



Look, sort and test materials

What this pack helps with

Distinguish an object from its material, record observed properties, group real samples and use a small absorption test to explain a material choice.

Before you start

The child can name familiar objects and describe what they notice. The adult checks the actual materials rather than guessing from colour or appearance.

What you need

Four large, safe items, for example a wooden spoon, a metal spoon, a paper strip and a cloth. For page 5: a tray, plain paper towel, a smooth piece of uncoated foil and a dropper or teaspoon of room-temperature water.

Use the pack

Child pages are 2-5; pages 6-7 give guidance. Adult supervision throughout. Use clean, blunt, undamaged items; smooth foil edges. No glass, sharp edges, tasting or forceful bending. The adult adds the water; keep it away from electrical items and wipe spills.

Print A4 at actual size (100%). Colour is optional. These are short practice sessions, not a standardised test. Free to print and share.

Respond to the child

Let the child point, draw or talk; record help given. Keep the actual observation even when it differs from a prediction. Discuss the particular samples rather than making a rule about every material.

Scope and source

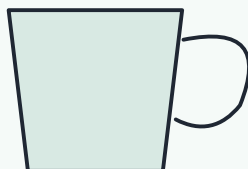
A small selection of materials and properties, not the full Year 1 materials curriculum. No material-origin or seasonal activity is claimed. Bending depends on the sample and shape. The water task explores absorption; it does not prove waterproofness.

DfE Science programme, Year 1 everyday materials and KS1 working scientifically (England; OGL v3.0). Original TheLearnDen text and diagrams; not an official assessment.



LEARN TOGETHER

Object or material?



This example is a plastic cup.

The object is a cup.

The material is plastic.

1 These are spoons made from two different materials.



wooden spoon

Object:

Material:



metal spoon

Object:

Material:

What is the same? What is different?



OBSERVE REAL OBJECTS

Look and describe

2 Choose two safe objects with an adult.

Draw and describe each one.

Object:

Material:

It feels or looks:

Object:

Material:

It feels or looks:

Not sure of the material? Ask an adult.



GROUP BY A PROPERTY

Does it bend gently?

3 An adult chooses four safe objects.

Try a gentle bend. Stop if it resists.

Write or draw each object in a group.

Bends gently

**Does not
bend gently**

Not sure

Choose one object. Explain its group.

Could two plastic objects bend differently?

Talk about what you noticed.

A SMALL TEST WITH AN ADULT

Where does the water go?

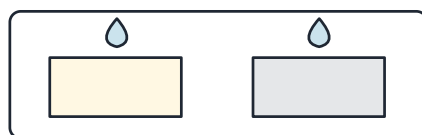
4 Predict: which will soak up the drop?

I think:

Put paper towel and foil in a tray.

An adult adds one drop to each.

Look after counting slowly to 10.



Sample	What happened to the water?
Paper towel	
Foil	

Which would help mop up a spill?

I would choose:

Say or write why. Use what you saw.

Wipe up the water with your adult.



What to look for

Only the labelled examples in task 1 have fixed keys. Actual observations, groupings and test results depend on the samples.

1 · Fixed key Both objects are spoons. The first material is wood; the second is metal.

Use the explicitly labelled examples. “Wooden” is an acceptable spoken description of wood. Do not infer the material of an unlabelled real spoon from colour alone.

Look for: Object name and material are distinguished. The same kind of object can be made from different materials.

Next: Hold two real spoons of confirmed different materials and say both names: a spoon made of wood, a spoon made of metal.

2 · Open response Example only: spoon - wood - smooth; cloth - fabric - soft. Actual samples may differ.

Records that match the chosen objects. Accept pointing, drawing or adult scribing. “Not sure” is valid for a material until an adult checks it; appearance alone may not identify a coating or composite.

Look for: Two objects are recorded separately. Object and material are not treated as the same name. Descriptions come from safe observation of these samples.

Next: Compare just one pair of properties, such as rough/smooth, on the actual objects. Check uncertain material names with the adult.



ADULT MODELS AND FEEDBACK · 2 OF 2

What to look for

Only the labelled examples in task 1 have fixed keys. Actual observations, groupings and test results depend on the samples.

3 · Open response Example only: a paper strip may bend gently; a wooden spoon may not. A plastic item can belong in either group depending on the sample.

Group each of the four labelled samples by what happens with a gentle attempt. Stop if it resists. Accept “not sure”; do not force a brittle object or insist that every plastic/metal sample behaves alike.

Look for: The child uses the same gentle-bending question for each sample. Groups describe these objects, not universal properties of every material. The child can explain one placement using an observation.

Next: Try a thin flexible plastic item beside a rigid plastic item, chosen by an adult, to show that material name alone does not determine the result.

4 · Open response Usually the paper towel takes in the drop while it stays on the foil surface. Record what actually happens and choose the sample supported by that observation.

Accept a prediction even when it differs from the outcome. For the conclusion, look for evidence that water entered a sample rather than remaining on top or running off. Unexpected results should be checked, not overwritten.

Look for: Both samples receive one similar-sized drop and are observed after the same count. Prediction and observation are recorded separately. The material choice refers to observed absorption; this does not establish waterproofness.

Next: If unclear, use fresh dry samples and repeat the same small test with an adult. Talk about the difference between soaking in, sitting on top and running off.

My practice trail

Optional: colour a circle after trying and discussing a task. This records practice, not a test score.



One next step: _____