Budding palaeontologists will love uncovering these tactile dinosaur bones. As well as building on children's existing knowledge of dinosaurs, the bones are perfect for collecting, investigating, sorting and measuring, with plenty of opportunities for using early maths language. The bones are ideal for using with small groups of children or supporting an individual child, and great for taking the learning outdoors. The set contains twelve bones, three each of the following lengths: 6cm, 8cm, 10cm and 12cm.



Dig in!

Wherever you bury the bones, children will love digging for them. To extend the learning, bury the bones alongside other prehistoric remains, such as Let's Investigate Fossils or Prehistoric Teeth:

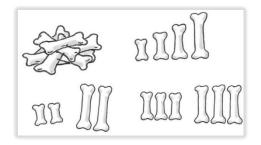
• Hide the bones in a tray under sand or compost, maybe with a tantalising glimpse of bone visible. Small spades and garden forks will help the children to carefully uncover the bones, and brushes will help them clear any remaining soil. Offer magnifying glasses so they can examine their finds more closely.

• Alternatively, use the water tray and place the bones under the water – or even under some slime to create a dinosaur swamp.

- For bones encased in ice, freeze bones in small tubs half-full of water. Once frozen, put the ice blocks in a tray and children can explore different ways to melt the ice, such as pouring warm water over it, holding it in their hands or putting it in a sunny spot.
- To create rocks that children can break open to find a bone inside, mix together equal parts of flour, salt, sand and used coffee grounds. Gradually mix in small amounts of warm water until the mixture sticks together and forms a soft dough. Encase a dinosaur bone in dough and leave in a warm place for several days to dry out fully. Once dried, the children will have a cracking
 - time breaking the 'rocks' open to discover a bone hidden inside! (If the 'rocks' are too hard for children to break open with their hands, add some water and they will become crumbly and easy to break.)
- After children have uncovered the dinosaur bones from wherever they were hidden, encourage them to
 wash the bones carefully in a tray of warm soapy water, using soft brushes. When the bones are cleaned
 up, children could place them in a tray for further
 examination, or sort them into several bowls.
- Alternatively, hide the bones all over the outdoor area for children to find in a scavenger hunt. Encourage them to use a clipboard and paper to make a tally mark for each bone they find, then count them up at the end.



Discussing dinosaurs



The bones provide plenty to talk about:

• What do the children notice about the lengths of the bones? Which are longer or shorter? Encourage them to sort the bones into groups of the same length and order them by size.

- What dinosaurs might these bones be from?
- Which part of a dinosaur's body might these bones be from? For example, are they the shape of leg bones, ribs or a skull? Are they the strong bones that a dinosaur needed in its legs to hold up its heavy body?
- How old might the bones be? What might they have been buried in to stay in one piece for so long?
- Look at photos of real dinosaur bones that have been discovered. How big are they? You might like to use

chalk outside for a scale drawing of a dinosaur bone so children understand how enormous they were! For example, a titanosaurus thighbone can be 2.4m long, and a T-rex thighbone 1.3m.





Palaeontologist play

The dinosaur bones are great for role play:

- Create a dig in an outdoor area for your palaeontologists to work in.
 Tape the area off and hide bones in a sand tray, alongside other remains such as Fossils or Prehistoric Teeth. Provide the necessary tools for them to work with, such as spades, brushes, magnifying glasses, trays, clipboards and a digital camera. You could also include a tent, sleeping bags, cooking equipment, wide-brimmed hats, umbrellas and wellies. Encourage children to record what they find and take photos for display in a Dinosaur Bones Gallery.
- Together with the children, use your discoveries to create a
 dinosaur museum. Talk about what the children think should go
 in the museum you could include model dinosaurs, information
 posters, photos, display signs, labels, name badges or lanyards,
 and the bones, of course. Model how to be a visitor to the
 museum and ask the curators about their exhibits.

Small world, big dinosaurs

The bones are also great for small world play:

- For a land of the dinosaurs, partly bury the bones in a sandy floor and add dinosaur figures or wooden characters, a volcano, lava, fossils, ferns and rocks.
- Create a dinosaur swamp with slime, plants, rocks, dinosaur figures and bones.
- Make a small world palaeontology dig by burying the bones in a tray of sand or compost, then adding small world people to be palaeontologists. These will need some tools to use for digging, as well as tents and other equipment, and you can add rocks and plants for scenery.



Get talking – useful words

Palaeontologist, excavate, spade, brush, record, examine, museum, curator, exhibit, display, length, longer, shorter

Books about dinosaur bones

Bone, Bones, Dinosaur Bones by Byron Barton
Whose Dinosaur Bones Are Those? by Chihiro Takeuchi
Dinosaur Dreams: A Funnybones Story by Allan Ahlberg