



Colorado Scientific Society Lecture Announcement

Thursday, May 21, 2026, Calvary Church Golden

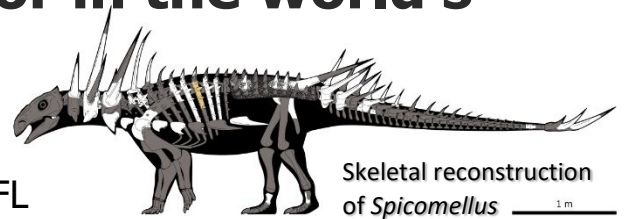
El Mers II Formation, Middle Atlas Mountains, Morocco



2026 Samuel F. Emmons Lecture

Spicomellus: extreme armor in the world's oldest ankylosaur

Dr. D. Cary Woodruff, Phillip and
Patricia Frost Museum of Science, Miami, FL



Skeletal reconstruction
of *Spicomellus* 1m

Lecture Highlights:

The ankylosaur *Spicomellus afer* is truly one of the most bizarre dinosaurs discovered to date. Covered head to tail with elaborate osteoderms, including cervical spikes nearly a meter in length, *Spicomellus* looks more Hollywood kaiju than factual dinosaur. However, it's not just the appearance of *Spicomellus* that makes it unique. The construct of its bizarre armament is unlike any other vertebrate—extinct or extant. Being from the Middle Jurassic, *Spicomellus* is also the oldest ankylosaur thus far known; and with this bizarre body armor, is rewriting the functional and evolutionary role of armor in this dinosaurian clade. *Spicomellus*, along with other Gondwanan clades found within the El Mers Group, are helping to further push back, and elucidate, the origins of several dinosaurian lineages.



Speculative rendering by Matt Dempsey

Speaker Background:

Dr. Cary Woodruff is the Curator of Vertebrate Paleontology at the Phillip and Patricia Frost Museum of Science in Miami, Florida where he is building a dinosaur collection from scratch. Cary has published numerous scientific papers involving taphonomy, histology (microscopic anatomy), dinosaur vision, fossil laws and regulations, dinosaur biomechanics, ontogeny (growth and development), soft-tissue preservation, dinosaur behavior, and human-fossil interactions. Cary's main research specialization is dedicated to sauropod ("long-necked") dinosaurs studying everything from how long it took them to grow up, how their skeletons changed during growth, how they moved their enormous bodies, how they behaved, how they fed, what their anatomy was like. Cary has also published a number of books on dinosaurs for kids.



Education

BS & MS in Earth Science at Montana State Univ./Museum of the Rockies
PhD in Ecology & Evolutionary Biology at Univ. Toronto/Royal Ontario Museum

Keywords

Ankylosaur, Middle Jurassic, osteoderms, cervical spikes, El Mers Group, Morocco

