



# CAN WE HAVE IT BOTH WAYS?

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**Faced with the dilemma of two mutually exclusive worldviews, some theologians and scientists are seeking ways to reconcile them.<sup>1</sup>**

**D**iscussion of creation often focuses on profound contrasts between the theory of naturalistic evolution and the biblical model of a recent, six-day creation. These contrasts identify such issues as whether the universe and human life were purposefully designed, what are the nature and extent of God's actions in the universe, and what conclusions can be inferred from nature and from Scripture.

For the purposes of this article, the following definitions will apply:

*Creation.* The concept that God acted directly and personally to bring into existence diverse lineages of living organisms. He may have

created the first individuals of each lineage *ex nihilo* (Heb. 1:2, 3), from non-living materials (Gen. 2:7), or in some combination. Creation in this sense does not suggest that God created new life forms through secondary processes, such as evolution. Nor does it include the appearance of new individuals through reproduction. God did create the entire universe *ex nihilo*, but this article is concerned primarily with the origins of living things on this planet.

*Evolution.* The concept of universal common ancestry, whether natu-

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ralistic or divinely guided. Evolution is the theory that all organisms, including humans, descended from an original ancestor. “Variation” and “speciation” do not entail universal common ancestry, so they are not the same as evolution. The occasional definition of *evolution* as merely “change over time” is not adequate. Every individual changes over time, yet individuals do not evolve. It is populations that evolve. Change over time does not necessarily imply universal common ancestry.

*Long-age creation.* Any theory that includes the geological time scale and the idea of separately created lineages, especially the special creation of humans. Since all major forms of long-age creation involve a series of discrete creation acts, the term *multiple creations* is a synonym for long-age creation.

*Theistic evolution.* Those theories that accept the geological time scale and universal common ancestry, including humans, in a divinely guided process. The proposed extent of divine activity in nature pro-

vides a way to help distinguish the various models of theistic evolution. Theories that do not include any divine activity are beyond the scope of this article.

#### **Long-Age Creation Models**

Long-age creation models include any that incorporate the (1) geological time scale and (2) separate creation of humans and numerous other independent creatures. These models usually speculate that if a six-day creation or biblical flood occurred, they were not global events.

Probably the most significant distinguishing feature of long-age creation models is the interpretation of the word *day* in Genesis 1. Certain long-age creation models hold that the creation “days” are literal, sequential days of creation; other long-age creation models hold that the “days” are non-literal and/or non-sequential.

#### **Multiple-Creation Models With Literal, Sequential Creation Days**

*Gap theory.* The gap theory main-

tains that Genesis 1 refers to a recent creation in six literal, contiguous days, but that it was preceded by an earlier creation that had been destroyed. Proponents often claim that the phrase “the earth was without form, and void” (Gen. 1:2, KJV) should read “the earth *became* without form and void,” suggesting a change from its original condition (cf., Isa. 45:18). The destruction might have resulted directly from Satan’s activity in the world or a war between Satan and God.

The gap theory founders on both exegetical and scientific grounds. Exegetically, the gap theory is based on the supposition that Genesis 1:2 means that the world “became” without form and void. However, the Hebrew word (*hayetha*) does not have that meaning. The text states that the Earth *was* without form and void, not that it *became* without form and void.

Scientifically, the gap theory predicts a gap in the fossil record, with the rubble of the old destroyed creation below the gap and the record of the new creation above the gap. But there is no such gap in the fossil record, and most scholars abandoned this theory long ago.

Some have attempted to get around this problem by claiming that the animals and plants of the first creation closely resembled God’s work in re-creation. Thus, the gap would be undetectable. In this view some fossils

that appear to be humans were actually human-like animals, while others were true humans with moral accountability. Fossils from the two creations are indistinguishable. This idea lacks any biblical, scientific, or philosophical support, and the idea of an invisible gap has not been widely accepted.

*Intermittent Creation days (multiple gaps).* A few scholars have attempted to preserve the idea of literal days in a long time frame by proposing that the days were intermittent rather than contiguous. Thus, there were actually six literal creation days, in the sequence recorded in Genesis, but they were separated in time by millions of years. However, the sequence of events in Genesis conflicts with the fossil sequence. To get around this problem, it has been suggested that each day of Creation begins a new creative period of time. The literal days are actually only beginning points of successive “overlapping ages” of creation. The successive creation events begin on specific days but are completed sometime later. This strategy effectively transforms the intermittent creation days theory into the overlapping day-age model.

#### **Multiple-Creation Models With Sequential but Non-literal Days**

*Non-literal days.* Various suggestions attempt to sever the relationship between literal days and the creation

process. One is the day-age interpretation (see below). A similar suggestion is the relativistic-day interpretation, which proposes that *day* means a regular day to humans but something much different to God.

A third suggestion is that the Genesis “days” are “days of proclamation” or “fiat,” in which God uttered the creative words in a series of six literal days. Each fiat might have initiated the creation process, but the events were completed sometime during the millions of years of the “age.” The latter proposal has the obvious problem of how one can have a first literal “day” before the Solar System (or even the universe) was created. Another problem is that Genesis records “and it was so” (1:7, 9, 11, 15, 24, 30, KJV) before the conclusion of each day, suggesting that each day’s creative activity was completed before the beginning of the next.

Each of these interpretations attempts to retain the sequence of Genesis events. Hence, they are included with day-age models.

In contrast, some models reject both the literalness of the days of creation and the sequence of creation events. One variant of this category suggests that the Genesis “days” are days of revelation, in which Moses received six symbolic visions about the creation, but the actual sequence is not revealed. Another proposal is that the “days”

of creation are overlapping ages. Each age began when God uttered a command, but the actual creation events may have been completed during any of the “ages.” Again, the sequence of creation is unspecified.

The literary-framework interpretation is the best-known model of this type. In this view, the Genesis “days” are somehow “analogues” of God’s activity in heaven. Models that do not maintain the Genesis sequence are included in the non-literal, non-sequential days category.

*Day-age theory.* Any model that maintains the Genesis sequence of creation, and in which the events of a creation “day” are not completed in a literal day, but may extend over long, sequential ages of indefinite length. The following models should be included: the overlapping day-age theory; the intermittent-day theory; and the relativistic-day theory. The day-age interpretation can also be included in a model of theistic evolution. Since all sequence-based, long-age models of origins conflict with the order of the fossil sequence, the problems described here would also apply to any theistic evolution model that attempts to preserve the Genesis creation sequence.

The day-age interpretation has serious exegetical problems that include the biblical description of each day as literal, with an evening and a morning. The phrase “and it was so” precedes the statement “and

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the morning and the evening were the [*n*th] day,” and suggests that the action of each day was completed before the day ended. Also, the fourth commandment specifies a literal Sabbath day as commemorating the (by inference) literal creation days. It is widely acknowledged that the natural reading of the text is that the days were literal.

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*Non-literal, non-sequential days.* Some scholars have proposed that the creation “days” are not literal, but

refer figuratively to God’s creative activity. The best-known model in this category is the literary-framework hypothesis. This interpretation treats the “days” of Genesis 1 as neither literal nor sequential, but merely as a literary device to show that the world is a creation. No model of creation is offered, although the special creation of a personal Adam and his subsequent Fall are considered to be historical events.

A key concept of the literary-framework hypothesis is the two-register cosmology: the earth forms a visible “lower register” and the heavens form an invisible “upper register.” The two are related “analogically.” This framework is applied to Genesis 1 to explain the “days” as periods of time that belong to the invisible “upper register,” and not to the literal world in which the creation events took place. The authors insist that the creation “days” refer to something real and significant in the

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“upper register,” although it is not clear just what that means, since they deny the sequence represented in God’s “daily” activities.

The literary-framework interpretation is not truly a creation model but an exegetical hypothesis. It makes no predictions about the fossil sequence and is infinitely flexible in its application. Therefore, the literary-framework hypothesis is a non-scientific theory, and must be evaluated theologically: The narrative style of the text, the words used to describe the events, and the rest of Scripture, all combine to indicate the author’s intention to describe literal, consecutive days. And all New Testament writers appear to accept the Genesis story as literal.

The literary-framework interpretation explains away anything that challenges our conclusions by referring it to the invisible “upper register,” safely removed from the real world where its meaning can be as vague as we like.

The literary-framework interpretation suffers from the implication of

a distinct separation of God’s activities in the “upper register” from the world of the “lower register.” God is continuously acting throughout the entire universe, and is not confined to an “upper register.” It also presents unacceptable theological implications for the character of a God who intentionally created a world of violence, suffering, and death.

#### **Problems Specific to Long-Age Creation Models**

All long-age creation models suffer from numerous problems. Many are shared with theistic evolution, but a few are unique.

First, all versions of long-age creation are essentially conjectural. They all lack direct support, either scientific or biblical. Nothing in the Bible or in science suggests that God created our world in a series of discrete, supernatural acts over long ages. Any observation in the fossil sequence can be “solved” with the statement that “God created it that way.” Though this makes the theory difficult to falsify, it also makes it dif-

icult to defend.

Second, all forms of long-age creation that preserve the sequence of Genesis events conflict with the sequence of the fossil record. Thus, the intermittent-day theory and day-age theory are both scientifically untenable. Attempts to modify these theories to match the fossil sequence, such as the proposal that the “days” are “overlapping,” convert them into a different category of models: those that invoke non-sequential, non-literal days of creation. The chief example of this category, the literary-framework interpretation, does not explain anything in nature; it merely attempts to explain away the Genesis creation text.

Third, there is a troubling inconsistency in interpreting Genesis 1 in a long-age context: “[O]ld Earth special creationism, by its choice to accept the scientifically derived timetable for cosmic history, is in the exceedingly awkward position of attempting to interpret some of the Genesis narrative’s pictorial elements (interpreted as episodes of special creation) as historical particulars but treating the narrative’s seven-day timetable as being figurative.”<sup>22</sup>

Fourth, a multiple-creation model is also a multiple-destruction model. The fossil record is a record of death and extinction, including numerous mass extinctions in which large numbers of species disappear simultaneously. The extinction of a species

requires the death of every individual of that species. This can apparently happen if the species is confined to a small region, but it is difficult to explain the extinction of an entire order or class of organisms, especially if the group has a global distribution. Such extinctions require catastrophic events of global magnitude. What kind of god would repeatedly create and destroy on a global scale?

Models of long-age creation share two characteristics: acceptance of the long geological time scale and the separate creation of humans and other lineages. None of these models is free of scientific problems. The gap model predicts a non-existent gap in the fossil record. The intermittent creation day model and the day-age model conflict with the fossil sequence. The literary-framework interpretation merely explains every observation in the fossil column with the words “God did it.” Neither the “days” nor the sequence have any literal, or even symbolic, meaning. Problems in interpretation are merely pushed off into some ethereal “upper register.” Overlapping-day-age models attempt to blend the sequence of Genesis days with a denial of the sequence of events of those same days. The fossil sequence falsifies most of the clearly stated models of long-age creation. The historical setting of Adam and the effects of the Fall are problems for all long-age creation models. Scientific problems can

be minimized only by trivializing important issues and denying the teaching of Scripture.

It seems pointless to reject the obvious meaning of Genesis on scientific grounds to accept another model with serious scientific problems. Seventh-day Adventists cannot improve their position by adopting any model of long-age creation.

### Theistic Evolution Models

Theistic evolution models include those based on: (1) universal common ancestry of all organisms, including humans; and (2) common descent of all organisms as the result of a divinely guided process over long ages of geological time.

Theistic evolution models differ among themselves primarily in how they propose that divine guidance is accomplished. The large number of minor variants of theistic evolution can be grouped into categories. One includes views that God created nature to be autonomous, so that continuing divine influence on nature is unnecessary. Another category is that God continuously interacts with nature in the regularities we recognize as natural law, yet He somehow influences the outcome for His own purposes.

*Theistic evolution through autonomous "natural law."* One form of theistic evolution holds that nature is autonomous. In this view, God does not personally control any natural

event. Instead, He designed the laws of nature so that evolution is the result. He established the laws of nature at the time of the Big Bang, and no further divine action is needed. He intended that consciousness would evolve in good time.

The emphasis here is on the sufficiency of natural law. God is not a participant in the evolutionary process, but merely an observer. This would be ordinary deism except that it does allow God to intervene occasionally in the lives of believers, but, apparently, not in the flow of nature. So the model is quasi-deistic.

The autonomous model of theistic evolution has some serious difficulties. In the Bible, nature is not autonomous, but totally and continuously dependent on God for existence. There is no biblical support for the idea of a God who does not interact with His creation, and much biblical evidence against it.

This model also has scientific problems. There are just too many apparent gaps in the "natural economy." Some of the most glaring examples include: the cause of the Big Bang; the origin of life; the origin of gender and sexual reproduction; the origins of multicellularity, cellular differentiation and embryonic development; and the origin of consciousness, language, and morality in humans. No known natural law can explain the origin of any of

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these phenomena. The fact that they may operate in harmony with natural law says nothing about their respective origins.

Second, there seems to be too much evidence of intelligent design in nature. For example, the structure of the human brain appears to be designed for far more mental capacity than required for survival under the "law" of natural selection.

*Theistic evolution driven by God's continuous interaction with nature.* Most versions of theistic evolution propose that God continuously interacts with nature. Nature is totally dependent on God's sustaining activity as observed in the laws of nature. But as God sustains nature, He somehow acts providentially to bring about His will in ways generally undetectable to us. This raises the issue of how God can influence nature to accomplish His will without violating the regularity of His own natural laws to sustain the universe.

Some have proposed that God acts through chaotic systems that are unpredictable to us but predictable to Him. Another possibility is that quantum uncertainty may provide an opening for God to act in undetectable ways. However, quantum events, although uncertain individually, act statistically in predictable ways, which tends toward determinism rather than freedom of choice.

This model is widely held among scientists, and is the primary object of criticism by the intelligent design group. If natural law is sufficient to explain evolution without God's intervention, why insist that an invisible, undetectable God is somehow acting to influence events?

Some versions of theistic evolution are open to the possibility of occasional direct divine intervention, as in miracles. Miracles are uncommon, special acts of God. Miracles for the benefit of believers are often accepted by theistic evolu-

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tionists but usually not in nature. Some, however, would permit miracles in the course of nature. God might intervene in nature, for example, to help evolutionary processes over difficult obstacles, such as the gaps mentioned previously.

All forms of theistic evolution have numerous problems. First, a direct reading of the fossil record, even with the assumption of the long-age geological time scale, does not suggest a single evolutionary tree with all organisms descending from a common ancestor. The evolutionary tree as reflected in the fossil record is full of gaps, especially at the level of phyla and classes. The structural pattern in the fossil record is summarized in the clause “disparity precedes diversity.”<sup>3</sup> Descent with modification would produce the opposite pattern.

Second, the fossil record exhibits too much evil—extinctions, suffering, and disease—for the evolution-

ary process to appear guided by a beneficent creator. The problem is not solved by the suggestions that have been offered: e.g., that such things may not be truly evil; or that God’s participation makes suffering easier to bear; or that God had to work with nature as it is; or that suffering is the price God had to pay to produce His ends.

Third, the deleterious effects of most observed mutations seem difficult to reconcile with the notion that God is guiding them. The origin of cancer and birth defects from mutations are related problems.

Fourth, the origin of morally accountable humans is a difficult problem for all forms of theistic evolution. How can a continuous, gradual process account for a discontinuity in the origin of spiritual humans? In other words, how would one justify the position that a particular individual was morally accountable but his parents were not?

Fifth, the possibility of human freedom seems difficult to harmonize with the view that the human mind arose through natural processes in which chemical reactions are driven by natural law. Natural law does not seem capable of producing a brain with freedom of choice. Most humans believe they actually have freedom of choice, and they hold other humans accountable for their behavior. This would not be logical if natural law and/or God were directing every atom and every chemical reaction, rather than some reactions being subject to human will.

Sixth, the “fall” of Adam is difficult to explain in the context of theistic evolution. In evolution, humans are on an upward trajectory rather than the downward trajectory described in the Bible. This implication of theistic evolution introduces theological problems by undermining the biblical teaching of Calvary and the atonement.

Seventh, theistic evolution tends toward the idea that all things exist within God, who permeates the entire universe. The proposal that God is somehow acting “within” the creation, continuously influencing its directionality, blurs the distinction between Creator and creation in the minds of some theistic evolutionists.

### **General Problems With All Intermediate Models**

Certain problems are inherent in

all intermediate models of origins. The origin of humans in the image of God and the relationship of natural evil to the fall of Adam are perhaps the most interesting of these.

*The problem of Adam and the origin of humans.* All intermediate models of origins have a serious practical problem with the origin of humans. Where do Adam and Eve fit in a series of increasingly human-like fossils stretching back more than a million years?

Theistic evolutionists often deny any individual Adam, asserting that Adam was a generic representation of the evolutionary advance from primate to human. Another view is that Adam was a divinely selected individual in whom God implanted a soul. Some accept the reality of Adam as a Neolithic farmer with emergent self-consciousness rather than a soul. This Adam was not the ancestor of all humans, but the “federal representative” of the race. The image of God was first placed in Adam and later perhaps given to the remainder of the species.

Long-age creationists have proposed that Adam was created 10,000 to 60,000 years ago in a world already containing other human-like lineages. Another proposal is that Adam was the first anatomically modern human, created perhaps 150,000 years ago. In either case, there were already human-like, but non-spiritual, organisms in exist-

tence. These purported groups are the “pre-Adamites.” Yet another proposal is that language is a defining capability of humans, and evidence indicates the existence of language at least 400,000 years ago.

What, then, is the origin of the “pre-Adamites”? Multiple-creation theories would answer this differently from theistic evolution theories, but both would share the problem of locating Adam in history.

Placing the creation of Adam less than 10,000 years ago raises the question of how his sin could affect the rest of humankind, since many groups of humans are not genetically related to him. It also seems to imply that the atoning sacrifice of the “second Adam” does not benefit most races of humans, since they are not descendants of the first Adam. On the other hand, extending the time for Adam’s creation back several millions of years to include all hominids means that the image of God is present in the australopithecines, or at least in the erectines. This is as difficult to accept on scientific grounds as on scriptural grounds.

*The problem of the effects of Adam’s fall on nature.* The fall of Adam is identified in the Bible as a major turning point in human experience, with serious effects on nature as well as on the human condition. Integrating the Fall into a long-age chronology poses significant challenges.

Interpretations of the Fall that

propose a significant change in nature when Adam sinned run into scientific trouble since evidence of disease, predation, and mass extinction are found throughout the fossil record.

On the other hand, interpretations that attribute no physical changes in nature at the Fall run into theological trouble with the relationship of moral and natural evil. Attributing natural evil to God’s intentions does not fit with the biblical revelation of God’s character, and seems contrary to biblical redemption and restoration.

Theistic evolutionists often reject the story of Adam’s fall, interpreting it as symbolic of the fact that we are estranged from God in a less-than-ideal world. Some claim there was no Fall, but that “we appear to be rising beasts rather than fallen angels.”<sup>4</sup> Such views conflict with the most fundamental teachings of Scripture.

One theory offers a contrasting position: There was a real Fall, which was a failure in responsibility by Adam and Eve. The result of the Fall was the negative ecological effects of the abuse of nature by humans. However, if ecological problems are a moral evil, who was responsible for them before Adam sinned?

*The problem of death and suffering before sin.* The problem of death and suffering is related to the problem of the effects of the Fall. All long-age models entail the idea of death and

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suffering before—and thus independent of—Adam’s sin. The fossil record thus becomes a record of God’s activity, not a record of the results of Adam’s sin. But repeated episodes of mass extinctions in the fossil record do not seem to reflect the behavior of a caring Creator.

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The claim that death and suffering are the price God had to pay in order to bring about His desired ends is neither intellectually satisfying nor consistent with Scripture. Some have even suggested that God

was inexperienced as a Creator and had to learn by practice.

The existence of disease and suffering is another aspect of natural evil. Yet there is good evidence that animals suffer now, and that they suffered from disease, injury, and perhaps even emotional trauma in the past. A common response is to speculate that somehow suffering is part of God’s plan. This leaves the problem an unresolved theological challenge to long-age models of origins.

Some have attempted to clear God of responsibility for evil by removing Him from direct control over nature. But ironically, this criticism strikes its own preferred view, theistic evolution, just as strongly. God is equally responsible whether He directly causes every evil event or whether He simply established the laws that cause them to happen and then withdrew.

A superficially more attractive, but entirely conjectural, answer to

the problem of death before sin is the claim that pre-Adamic death and suffering are the result of Satan's rebellion. This is a strange way for a God of love to entertain Himself for billions of years. This idea also runs into serious difficulties with the problem of the lack of distinction in the fossil record between the supposed works of Satan and those of God. It is quite unsatisfactory to state that, within what appears to be a single species, some individuals were actually the product of Satan's work while others were the product of God's work. This becomes an especially onerous idea when applied to the human species. Most, but not necessarily all, theistic evolutionists seem to reject the existence of Satan. Thus, this explanation is primarily limited to advocates of long-age creation who generally do believe in a personal devil.

Numerous theological problems are associated with long-age models of origins. The seventh-day Sabbath, the nature of the atonement, the character of God, the nature of inspiration, the nature of humanity, the basis for marriage, the nature of the future life, and other doctrines are logically related to the story of origins.

This article began with the question of how alternative models fare scientifically. The answer is: not very well. All of the models described here suffer from serious scientific

problems, or are entirely ad hoc and conjectural. There is truly no way to find harmony between the biblical view of origins and current scientific thinking

Biblical creation also suffers from serious scientific problems, but this does not distinguish it from the other models and seems a poor reason to prefer one of them instead. One may adopt an attitude of agnosticism, but this hardly seems appropriate for a Christian.

Only one family of models enjoys biblical support: the literal interpretation of Genesis. This is the model on which the biblical story of redemption is based, and the model on which Seventh-day Adventist theology is based. Although many questions about the biblical model remain unanswered, abandoning it in favor of one of the intermediate models is like jumping out of the frying pan and into the fire. □

#### REFERENCES

<sup>1</sup> A more comprehensive treatment of this topic appears on the Website of the *Journal of the Adventist Theological Society* at <http://ats-jats.org>.

<sup>2</sup> H. J. Van Till, "The Fully Gifted Creation," in J. P. Moreland and J. M. Reynolds, eds., *Three Views on Creation and Evolution* (Grand Rapids, Mich.: Zondervan, 1999), p. 211.

<sup>3</sup> S. J. Gould, *Wonderful Life* (New York: W. W. Norton, 1989), p. 49.

<sup>4</sup> A. Peacocke, "Biology and a Theology of Evolution," *Zygon*, vol. 34, p. 701.