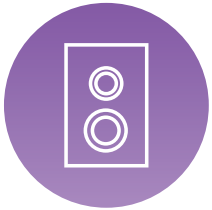
(Motor module preinstalled with flying saucer accessories)

Connecting Circuit

1. Insert the three-end cable into the positive terminal of the power module, the positive terminal of the horn module and the key module
2. Take the other first connecting wire and insert it into the key module to the positive terminal of the motor module
3. Insert the motor module negative terminal, horn module negative terminal and switch module with the second three-end connector
4. Take the second cable and insert it on the other side of the switch module to the negative pole of the power module

OPERATION:

Close the switch, what happens to the horn module?
Press the key module, how will the motor module respond?

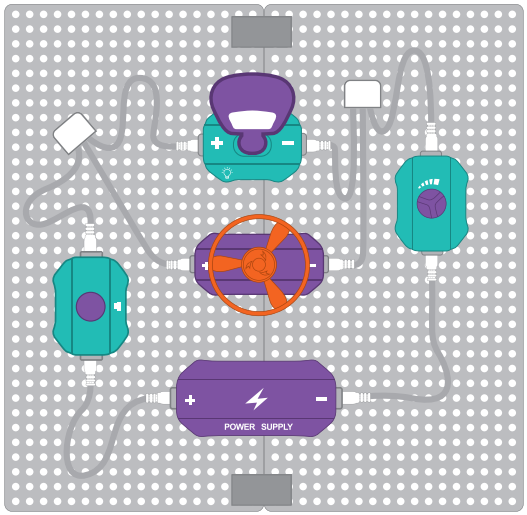


Why is that?

Switch and key each control motor module, horn module, only open the switch, horn module sound.then press the key module the saucer works through the current.

47-48 Ultimate Instruction


(Switch Module)



(USB module pre-installed table lamp accessories)
(Motor module preinstalled with flying saucer accessories)

Connecting Circuit

1. Insert a cable from the positive terminal of the power module to the key module
2. Take a three-end connecting wire and insert it into the key module, the positive electrode of the motor module and the positive electrode of the USB table lamp
3. Take the second three-end cable and insert it into the negative electrode of the USB table lamp, the negative electrode of the motor module and the rotating module
4. Insert the second cable into the other side of the rotating module to the negative pole of the power module

OPERATION:

1. Press the key and twist the rotating module. What will be the reaction of USB table lamp and motor module?
2. Change the key module into a switch module, close the switch, twist and rotate the module, what will be the reaction of USB table lamp and flying saucer? (Experiment 48)

TIPS: The key module can be replaced with the switch module

Why is that?

The USB table lamp and the motor module are simultaneously connected in a circuit of the rotating module. It is necessary to rotate the rotating module to adjust the voltage, press the key or close the switch to form a circuit, and both work at the same time.

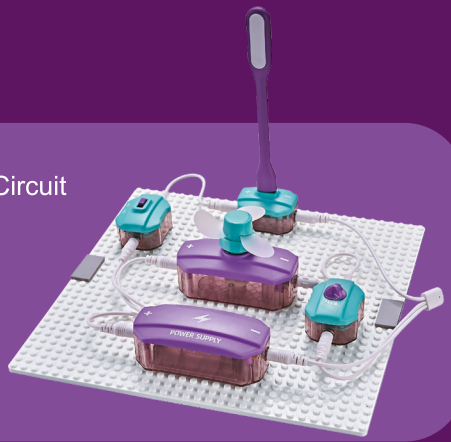
PHYSLCAL SCIENCE

KNOWLEDGE OF CIRCUIT

BEGINNING ABILITY

TECHNOLOGICAL CREATIVITY

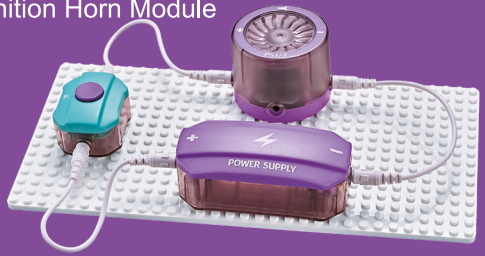
Cognitive Circuit Parallel



Cognizant Resistance



Recognition Horn Module



Understand The Photosensitive Switch

