Archaeopteryx is No Transitional Form:

Author: John Woodmorappe
Subject: Biology
Date:

John Woodmorappe's Articles
About John Woodmorappe

(The Origins of Bird Flight: A Continuing Conundrum)

Most evolutionists imagine that the first bird evolved from a dinosaur-like ancestor, that is, from a creature covered by something akin to reptilian scales. Creationists have long pointed out, however, that no transitional state between scales and feathers exists in the fossil record, or, for that matter, among modern living things. Moreover, evolutionists have no firm grasp on how flight itself is supposed to have evolved. A recent study on the alleged evolution of bird flight, by Sarah Randolph of the Department of Zoology at Oxford University (Randolph 1994), bears this out:

There is still no overall consensus amongst biologists on either the original function of feathers or the origin of flight. The earlier, more obvious, explanations focused on the two major current functions of feathers: as aerofoils . . . and as insulation. More recently, dissatisfaction with these ideas led to hypotheses based on more specialized functions, such as display and fighting. (pp. 389-90).

Of course, evolutionists have long cited Archaeopteryx as a transitional form between dinosaurian/reptilian ancestors and birds, citing its mix of avian and "reptilian" (non-avian) characteristics. Creationists have rightly responded by pointing out that Archaeopteryx is a mosaic of fully-formed reptilian features and fully-formed avian features, not a half- reptile/half-bird. Whether such odd mosaics are genuine transitional forms is doubtful (Gould and Eldredge 1977; see note after citation).

Moreover, there is such an astonishing diversity of contradictory opinion on the physiology of Archaeopteryx that claims of its status as an evolutionary transition may be all but meaningless. This diversity of opinion extends to the question of which of these animals were ectotherms (i.e., were "cold-blooded") and which were endotherms (i.e., were "warm- blooded") and which had a thermal physiology which fell between the two extremes (Randolph 1994, p. 391):

. . . the nature of the fossil record, its incompleteness and limitation to hard anatomy, leaves too much scope for speculation and personal interpretation concerning the thermal physiology of Archosaurs [proposed dinosaurian ancestors] and Archaeopteryx.

The phrase "incompleteness of the fossil record" can be seen as an evolutionary term of art for the lack of transitional forms. In this instance, the phrase indirectly acknowledges that Archaeopteryx is not transitional in any meaningful sense of the term. Surely, a skeptic might observe, if Archaeopteryx were actually a transitional form, worries about the incompleteness of the fossil record with regard to early birds would be misplaced!

Lastly, the oft-repeated claim that birds are closely related to coelurosaur theropod dinosaurs is not held by all evolutionists (for citations, see Randolph 1994, p. 395). Birds cannot be unambiguously related to any other fossil or living group--and therefore the evolutionary conundrum of the origin of flight remains.

REFERENCES

Gould, S.J. and N. Eldredge. "Punctuated equilibria: the tempo and mode of evolution reconsidered." Paleobiology, 3 (1977): 115-151. [Considering Archaeopteryx, Gould and Eldredge write, "Smooth intermediates between Bauplane [body plans] are almost impossible to construct, even in thought experiments: there is certainly no evidence for them in the fossil record (curious mosaics like Archaeopteryx do not count)" (p. 147).]

Randolph, S. E. "The relative timing of the origin of flight and endothermy: evidence from the comparative biology of birds and mammals."

Zoological Journal of the Linnean Society, 112 (1994): 389- 397.

Topics: Amazing but true, bogus evolutionary transitions, evidence against evolution, anti-evolution, antievolution, anti-Darwinism, scientific Creationism defended