Locomotion speeds of various dinosaurs MARY DOUGHERTY, SCOTT LEE, University of Toledo — Most students have a passing curiosity about dinosaurs. Piquing this interest is an excellent tool to engage students. A methodology for estimating the locomotion speed of an animal based upon their footprint tracks is developed. Using this technique, an analysis of the locomotion speeds of various dinosaurs is performed. The tracks studied include 28 theropods (meat-eating dinosaurs), 23 sauropods (the “long-necked” herbivores), 28 non-armored, non-sauropod herbivores and 10 armored, non-sauropod herbivores. The theropods show the fastest locomotion speed as well as the greatest variety of speeds while the armored dinosaurs are the slowest.