


How fast was a Velociraptor?

To tell how fast an animal could run, you calculate its hind limb index. To find the hind limb index, you measure the length of its metatarsals (foot bones) add it to the length of its tibia (shin bone) and divide that sum by the length of its femur. This will give you a number, generally between 1 and 2. The higher the number, the faster the animal can sprint. Hind limb index seems to correlate pretty well with sprinting speed in modern African mammals. For example the elephant, a slow runner, has a hind limb index of only 1.25 or so. Rhinos have a higher hind limb index of 1.5, and a higher sprinting speed. Lions, with an index of 1.7 are faster still. Africa's fastest mammal of all, the cheetah, has the highest hind limb index--a whopping 2.1!



 Velociraptor turns out to have a lower hind limb index than some other dinosaurs, including Struthiomimus, Othnielia, Drinker and Hypsilophodon. Any one of these dinosaurs could have beaten Velociraptor in the 50-meter dash. There certainly isn't any reason to believe that Velociraptor could run as fast as a cheetah, as Michael Crichton stated in Jurassic Park. On the other hand, Velociraptor was faster than Apatosaurus, Triceratops or Tyrannosaurus rex. And, yes, much faster than a human being!

