

CURRICULUM VITAE

F. Robin O'Keefe, Ph.D.

Professor

Drinko Distinguished Research Fellow

Department of Biological Sciences, Marshall University

S267, One John Marshall Drive

Huntington, WV 25755

phone: 304 696 2427

email: okeefef@marshall.edu **website:** <http://science.marshall.edu/okeefef>

Education

1995-2000 **Ph.D., University of Chicago.** Evolutionary Biology; 6/2000.

1987-1992 **B.S., Stanford University.** Biology (Honors); 6/1992.

Professional Experience

8/15-pres. **Professor**, Marshall University, Department of Biological Sciences.

Vertebrate Anatomy 310, Human Anatomy 227, Introductory Biology 105, Graduate Advisorship.

8/11-pres. **Adjunct Professor**, Joan C. Edwards School of Medicine, Marshall University. **Course Director, Gross Anatomy, PT 700.**

6/16-pres. **Research Associate**, National Museum of Natural History, Smithsonian Institution.

6/14-pres. **Research Associate**, Natural History Museum of Los Angeles County; The Tar Pit Museum.

8/09-8/15 **Associate Professor**, Marshall University, Department of Biological Sciences.

8/06-8/09 **Assistant Professor**, Marshall University, Department of Biological Sciences.

8/01-8/06 **Assistant Professor**, New York College of Osteopathic Medicine, Department of Anatomy. **Course Director, Gross Anatomy.**

8/00-8/01 **Postdoctoral Fellow**, New York College of Osteopathic Medicine, Department of Anatomy.

9/96-12/99 **Teaching Assistant**, University of Chicago.

10/92-8/95 **Textbook Editor**, Secondary Science, Addison-Wesley Publishing Company.

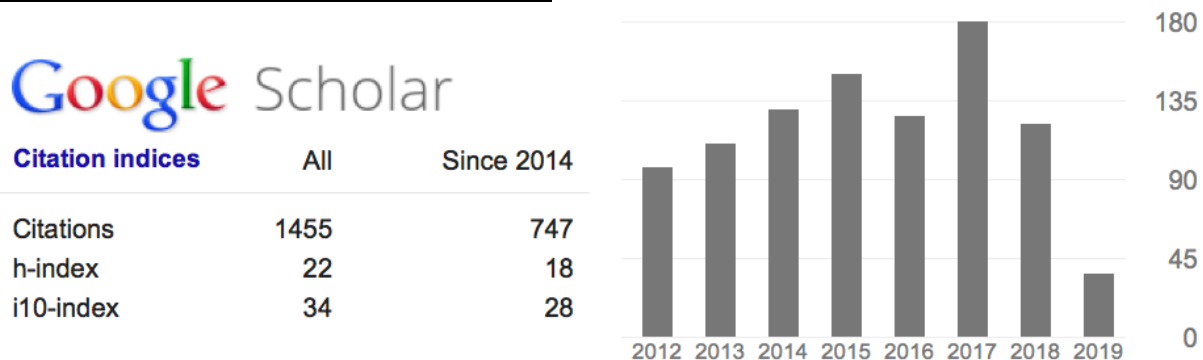
9/90-6/92 **Teaching Assistant**, Stanford University.

Honors and Awards

2013 **John D. Drinko Distinguished Research Fellow**, Marshall University

1999-2000 **Nierman Award Winner**, University of Chicago
 1995-2000 **Graduate Fellowship**, University of Chicago
 1999 **Predoctoral Fellowship**, Honorable Mention, Soc. Vert. Paleo.
 1994 **Award for Team Excellence**, Addison Wesley Publishing Co.
 1992 **Departmental Honors**, Biology, Stanford University
 1987-1991 **Stanford Undergraduate Scholarship Winner**
 1987-1991 **National Merit Scholarship Winner**

Citation Indices (current 2/19/2019)



Reviewed Publications * indicates FRO graduate student; ** indicates FRO undergraduate

Byrd*, C. J., and F. R. O'Keefe. (In press). Description of the pectoral and pelvic girdles of a juvenile *Dolichorhynchops* (Plesiosauria, Polycotylidae) from the Pierre Shale of South Dakota and the implications for polycotylid ontogeny. Edited Marine Reptiles volume, Springer Verlag.

Morgan*, D. J., and F. R. O'Keefe. 2019. The axial osteology of a juvenile polycotylid plesiosaur from the Campanian of South Dakota, and a cladistic analysis of the Polycotylidae. **Cretaceous Research** 96:149-171.

O'Keefe, F. R., P. M. Sander, T. A. Wintrich, and S. Werning. 2019. Ontogeny of polycotylid long bone histology. **Organismal and Integrative Biology** 1.

Henson*, K., Constantino, P., O'Keefe, F. R., and Popovich, Greg. 2018. Three-dimensional scanning and printing techniques to analyze and archive human skeletal remains. **Library Hi Tech**. DOI (10.1108/LHT-10-2017-0206).

Otero, R. A., S. Soto-Acuña, and F. R. O'Keefe. 2018. Osteology of *Aristonectes quiriquinensis* (Elasmosauridae, Aristonectinae) from the upper Maastrichtian of central Chile. **Journal of Vertebrate Paleontology**. DOI: 10.1080/02724634.2017.1408638

O'Keefe, F. R., R. A. Otero, S. Soto-Acuña, J. P. O'Gorman, S. J. Godfrey, and S. Chatterjee. 2017. Cranial anatomy of *Morturneria seymourensis* from Antarctica, and the evolution of filter feeding in plesiosaurs of the austral Late Cretaceous. **Journal of Vertebrate Paleontology**. DOI: 10.1080/02724634.2017.1347570.

Otero, R. A., J. P. O'Gorman, N. Hiller, F. R. O'Keefe, and R. E. Fordyce. 2016. *Alexandronectes zealandiensis* gen. et sp. nov., a new aristonectine plesiosaur for the lower Maastrichtian of New Zealand. **Journal of Vertebrate Paleontology**: e1054494.

Brannick*, A. L., J. A. Meachen, and F. R. O'Keefe. 2015. Microevolution of jaw shape in the dire wolf, *Canis dirus*, at Rancho La Brea. **Contributions in Science**, Science Series 42: 23-32.

- Goswami, A., W. J. Binder, J. A. Meachen, and F. R. O'Keefe. 2015. The fossil record of phenotypic integration and modularity: a deep-time perspective on developmental and evolutionary dynamics. **Proceedings of the National Academy of Sciences** 112.16: 4891-4896.
- McMullen*, S. K., S. M. Holland, and F. R. O'Keefe. 2014. The occurrence of vertebrate and invertebrate fossils in a sequence stratigraphic context: The Jurassic Sundance Formation, Bighorn Basin, Wyoming, USA. **Palaios** 29.6 (2014): 277-294.
- O'Keefe, F. R., W. J. Binder, S. R. Frost, R. W. Sadleir, and B. Van Valkenburgh. 2014. Cranial morphometrics of the dire wolf, *Canis dirus*, at Rancho La Brea: temporal variability and its links to nutrient stress and climate. **Palaeontologia Electronica** 17.1: 1-24.
- Meachen, J. A., F. R. O'Keefe, and R. W. Sadleir. 2014. Evolution in the sabre-tooth cat, *Smilodon fatalis*, in response to Pleistocene climate change. **Journal of Evolutionary Biology** 27: 714-723.
- Otero, R. A., S. Soto-Acuña, F. R. O'Keefe, J. P. O'Gorman, W. Stinnesbeck, M. E. Suárez, D. Rubilar-Rogers, C. Salazar, and L. A. Quinzio-Sinn. 2014. *Aristonectes quiriquinensis* sp. nov., a new highly derived elasmosaurid from the late Maastrichtian of central Chile. **Journal of Vertebrate Paleontology** 34: 100-125.
- O'Keefe, F. R., J. Meachen, E. V. Fet**, and A. Brannick*. 2013. Ecological determinants of morphological variation in the cranium of the North American gray wolf. **Journal of Mammalogy** 94: 1223-1236.
- Holloway*, W. L., K. M. Claeson, and F. R. O'Keefe. 2013. A virtual phytosaur endocast and its implications for sensory system evolution in archosaurs. **Journal of Vertebrate Paleontology** 33: 848-857.
- O'Keefe, F. R. and C. J. Byrd*. 2012. The ontogeny of the shoulder girdle in *Polycotylus latipinnus* (Plesiosauria: Polycotylidae) and its bearing on plesiosaur viviparity. **Paludicola** 9: 21-31.
- O'Keefe, F. R. and L. M. Chiappe. 2011. Viviparity and K-selected life history in a Mesozoic marine plesiosaur (Reptilia, Sauropterygia). **Science** 333: 870-873.
- O'Keefe, F. R., H. P. Street*, B. C. Wilhelm*, C. Richards*, and H. Zhu*. 2011. A new skeleton of the cryptocleidid plesiosaur *Tatenectes laramiensis* reveals a novel body shape among plesiosaurs. **Journal of Vertebrate Paleontology** 31(2): 330-339.
- Wilhelm*, B. C., and F. R. O'Keefe. 2010. A new partial, adult skeleton of *Pantosaurus striatus*, a cryptocleidoid plesiosaur from the Upper Jurassic Sundance Formation of Wyoming. **Journal of Vertebrate Paleontology** 30(6):1736-1742.
- Gardner**, N.M, C. M. Holliday, and F. R. O'Keefe. 2010. The braincase of *Youngina* (Reptilia, Diapsida): new insights from high-resolution microCT scanning of the holotype. **Palaeontologia Electronica**.
- Street*, H. P. and F. R. O'Keefe. 2010. Evidence of pachyostosis in the cryptocleidoid plesiosaur *Tatenectes laramiensis* from the Sundance Formation (Wyoming, USA). **Journal of Vertebrate Paleontology** 30(4): 1279-1282.
- O'Keefe, F. R., E. V. Fet*, and J. M. Harris. 2009. Compilation, calibration, and synthesis of faunal and floral radiocarbon dates, Rancho La Brea, California. **Contributions in Science** 518: 1-16.
- O'Keefe, F. R., H. P. Street*, J. P. Cavigelli, J. J. Socha, and R. D. O'Keefe. 2009. A plesiosaur containing an ichthyosaur embryo as stomach contents from the Sundance

- Formation of the Bighorn Basin, Wyoming. **Journal of Vertebrate Paleontology** 29(4): 1306-1310.
- O'Keefe, F. R. and H. P. Street*. 2009. Osteology of the cryptocleidoid plesiosaur *Tatenectes laramienseis* from the Upper Sundance Formation of the Bighorn Basin, Wyoming. **Journal of Vertebrate Paleontology** 29(1): 48-57.
- O'Keefe, F. R. 2008. Cranial anatomy and taxonomy of *Dolichorhynchops bonneri* new combination, a polycotyloid plesiosaur from the Pierre Shale of Wyoming and South Dakota. **Journal of Vertebrate Paleontology** 28(3): 664-676.
- O'Keefe, F. R. 2008. Mesozoic marine reptiles. **McGraw-Hill Yearbook of Science and Technology**: 199-202.
- O'Keefe, F. R. and N. Hiller. 2006. Morphologic and ontogenetic patterns in elasmosaur neck length, with comments on the taxonomic utility of neck length variables. **Paludicola** (Nicholls Memorial Volume) 5(4): 206-229.
- O'Keefe, F. R., C. A. Sidor, H. C. E. Larsson, A. Maga, and O. Ide. 2006. Evolution and homology of the astragalus in early amniotes: new fossils, new perspectives. **Journal of Morphology** 267: 415-425.
- O'Keefe, F. R. 2006. Neoteny and the plesiomorphic condition of the plesiosaur basicranium. in M. T. Carrano, T. J. Gaudin, R. W. Blob and J. R. Wible, eds. **Amniote Paleobiology**. University of Chicago Press, Chicago, Il.
- Steyer, J.-S., R. Damiani, C.A. Sidor, F.R. O'Keefe, H.C.E. Larsson, A. Maga, and O. Ide. 2006. The vertebrate fauna of the Upper Permian of Niger— IV. *Nigerpeton ricqlesi* (Temnospondyli: Cochleosauridae), and the edopoid colonization of Gondwana. **Journal of Vertebrate Paleontology** 26(1): 18-28.
- O'Keefe, F. R. and M. T. Carrano. 2005. Correlated trends in the evolution of the plesiosaur locomotor system. **Paleobiology** 31(4): 656-675.
- Sidor, C. A., F. R. O'Keefe, R. Damiani, J. S. Steyer, R. M. H. Smith, H. C. E. Larsson, P. C. Sereno, O. Ide, A. Maga. 2005. Permian tetrapods from the Sahara show climate-controlled endemism in Pangea. **Nature** 434: 886-889.
- O'Keefe, F. R., C. A. Sidor, H. C. E. Larsson, A. Maga, and O. Ide. 2005. The vertebrate fauna of the Upper Permian of Niger— III. Morphology and ontogeny of the hindlimb of *Moradisaurus grandis* (Reptilia, Captorhinidae, Moradisaurinae) from the Upper Permian of Niger. **Journal of Vertebrate Paleontology** 25(2): 309-319.
- O'Keefe, F. R. 2004. Preliminary description and phylogenetic position of a new genus and species of plesiosaur (Reptilia: Sauropterygia) from the Toarcian of Holzmaden, Germany. **Journal of Paleontology** 78(5): 973-988.
- O'Keefe, F. R. 2004. On the cranial anatomy of the polycotyloid plesiosaurs, with new cranial material of *Polycotylus latipinnus* Cope. **Journal of Vertebrate Paleontology** 24(2): 326-341.
- O'Keefe, F. R. and W. Wahl. 2003. Preliminary report on the osteology and relationships of a new aberrant cryptocleidoid plesiosaur from the Sundance Formation, Wyoming. **Paludicola** 4(2): 48-68.
- O'Keefe, F. R. and W. Wahl. 2003. Current taxonomic status of *Pantosaurus striatus* from the Upper Jurassic Sundance Formation, Wyoming. **Paludicola** 4(2): 37-47.
- O'Keefe, F. R. 2002. New cranial material of the polycotyloid plesiosaur *Polycotylus latipinnus* Cope from Alabama. pp 106-113 in D. E. Brown, ed. The Mesozoic of Wyoming: Proceedings of the Tate Museum Geology Conference 2002. Tate Geological Museum, Casper, Wyoming.

- O'Keefe, F. R. 2002. The evolution of plesiosaur and pliosaur morphotypes in the Plesiosauria (Reptilia: Sauropterygia). **Paleobiology** 28(1), 101-112.
- O'Keefe, F. R. 2001. A cladistic analysis and taxonomic revision of the Plesiosauria (Reptilia: Sauropterygia). **Acta Zoologica Fennica** 213: 1-63.
- O'Keefe, F. R. 2001. Ecomorphology of plesiosaur flipper geometry. **Journal of Evolutionary Biology** 14(6): 987-991.
- O'Keefe, F. R. and P. J. Wagner. 2001. Inferring and testing hypotheses of cladistic character dependence using character compatibility. **Systematic Biology** 50(5): 657-675.
- O'Keefe, F. R. 2000. Phylogeny and convergence in the Plesiosauria (Reptilia: Sauropterygia.) Ph.D. Thesis, University of Chicago.
- O'Keefe, F. R., O. Rieppel, and P. M. Sander. 1999. Shape disassociation and inferred heterochrony in a clade of pachypleurosaurs (Reptilia, Sauropterygia). **Paleobiology** 25(4): 504-517.
- O'Keefe, F. R. and P. M. Sander. 1999. Paleontological paradigms and inferences of phylogenetic pattern: a case study. **Paleobiology** 25(4): 518-533.

Meeting Abstracts and Book Reviews

- Binder, W., O'Keefe, F. R., et al. 2018. Training the next generation of scientific researchers in both research methods and public communication at Rancho La Brea—a melting pot of current and ancient diversity. *J. Vert. Paleo* 38(3) supp.
- O'Keefe, F. R., Werming, S., and Morgan, D. J. 2017. Paleohistology of a humeral growth series from the Cretaceous plesiosaur *Dolichorhynchops*: new insights on plesiosaur ontogeny. *J. Vert. Paleo* 37(3) supp.
- O'Keefe, F. R., R. A. Otero, S. Soto-Acuña, J. P. O'Gorman, S. J. Godfrey, S. Chatterjee. 2016. Cranial anatomy of *Morturneria seymournesis*: evolution of filter feeding in aristonectine plesiosaurs. International Congress of Vertebrate Morphology.
- *Morgan, D. J., and F. R. O'Keefe. 2016. Revision of polycotyloid plesiosaur systematics and description of the axial osteology of the Wallace Ranch polycotyloids. *J. Vert. Paleo*. 36(3) supp.
- O'Keefe, F. R. and J. A. Meachen. 2016. Quantitative assessment of current pit chronology at Rancho La Brea, and prospects for its improvement. *J. Vert. Paleo*. 36(3) supp.
- O'Keefe, F. R., Otero, R. A., Soto-Acuña, S., O'Gorman, J. P., and Chatterjee, S. 2016. Cranial anatomy of *Morturneria seymourensis* and the evolution of mysticete-like feeding in aristonectines. Conference Proceedings, International Conference of Vertebrate Morphology 11.
- O'Keefe, F. R., Otero, R. A., Soto-Acuña, S., O'Gorman, J. P., and Chatterjee, S. 2015. Cranial anatomy of *Morturneria seymourensis* and the evolution of mysticete-like feeding in austral aristonectine plesiosaurs. *J. Vert. Paleo*. 35(3) supp.
- *Marchand, A., Vincent, P., Bardet, N., Houssaye, A., and O'Keefe, F. R. 2015. Contrasting Vascularization and Structure of a Fetal and Neonatal Plesiosaur Reflecting Physiology and Development. AAAS Annual Meeting.
- *Nassif, J. P., F. R. O'Keefe, D. Lovelace, and S. M. McMullen. 2015. First novel Wyoming pliosaurid locality in 120 years. North-Central Section, Geological Society of America.
- *Marchand, A., Vincent, P., Bardet, N., Houssaye, A., and O'Keefe, F. R. 2014. Into the Beast: Vascularity of a Fetal Plesiosaur. *J. Vert. Paleo* 34(3) supp.

- O'Keefe, F. R., and A. Brannick*. 2014. The impact of modularity on size estimation of successive dire wolf populations at Rancho La Brea, California. *J. Vert. Paleo* 34(3) supp.
- O'Keefe, F. R., J. Meachen, E. V. Fet**, and A. Brannick*. 2014. Ecological determinants of morphological variation in the cranium of the North American gray wolf. *Soc. Int. Comp. Biol.*
- Brannick*, A., J. A. Meachen, and F. R. O'Keefe. 2013. Nutritional stress induces morphological changes in dire wolves from Rancho La Brea. *J. Vert. Paleo* 33(3) supp.
- Meachen, J., and F. R. O'Keefe. 2012. Morphological variation in the mandibles of *Smilodon fatalis* from Rancho La Brea in response to climate and environmental changes. *J. Vert. Paleo* 32(3) supp.
- O'Keefe, F. R. and C. J. Byrd*. 2012. The ontogeny of the shoulder girdle in *Polycotylus latipinnus* (Plesiosauria: Polycotylidae) and its bearing on plesiosaur viviparity. *J. Vert. Paleo*. 32(3) supp.
- McMullen, S. K., F. R. O'Keefe, and S. M. Holland. 2011. The occurrence of vertebrate and invertebrate fossils in a sequence stratigraphic context: the Jurassic Sundance Formation, Bighorn Basin, Wyoming, USA. *GSA Abstracts with Programs* 43(5).
- O'Keefe, F. R. and L. M. Chiappe. 2011. Viviparity and cetacean-like life history in a Mesozoic marine plesiosaur (Reptilia, Sauropterygia). *J. Vert. Paleo*. 31(3) supp.
- Gardner**, N., C. Holliday, and F. R. O'Keefe. 2011. Cranial anatomy in the basal diapsid *Youngina capensis* and its relevance to higher radiations of Permo-Triassic Neodiapsida. *J. Vert. Paleo*. 31(3) supp.
- O'Keefe, F. R., W. J. Binder, and B. Van Valkenburgh. 2010. Craniodental measures of dire wolf population health imply rapid extinction in the Los Angeles basin. *J. Vert. Paleo*. 30(3) supp.
- Gardner**, N., C. Holliday, H. *Zhu, and F. R. O'Keefe. 2010. Braincase anatomy of the basal diapsid *Youngina capensis* from high-resolution X-ray CT scanning. *J. Vert. Paleo*. 30(3) supp.
- O'Keefe, F. R. and B. C. Wilhelm*. 2009. A new reconstruction of plesiosaur pectoral musculature: phylogenetic, osteological, and functional constraints. *J. Vert. Paleo*. 29(3) supp.
- Street, H. P.*, and F. R. O'Keefe. 2009. A new partial skeleton of the cryptocleidoid plesiosaur *Tatenectes laramiensis* and an interpretation of the novel body shape of a shallow marine dwelling plesiosaur. *J. Vert. Paleo*. 29(3) supp.
- Wilhelm, B. C.* and F. R. O'Keefe. 2009. A new partial skeleton of *Pantosaurus striatus*, a cryptocleidoid plesiosaur from the Upper Jurassic Sundance Formation. *J. Vert. Paleo* 29(3) supp.
- O'Keefe, F. R. 2008. Population-level response of the dire wolf, *Canis dirus*, to climate change in the upper Pleistocene. *J. Vert. Paleo*. 28(3) supp.
- O'Keefe, F. R. 2007. Jurassic infanticide? First evidence of plesiosaur predation of neonatal ichthyosaurs. *J. Vert. Paleo*. 27(3) supp.
- Richards, C.*, C. A. Sidor, F. R. O'Keefe, J. S. Steyer, and N. Tabor. 2007. The mandible of *Moradisaurus grandis* (Reptilia: Captorhinidae) and its implications for herbivory in Maroadisaurines. *J. Vert. Paleo*. 27(3) supp.
- Street, H. P.*, F. R. O'Keefe, and R. Lockwood. 2007. Description of the plesiosaur *Tatenectes laramiensis* from the Sundance Formation (Wyoming, USA) and its position in the cryptocleidoid lineage. *J. Vert. Paleo*. 27(3) supp.

- O'Keefe, F. R. and N. Hiller. 2006. Morphological patterns in elasmosaur neck length: variation and taxonomic utility. *J. Vert. Paleo.* 26(3) supp.
- O'Keefe, F. R. 2006. Review of Oceans of Kansas, by M. J. Everhart. *Journal of Vertebrate Paleontology* 26(1) 288-289.
- O'Keefe, F. R., C. A. Sidor and H. C. E. Larsson. 2005. Evolutionary development of the amniote astragalus: new fossils, new perspectives. *J. Vert. Paleo.* 25(3) supp.
- Steyer, J. S., R. Damiani, C. A. Sidor, F. R. O'Keefe, and H. C. E. Larsson. 2005. Permian temnospondyls from the Sahara show edopoid colonization of Africa. *J. Vert. Paleo.* 25(3) supp.
- Sidor, C. A., D. C. Blackburn, H. C. E. Larsson, F. R. O'Keefe, and R. Smith. 2005. Upper Permian captorhinid and pareiasaur reptiles from Niger: New data and interpretation. *J. Vert. Paleo.* 25(3) supp.
- O'Keefe, F. R., C. A. Sidor, and H. C. E. Larsson. 2004. Morphology and ontogeny of the hindlimb of the large captorhinid *Moradisaurus grandis*. *J. Vert. Paleo.* 24 (3) supp.
- Sidor, C. A., R. Damiani, H. C. E. Larsson, F. R. O'Keefe, R. M. H. Smith, and J. S. Steyer. 2004. Late Permian tetrapod biogeography: new insights from West Africa. *J. Vert. Paleo.* 24(3) supp.
- Wahl, W. and F. R. O'Keefe. 2004. Juvenile plesiosaur fossil assemblage and paleocommunity of the upper Redwater Shale (Oxfordian-Callovian) of the Sundance Formation, Natrona County, Wyoming. *J. Vert. Paleo.* 24(3) supp.
- O'Keefe, F. R. and M. T. Carrano. 2003. Scaling and ecomorphological trends in the evolution of the plesiosaur locomotor system. *J. Vert. Paleo.* 23 (3) supp.
- Sidor, C. A., H. C. E. Larsson, J. S. Steyer, F. R. O'Keefe, and R. M. H. Smith. 2003. Late Permian tetrapods from the Sahara. *J. Vert. Paleo.* 23 (3). supp.
- O'Keefe, F. R. 2002. Inference of plesiosaur hunting styles from flipper geometry: parallels among birds, bats, and airplanes. *J. Vert. Paleo.* 22 (3) supp.
- O'Keefe, F. R. 2001. Cladistic character dependence in the Plesiosauria, with functional interpretations of correlated character sets. *J. Vert. Paleo.* 21 (3) supp.
- O'Keefe, F. R. 2001. Review of Encyclopedia of Paleoherpertology 12A: Sauropterygia 1, by Olivier Rieppel. Newsletter of the Palaeontological Association.
- O'Keefe, F. R. 1999. Review of Dinosaur Impressions, by Philippe Taquet. *J. of Geo.*, 107 (5): 641-642.
- O'Keefe, F. R. 1999. Phylogeny and convergence in the Plesiosauria. *J. Vert. Paleo.* 19 (3) supp.
- O'Keefe, F. R. and P. J. Wagner. 1999. A compatibility-based method for assessing the independence of cladistic characters. Abstracts with Programs of the 1999 Annual Meeting of the Geological Society of America: A42.
- O'Keefe, F. R. 1998. First occurrence of the plesiosaur genus *Peloneustes* in the German Jurassic. *J. Vert. Paleo.* 18 (3) supp.
- O'Keefe, F. R., O. Rieppel, and P. M. Sander. 1997. Multivariate allometry and complex heterochrony in an anagenic lineage of pachypleurosaurs (Reptilia: Sauropterygia) from San Giorgio, Switzerland (Triassic, Anisian-Ladinian.) *J. Vert. Paleo* 17(3) supp.

Grants and Funding, Awarded and Pending

- 2017-2020 **NSF EAR-SGP 1757236**. Collaborative Research: RUI: Chronology and Ecology of Late Pleistocene Megafauna at Rancho La Brea. Co-PI; Marshall Award \$44,670; total award \$370,840.
- 2012 **John Deever Drinko Distinguished Research Fellowship**, \$20,000
- 2011 URSP for disabled undergraduate, N. Gardner \$5000
- 2010 **China NSF**, Travel, Marine Reptile Symposium \$5000
- 2009 Marshall Graduate Research Committee \$2000
- 2008 **WV NSF EPSCoR** Student Travel Grant \$5000 (to students)
- 2007 Marshall Graduate Research Committee \$2000
- 2007 **NASA WV Space Grant Consortium** \$19,964
- 2007 **WV EPSCoR** Mini-Grant, Proposal Preparation \$5000
- 2003 **Nat'l Geographic Society**. Sundance Plesiosaurs \$10,530
- 1999-2000 **Hinds Fund Grant Recipient**. University of Chicago \$4000
- 1999-2000 **Samuel P. Wells Award Winner**. UC Berkeley \$1000
- 1998-1999 **Travel Grant**. University of Chicago Women's Board \$2500
- 1991 **REU Grant Recipient**. National Science Foundation

Unfunded Proposals

- 2015 **NSF EAR-SPG** La Brea Dating Project \$400,000. (*Rated Competitive*)
- 2014 **NSF DEB-ES**, La Brea Dating Project. Preprop. not selected.
- 2009 **NSF EAR-SPG**, La Brea Dating Project \$505,818.
- 2008 **NSF CAREER**, La Brea Database Project \$1,000,000.
- 2005 **NSF EAR-SPG**, Sundance Plesiosaurs \$49,000.
- 2004 **NSF EAR-SPG**, Sundance Plesiosaurs \$103,000.

Graduate Student Advising (Two current, not listed)

- 2018 Katrina Scholer, MS: A characterization of West Virginia coyotes (*Canis latrans*) utilizing skull morphology.
- 2016 Donald J. Morgan, MS: Revision of polycotyloid plesiosaur systematics (Plesiosauria, Sauropterygia) and description of the axial osteology of a juvenile polycotyloid.
- 2016 Eric Anderson, MS: Ontogenetic allometry of skeletal elements and surface area of *Pterodactylus antiquus* and *Aurorazhdarcho micronyx*.
- 2016 Tiffany Aeling, MS: Electromyography study of muscle fatigue during isometric exercises in swimmers and non-swimmers.
- 2015 Kristy Henson, MS: Stories in bone still told: digitization and replication of the Clover Site, Fort Ancient human remains.
- 2014 Alexandria Brannick, MS: Shape evolution and sexual dimorphism in the mandible of the dire wolf, *Canis dirus*, at Rancho La Brea.

- 2013 Mark Deblois, MS: Quantitative reconstruction and two-dimensional, steady flow hydrodynamics of the plesiosaur flipper.
- 2013 Christina Byrd, MS: Ontogenetic state of a juvenile polycotyloid plesiosaur (Sauropterygia: Plesiosauria) and its implications for plesiosaur growth.
- 2013 Josh Corrie, MS, Unique vertebral morphology of the archaeocete cetacean *Basilosaurus Cetoidea* and its implications for swimming function.
- 2012 Helen Zhu, MS: Plastron reduction and associated myology in turtles, and its implications for functional morphology and natural history.
- 2012 Courtney Richards, MS: Plesiosaur body shape and its impact on hydrodynamic properties
- 2012 Waymon Holloway, MS: A virtual phytosaur endocast and its implications for the behavior and evolution of archosaurs.
- 2011 Benjamin C. Wilhelm, MS: Novel anatomy of cryptocleidid plesiosaurs with comments on axial locomotion.
- 2009 Hallie P. Street, MS: A study of the morphology of *Tatenectes laramiensis*, a cryptocleidoid plesiosaur from the Sundance Formation (Wyoming, USA).

Faculty and Professional Service

- 2019-pres. **Chairperson**, COS Promotion and Tenure Committee
- 2017-pres. **Member**, COS Promotion and Tenure Committee
- 2012-pres. **Course Director**, Human Anatomy, MUSOPT
- 2007-pres. **Associate Editor**, Journal of Vertebrate Paleontology
- 2006-2016 **Chairperson**, Graduate Program Committee, Marshall Biology
- 2010-2012 **Member**, Marshall University Faculty Senate
- 2004-2006 **Course Coordinator**, Human Anatomy, NYCOM
- 2004-2006 **Curriculum Development Committee**, NYCOM
- 2008-2013 **Member**, Lanzendorf Paleoart Committee, SVP
- 2004-2008 **Member**, SVP Program Committee

Public Outreach & Appearances

- 2017 **The Guardian**, interview, National Monument Reduction
- 2017 **Scientific American Online**, Research Write-up
- 2015 **Smithsonian Magazine** Research Write-up
- 2014 **National Geographic TV**. Interview, carnivore program.
- 2014 Invited Talk and Interview, **Los Angeles Times**
- 2014 Research Write-ups, *Canis dirus* article (see website)
- 2014 **Santiago Times**, Interview and Research Write-up
- 2012 **National Geographic TV**. Appearance, cryptozoology program.
- 2011 National/International Interviews for **Science** article (see website)
- 2011 Interview and Research Write-up, **Marshall Magazine**
- 2010 Interview, West Virginia Public Radio

- 2010 TV Appearance and Scientific Advisor, "Prehistoric Assassins", **Discovery Channel** Worldwide.
- 2009 Invited Talk, **Clay Center** Lunchtime Lecture Series. Charleston, WV
- 2009 **Charleston Gazette** Research Write-up
- 2009 **Charleston Daily Mail** Research Write-up
- 2009 **Marshall Parthenon** Research Write-up
- 2008 Scientific Advisor, "Living Loch Ness", **Discovery Channel**
- 2008 Published Interview and Photos, **PEN Magazine**, Japan
- 2008 Review of *Kronosaurus*, Marshall Cavendish (grades 2-4)
- 2007 Negotiation of **\$1 million fossil donation**, Burke Museum
- 2007 **Irish Times** Research Write-up
- 2007 **Irish Public Radio** Appearance
- 2006 Published Interview, **Swimming with Saur**s, Scholastic (grades 4-6)
- 2005 **National Geographic Magazine** Scientific Advisor
- 2002 **New Scientist Magazine** Research Write-up
- 2002 **Scientific American** Research Write-up

Manuscript and Proposal Reviews

Acta Paleontologica Polonica; American Naturalist; Biological Reviews; Canadian Journal of Earth Science; Cretaceous Research; Gondwana Research; Journal of Paleontology; Journal of Systematic Paleontology; Journal of Vertebrate Paleontology; National Geographic Society; National Science Foundation; Nature; Naturwissenschaften; Palaeontology; Paleobiology; Paludicola; Revista Mexicana de Ciencias Geológicas; Royal Society Biology Letters; Science; Systematic Biology; Zoological Journal of the Linnean Society

Invited Research Seminars

- 11/2017 Plenary, I Reunión de Paleontología de Vertebrados de Chile
- 1/2017 Evolutionary Morphology Seminar, University of Chicago
- 4/2016 A. Watson Armour Seminar, Field Museum of Natural History
- 2/2014 LA County Museum/ Page Museum
- 5/2013 George Mason University
- 2/2013 College of William and Mary
- 5/2012 Burke Museum, University of Washington
- 3/2012 Museum of Natural History, Santiago, Chile
- 4/2011 University of Milwaukee
- 2/2011 Natural History Museum of Los Angeles County
- 11/2010 Virginia Polytechnic Institute (Virginia Tech)
- 8/2010 Peking University, Beijing, People's Republic of China
- 9/2009 Clay Center, Charleston, West Virginia
- 3/2007 University College, Dublin, Republic of Ireland

6/2006 Natural History Museum, England
3/2006 Marshall University
4/2005 Burke Museum/University of Washington
3/2005 Holy Cross College
1/2004 University of Wyoming
1/2003 Brown University
3/2002, 3/2004 SUNY Stony Brook
2/2000 University of Chicago
4/1999 Beloit College

Scientific Field Experience

2017, 18 Montana. Elasmosaur excavation, Pierre Shale Formation
2012, 13 Chile. Marine reptile prospecting and field work.
2011 Portugal. Marine reptile prospecting.
2010 China. Various locations, marine reptile field work.
2010 Utah. Marine reptile prospecting and collection, Cretaceous Tropic Shale Formation.
2002-14 Wyoming. Plesiosaur prospecting and collection, Jurassic Sundance Formation (Sundance Plesiosaur Project).
2003 Niger. Permian vertebrate prospecting and collection, five weeks, with C.A. Sidor.
2001 Madagascar. Cretaceous terrestrial vertebrates, six weeks. With D. Krause.
1999 Bahamas. Univ. of Chicago field course, modern and fossil carbonate environments.
1998 Southern Utah. Permian terrestrial vertebrate prospecting. With E. Lombard and J. Bolt.
1997 Jamaica. Univ. of Chicago field course, modern and fossil carbonate environments.
1996, 98, 00, 11, 13, 15 Big Bend National Park. Univ. of Chicago & Marshall Univ. field courses, Cretaceous terrestrial and marine environments.
1991 Rocky Mountain Biology Lab, Gothic, Colorado. Alpine ecology, seven weeks.

References

Charles Somerville, Ph.D.

Dean, College of Science
College of Science Office S270
Marshall University
One John Marshall Drive
Huntington, WV 25755
304 696- 2424
somervil@marshall.edu

D. Scott Davis, PT, MS, EdD, OCS

Chair & Program Director
School of Physical Therapy
Marshall University
2847 5th Ave, Huntington, WV
25702 304-677-9400
davis1090@marshall.edu

Hans-Dieter Sues, Ph.D.

Director and Curator
National Museum of Natural History
Smithsonian Institution
NHB MRC 121
Dept. of Paleobiology
Washington, DC 20013-7012
202-633-1355
suesh@si.edu

Luis M. Chiappe, Ph.D.

Director and Curator
Natural History Museum of Los
Angeles County
900 Exposition Blvd
Los Angeles, CA 90007
213-763-3323
chiappe@nhm.org

Matthew T. Carrano, Ph.D.

Curator of Dinosauria
Smithsonian Institution
PO Box 37012, MRC 121
Washington, DC 20013-7012
202-633-1314
carranom@si.edu