FROM TOWERING TITANOSAURS TO TINY-BUT-TERRIBLE MEAT-EATERS, FROM FIRST EVER FINDS TO EARTH-SHATTERING EXTINCTIONS, NATIONAL GEOGRAPHIC KIDS’ DINO RECORDS IS BURSTING WITH THE MOST MIND-BLOWING STATS AND STORIES OF THE DAYS WHEN DINOSAURS ROAMED THE EARTH.

Meet the dinos crowned king in each category, check out the runners-up that barely missed the top prize, and feast your eyes on fantastic facts and features, awesome prehistoric profiles, entertaining infographics, amazing discoveries, fun and games, and so much more! In a dynamic yet easy-to-read format, Dino Records is a visual feast of colorful illustrations surrounded by a high-energy design and fascinating information that will captivate kids with all the extremes.

THE MOST AMAZING PREHISTORIC CREATURES EVER TO HAVE LIVED ON EARTH!

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kids.nationalgeographic.com


ISBN 978-1-4263-2794-0 PRINTED IN CHINA
Titanosaurs were mega-colossal sauropod dinosaurs—long-necked plant-eaters whose ranks included the largest dinos that ever lived. In 2012 a rancher in a remote area of the Patagonia region of Argentina found a bone belonging to what scientists now believe may be the largest titanosaur of all ... and the biggest animal ever to have walked the Earth. More than 220 bones from this still-to-be-officially-named species (which is being called simply "the Titanosaur") have been excavated, allowing paleontologists to estimate the weight of this humongous herbivore at a whopping 70 tons (63.5 t)—about as much as 10 African elephants, the largest land animal alive today. The Titanosaur’s neck alone was about as long as a school bus, and its heart—which may have weighed as much as three adult humans—could pump almost 24 gallons (90 L) of blood in one beat!
Among the titanosaur fossils discovered was a femur (thigh bone) longer than an adult human.

**Type:** Sauropod

**Diet:** Herbivorous

**Lived:** 100 to 95 MYA

**Range:** South America

**Weight:** 70 tons (63.5 T)

**Length:** 122 feet (37 M)

**Height:** 65 feet (20 M)

**Biggest Dino Records**
BIGGEST ARMORED DINO

ANKYLOSAURUS (AN-KYE-LOH-SORE-US)

WARNING: Approach with caution. The squat, four-legged Ankylosaurus was no fearsome predator, but it was covered in spikes and in defensive armor made from hundreds of bony plates—even on its eyelids! About 20 feet (6 m) long, the largest of the “tanklike” herbivores known as ankylosaurs roamed North American woodlands at the end of the Cretaceous period.

Meet some record-breaking dinos that were the biggest of their kind.
BIGGEST DINO WITH BIRDLIKE WINGS

ZHENYUANLONG (JEN-HWAHN-LONG)
The 125-million-year-old nearly complete skeleton of this prehistoric raptor was unearthed in northeast China’s Liaoning province. Could the largest dino with birdlike wings and feathers ever found actually fly? Scientists think not. It had arms that were short compared with other dinos in its family, and—at about 44 pounds (20 kg)—was pretty heavy. Scientists think the wings might have been for display, like a peacock’s.

BIGGEST PLATED DINO

STEGOSAURUS (STEG-OH-SORE-US)
My, what beautiful ... plates you have! Up to 30 feet (9 m) long and weighing more than 2 tons (1.8 t), late Jurassic Stegosaurus was the largest of the plate-backed, plant-eating dinosaurs known as stegosaurs. It sported two rows of staggered, diamond-shaped plates along its neck, back, and tail. Scientists over the years have debated the purpose of the pointy plates but now suspect that they were used for display, perhaps to attract potential mates.

BIGGEST DOME-SKULLED DINO

PACHYCEPHALOSAURUS (PACK-EE-SEF-AH-LOW-SORE-US)
The largest of the pachycephalosaurs (“domed dinosaurs”), late Cretaceous Pachycephalosaurus had a supersized skull-cap—about 20 times thicker than other dino skulls. Some experts think these plant-eating boneheads may have used their distinct domes to head-butt each other, but others say the creature’s neck was not strong enough to withstand the cranium collisions without breaking. Now that’s a head-scratcher!
Scientists don’t know for sure whether plant-eating dinos used their amazing attributes to battle their carnivorous cousins, but these herbivores were armed with some pretty wicked ways they could have used to defend themselves.

**ARMOR: GASTONIA**

(AGST-TONE-EE-AH)

Prickly Gastonia was covered in heavy, defensive armor. To protect it from the strong jaws of meat-eaters it had four horns on its head, thick layers of bone shielding its brain, rows of spikes sticking out from its back, and a tail with triangular blades running along each side.

**SPIKES: KENTROSAURUS**

(KEN-TROH-SORE-US)

Stand back! This cousin of Stegosaurus had paired spikes along its tail, which it could swing at attackers with great speed. One paleontologist estimated that Kentrosaurus could have swung its treacherous tail fast enough to shatter bones!
CLUB TAIL: **ANKYLOSAURUS**

(AN-KYE-LOH-SORE-US)

Steer clear! *Ankylosaurus* possessed a heavy, knobby tail that it could have used to whack attackers. It may not have totally protected the tanklike late Cretaceous dino from a determined *T. rex*, but a serious swing could have generated enough force to do some real damage to its rival reptile.

WHIP TAIL: **DIPLODOCUS**

(DIH-PLOD-UH-KUS)

Some scientists think this late Jurassic giant’s tail—about half the length of its 90-foot (27-m) body—could have been used like a whip and swished at high speeds, creating a loud noise that would send potential predators running.

HORNS: **TRICERATOPS**

(TRI-SER-UH-TOPS)

There’s no evidence *Triceratops* ever used its horns to combat late Cretaceous snack-craving carnivores. But scientists do believe the famous three-horned creature used its frills and horns in battle with other members of its species.
One of the weirdest things about dinosaurs is how long ago they lived. So long that it’s really hard to imagine. Take a look at when these familiar animals appeared on Earth—and how much time passed between some key appearances.

**BY THE NUMBERS**

**HOW LONG AGO WAS THAT?**

- **TYRANNOSAURUS REX**
  - 65 million years ago (Late Cretaceous)

- **MAMMOTH**
  - 5 million years ago

- **HOMO SAPIENS**
  - 200,000 years ago

- **IGUANODON**
  - 125 million years ago (Early Cretaceous)
Eoraptor

228 million years ago (Late Triassic)

Coeolophysis

166 million years ago (Middle Jurassic)

Stegosaurus

159 million years ago (Late Jurassic)

Megalosaurus

210 million years ago (Late Triassic)

Weirdest
The winner for weirdest dino is so zany, even its discovery was puzzling! In 1965 in the Gobi desert, fossil hunters found a pair of eight-foot (2.4-m)-long arms sporting three eight-inch (20-cm)-long claws. To what mysterious creature were they once attached? Scientists could only imagine. Nearly five decades later, they had located enough other fossils of *Deinocheirus mirificus* ("unusual terrible hand") to finally develop a clearer picture of the uncanny animal.

*Deinocheirus* walked tall on two legs and was as gigantic as *T. rex* ... and yet, somehow, looks like it would have been a lot less intimidating to creatures in the late Cretaceous. Maybe it’s the peculiar proportions—the long, pointed head; the ducklike, toothless snout; the huge, gangly arms (the longest known of any animal on two legs!); the sail-like hump on its back; the big belly—or maybe it’s the mash-up of all of the above. That’s one quirky creature!
DEINOCHERIUS
(DYE-NUH-KYE-RUS)

TYPE: ORNITHOMIMOSAUR

DIET: OMNIVOROUS

LIVED: 70 MYA

RANGE: MONGOLIA

WEIGHT: 13,000 POUNDS (6,000 KG)

LENGTH: 36 FEET (11 M)

HEIGHT: 16 FEET (4.9 M)
Meet some dinos that defy imagination.

**THE MYSTERY DIGIT**

**IGUANODON** (IG-WAN-OH-DON)

Cool thumb, bro’. Scientists are not entirely sure why *Iguanodon* had spiked thumbs, but some hypotheses are that this enormous early Cretaceous plant-eater used them for close-range defense against predators, in combat with other *Iguanodon*, or for (yawn) digging into fruits and seeds. That’s one strange spike!
THE DRACULA DINO

PEGOMASTAX (PEG-OH-MAST-AX)

A beak like a parrot, teeth like a vampire, and quills like a porcupine? Yup, it’s really weird. This tiny, two-legged, 200-million-year-old herbivore was less than two feet (0.6 m) long and weighed about as much as a kitty cat. *Pegomastax’s* fierce-looking fangs might lead you to believe they did some damage in the Jurassic, but this pint-size plant-eater likely stuck to nuts and seeds.

THE COLOSSAL CLAW

THERIZINOSAURUS (THERE-IH-ZIN-OH-SORE-US)

*Therizinosaurus*’s approximately three-foot (0.9-m)-long talons—the longest claws known of any animal—look like they could have made mincemeat of potential prey. But *Therizinosaurus* was actually an herbivore that researchers believe used its claws to pull down tree branches for snacking. The massive, five-ton (4.5-t) dino likely still used its monster claws to defend itself against predators in late Cretaceous Mongolia, where it lived 70 million years ago.

THE ORIGINAL BIG BIRD

GIGANTORAPTOR (GEE-GANT-OH-RAP-TER)

Feathered, toothless, and towering, *Gigantoraptor* is the biggest oviraptorosaur ever found: 3,000 pounds (1,400 kg) and (at its shoulder) twice the height of a man. Despite its odd and outsized appearance, the omnivorous *Gigantoraptor* was probably not a fearsome predator; the 26-foot (8-m)-long chickenlike creature likely ate plants—though it possibly also swallowed some smaller animals whole.