

# Magnet Fishing



**Education**  
IOWA PBS

**Nature Cat and his friends love exploring the outdoors and learning about science and nature. In this simple science activity, your child will explore the science of magnets.**



## How to Fish with Magnets

Many people use magnets to hold loose papers or photographs on a refrigerator. Magnets can also be used to attach the corners of a shower curtain to a bathtub or to temporarily attach two parts of a toy together such as the two paws on a stuffed animal. Magnets also have much broader uses, such as in speakers, microphones, electric guitars, compasses, and large medical equipment. In this activity, your child will conduct a simple investigation to explore small, common items in your house and determine if the magnet will stick to them.

### While You Play

**Begin this activity by talking with your child about the different ways you use magnets in your house.**

1. Look for magnets around your house. Where did you find them? What is their use?
2. Try touching the magnet to the refrigerator or kitchen sink. What happens?
3. What other items in your house can a magnet stick to? (Warning: Avoid electronic items such as the television, computer, cell phone, or stove.)
4. What would you add to your paint to make it look and feel more like the moon's surface?

## The Science Behind the Fun

### Physical Science:

Your child is exploring magnets and using a magnet as a tool to determine if household items are magnetic or not magnetic.

### Science Inquiry:

Your child is using a tool to sort, compare, and contrast household items based on whether they are magnetic.

### Vocabulary:

**Magnet** pronounced [mag-nət]

A piece of iron (or some other metals) that has a magnetic field and is attracted to other iron containing objects

# Magnet Fishing

## What you'll need

- Stick (about 8-12" long)
- String or yarn (about 12" long)
- Refrigerator or craft magnet
- 2 empty jars (or 2 medium-sized plastic bowls)
- 1 large bowl or tray
- Assortment of any small items from around your house (as appropriate to child's age) Fill a large bowl or tray with magnetic and non-magnetic items.

Examples of items: rubber balls, feathers, paper clips, rocks, shells, sticks, utensils, jar lids, cotton balls, crayons, q-tips, small plastic toys, coins, measuring spoons, sponges, bottle caps, nuts and bolts, key rings, keys, tape, binder clips, plastic or magnetic letters, toy cars, shoe laces, markers, chalk, etc.

## Directions

### Step 1

Tie one end of the string to one end of the stick. Tie the other end of the string to a magnet. This creates your "fishing pole."



### Step 2

Label your two jars. Label one jar with the words "Sticks to the magnet" and the other jar with "Does not stick to the magnet."



### Step 3

Fill a large bowl or tray with an assortment of magnetic and non-magnetic items from around your house.



## Directions continued

### Step 4

Have your child touch and feel each of the items. Predict whether the magnet will stick to each item. Why? As your child progresses through the activity, she will become more confident in predicting which items will stick to the magnet.



### Step 5

Using the fishing pole that you made, lower the magnet end of the pole into the pile of items and then slowly pull the pole back out of the pile. Is anything stuck to the magnet? If so, carefully detach the item from the magnet and put it into the jar/bowl that is labeled "Sticks to the magnet."



### Step 6

Go fishing again and again until you have tried to "catch" each item on the end of your fishing pole. For any items that stick, put them into the "Sticks to the magnet" jar. For any items that won't stick, put them in the "Does not stick to the magnet" jar.



### Step 7

Talk about each item after they are sorted into the two jars. Were your predictions correct? Do you have more items that are magnetic (stick to the magnet) or more items that are not magnetic (don't stick to the magnet)?



## More ways to play Nature Cat

- Nature Cat Marvelous Magnets

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