

CHARLES DARWIN AND THE FOSSIL RECORD

In reading Darwin's classic work, *Origin of Species*, one is struck by the amount of what can only be describe as "whining" (particularly in the later edition) over the fossil record. One is pressed to find many references to the geologic record without the preface of "imperfect" attached. It were as if an archaeologist uncovered an ancient manuscript that was worn and battered by the years; and in presenting the critical insights gleaned from the antiquated treasure, the scholar's primary focus was to communicate to the eager public how poorly the artifact was preserved. Here is just a sampling:

(Charles Darwin, *The Origin of Species By Means of Natural Selection or the Preservation of the Favoured Races in the Struggle for Life*, 1872)

p. 293

"Geology assuredly does not reveal any such finely-graduated organic chain; and this, perhaps, is the most obvious and serious objection which can be urged against the theory. The explanation lies, as I believe, in the extreme imperfection of the geological record."

p. 304

"From the several considerations, it cannot be doubted that the geological record, viewed as a whole, is extremely imperfect; but if we confine our attention to any one formation, it becomes much more difficult to understand why we do to therein find closely graduated varieties between the allied species which lived at its commencement and at its close."

p. 311

"But we continually overrate the perfection of the geological record, and falsely infer, because certain genera or families have not been found beneath a certain stage, that they did not exist before that stage."

pp. 316-317

"To the question why we do not find rich fossiliferous deposits belonging to these assumed earliest periods prior to the Cambrian system, I can give no satisfactory answer. ...Nevertheless, the difficulty of assigning any good reason for the absence of vast piles of strata rich in fossils beneath the Cambrian is very great... The case at present must remain inexplicable; and may be truly urged as a valid argument against the views here entertained."

p.343

"...and lastly, although each species must have passed through numerous transitional stages, it is probable that the periods, during which each underwent modification, though many and long as measured by years, have been short in comparison with the periods during which each remained in an unchanged condition. ...He who rejects this view of the imperfection of the geological record, will rightly reject the whole theory. For he may ask in vain where are the numberless transitional links which must formerly have connected the closely allied or representative species, found in successive stages of the same great formation?"

pp. 440-441

"I have felt these difficulties far too heavily during many years to doubt their weight. But it deserves especial notice that the more important objections relate to questions on which we are confessedly ignorant...how imperfect is the geologic record."

pp. 439-440

"I can answer these questions and objections only on the supposition that the geological record is far more imperfect than most geologists believe...That the geologic record is imperfect all will admit; but that it is imperfect to the degree required by our theory, few will be inclined to admit."

Sage words these last ones...and prophetic. But Darwin comes off poorly. As Dawkins says, "The paradox has often been noted that the first edition of *The Origin of Species* makes a better case than the sixth. This is because Darwin felt obliged, in his later editions, to respond to contemporary criticisms..." (Richard Dawkins, *The Blind Watchmaker*, 1986, p. xvi.) He could only hope that someday the missing pieces would be found, and in the meantime he offered a plethora of excuses to explain away the troublesome features of the geologic record.

"Darwin's early scientific experience was primarily as a geologist, and much of what he had to say about the nature of the fossil record (summarized in the passage quoted above) was an accurate and insightful early contribution to our understanding of the vagaries of deposition and the preservation of fossils. But his Chapter 9 (first edition) on the imperfections of the geological record is one long ad hoc, special-pleading argument designed to rationalize, to flat-out explain away, the differences between what he saw as logical predictions derived from his theory and the facts of the fossil record." (Eldredge, Niles [Chairman and Curator of Invertebrates, American Museum of Natural History], "Time Frames: The Rethinking of Darwinian Evolution and the Theory of Punctuated Equilibria", Simon & Schuster: New York NY, 1985, pp.27-28.)

It is indeed curious that some evolutionists simultaneously argue that the fossil record is one of the key pieces of evidence for evolution, yet they must insist that only between 0.005% and 0.0005% of all species are represented in our catalogued fossil archives. If this is true, we can not gain any significant insight into origins from the fossil record. To do so is akin to writing an essay on the twentieth century automobile industry with only the frame of a model T and the cast of an RV for evidence!

As evolutionary scientists increasingly move away from Darwin's belief that the fossil record is incomplete, one can only wish that they take his advice "He who rejects this view of the imperfection of the geological record, will rightly reject the whole theory."